



WASHOE COUNTY

Integrity Communication Service
www.washoecounty.us

CM/ACM	<u>VS</u>
Finance	<u>KE</u>
DA	<u>PL</u>
Risk Mgt	<u>N/A</u>
HR	<u>N/A</u>
Comptroller	<u>KA</u>

STAFF REPORT

BOARD MEETING DATE: April 11, 2017

DATE: March 17, 2017

TO: Board of County Commissioners

FROM: Kelly Mullin, Planner, Planning and Development Division,
Community Services Department, 328-3608, kmullin@washoecounty.us

THROUGH: Bob Webb, Planning Manager, Planning and Development,
Community Services Department, 328-3623, bwebb@washoecounty.us

SUBJECT: For possible action, public hearing and discussion to affirm, modify or reverse the Planning Commission's approval of Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates), a 56-lot single-family residential subdivision on two parcels totaling ±28.76 acres.

The site is located immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive within Sections 27 and 34, T18N, R20E, MDM, Washoe County, NV. The parcels (APNs: 017-520-03 and 017-480-02) are ±23.63-acres and ±5.125-acres in size and within the boundaries of the Southeast Truckee Meadows Area Plan. The Master Plan Categories are Suburban Residential and Rural, and the Regulatory Zones are Medium Density Suburban (2 dwelling units per acre in SETM) and General Rural (1 dwelling unit per 40 acres). The property owner is Charles Maddox, the tentative subdivision map applicant is Silver Crest Homes, and the appellant is Kathleen Pfaff. (Commission District 2.)

SUMMARY

The appellant is seeking to overturn or add additional conditions to the Planning Commission's approval of Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) as approved by the Washoe County Planning Commission on February 7, 2017.

The Washoe County Board of Commissioners (Board) may choose to affirm, reverse or modify the Planning Commission's approval.

Washoe County Strategic Objective supported by this item: Stewardship of our community.

PREVIOUS ACTION

On January 25, 2017 the South Truckee Meadows/Washoe Valley Citizen Advisory Board (CAB) heard details of the proposed project and invited comments from the audience. Questions and concerns were largely related to the following topics: drainage

AGENDA ITEM # 16

and flooding; traffic; school capacity; emergency access; “wild” horses in the area; views and heights of homes; construction noise; and the proposed development schedule. The CAB voted unanimously to provide comments from the meeting to the Planning Commission.

On February 7, 2017, the Planning Commission held a public hearing and took public testimony on the proposed project. Public comments were largely focused on topics similar to those discussed at the January 25th CAB meeting. Draft minutes of the meeting are included with this staff report as Attachment C. The Planning Commission voted unanimously to approve the proposed project with conditions of approval as recommended by staff.

BACKGROUND

Bailey Creek Estates is a 56-lot single-family residential infill subdivision on two parcels totaling ±28.76 acres. The site is located off of Geiger Grade, immediately south of its intersection with Shadow Hills Drive. The staff report provided to the Planning Commission for this proposal is included as Attachment D. The action order from the Planning Commission, to include the final conditions of approval, are included as Attachment B.

The basis for the appeal is described in the appellant’s application (Attachment A) as follows:

“I don’t believe all concerns presented to the board by the community and myself have been addressed. There is a known issue with drainage and flooding in this area that should be improved before further development, for the public benefit. There was overwhelming public opposition, comment and concern regarding this project that should hold some weight as the community in general does not think this subdivision is a good idea for the area proposed. This will impact overcrowding in the surrounding elementary and middle schools. Also, I want to know the horses will be safe and not pushed into our roads, causing a safety hazard for the residents. People in the area east of the development have come out to say there are drugs and drug dealers in the trailers behind the proposed subdivision on the east side and I’m concerned about the impact this could have on their ability to sell the homes for the proposed asking price of \$400,000 or more, which could have an impact on property values.”

The appellant has requested the ten outcomes described below. Staff comments are included for each request in order to provide additional information or context where appropriate.

- 1) Appellant request: “More flood mitigation for this entire area prior to construction completion.”

Staff comment: Washoe County requires new development to mitigate its potential storm drainage impact. Developments are not required to provide flood mitigation or storm drainage mitigation that improve existing conditions for neighboring property owners or other off-site properties. The Bailey Creek drainage channel (located on an adjacent property not within the proposed development) is within a designated floodplain, and there is the potential for impacts from the creek whether or not other development occurs in the area. The design of the Bailey Creek Estates subdivision

will not be permitted to negatively affect existing conditions, and this requirement will be enforced through the provisions of the Development Code, project conditions of approval, and the inspection process.

- 2) Appellant request: “Less development in the flood x shaded zone. Maybe turn the flood x zone into common area instead.”

Staff comment: *Areas classified as Shaded X are considered to be outside of the 100-year flood zone, but within the 500-year flood zone; that is, there is a .02% chance any given year that a flood may occur within that zone. The most southern portions of the Bailey Creek Estates development are identified as Shaded X. There are no requirements for special development standards within the Shaded X zone, and there is no FEMA requirement for flood insurance within Shaded X. FEMA has determined de minimus potential for impact in these areas, and Washoe County Development Code standards would dictate minimum requirements for development.*

- 3) Appellant request: “Houses across the creek to match existing on this side, even if more than 30 feet apart (one story for one story). 300 feet minimum between existing and new homes to protect privacy.”

Staff comment: *Southeast Truckee Meadows Area Plan Policy SETM.2.7 states that “dwellings in new subdivisions adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30 foot or wider landscaped buffer area.” Condition 1(r)(x) reflects this requirement. Implementing an additional 300-foot no-build area would render a significant portion of the subject property unusable, including almost the entirety of the southern parcel.*

- 4) Appellant request: “If this is going to go through, it should wait until new elementary and high schools are built.”

Staff comment: *The Washoe County School District (WCSD) anticipates the project to generate 14 new elementary school students, 3 middle school students and 7 high school students. WCSD has stated that students from this development may be assigned to the closest schools with available capacity.*

- 5) Appellant request: “No construction on Saturdays, and if so, please lessen the hours.”

Staff comment: *Condition of approval 1(u) currently limits construction hours to 7 a.m. to 7 p.m., Monday through Saturday. These are the hours the Development Code exempts temporary construction activities from the requirements of Article 414, Noise and Lighting Standards.*

- 6) Appellant request: “A walking path in the new development to keep the character of the area, open space and to allow space for horses to pass that will help keep them off our roads and allow them to safely stay in the area. This will also help to keep people out of the creek area, allowing them a path to the Bailey Creek Park.”

Staff comment: *The Bailey Creek drainage channel is located within the ±13.4-acre common area for the Cottonwood Creek Estates subdivision. The Bailey Creek Estates project is on property adjacent to that common area, and is across the drainage channel from Bailey Creek Park. The park is accessible from Toll Road, through the Cottonwood Creek Estates subdivision.*

- 7) Appellant request: “A disclosure to the new home owners about flood risks, a clear statement about who maintains drainage (the HOA) and what happens to this responsibility should the HOA dissolve.”

Staff comment: At the February 7, 2017 Planning Commission hearing, the applicant confirmed that they will provide all disclosures as required by law. Conditions 1(r) and 1(s) address preservation, maintenance and funding of common area and drainage facilities. These requirements are to be made part of the Conditions, Covenants, and Restrictions (CC&Rs), which will also address the potential for liens against the properties and the individual property owners' responsibilities for these items. Were a Homeowner's Association to eventually dissolve, the underlying property owner(s) would still be responsible for maintaining drainage facilities.

- 8) Appellant request: “Landscaping between our subdivisions so that we are not having to stare at homes in our backyards and vice versa.”

Staff comment: The Bailey Creek Estates project will be separated from homes to the west by the Cottonwood Creek Estates ±13.4-acre common area and the Comstock Estates ±3.4-acre common area. It will be separated from homes to the north by Geiger Grade. Additionally, per Southeast Truckee Meadows Area Plan Policy SETM.2.7, homes adjacent to existing residential development will be required to match the adjacent building type (single story/multi-story). Fifty-two trees are proposed along Geiger Grade, plus 1 tree per lot abutting roadways within the subdivision. Six-foot-high solid fencing will also be constructed along the rear of each lot.

- 9) Appellant request: “There should be a different access added for current residents trying to get to the Toll Rd area to aid with traffic, possibly off S. Virginia. And to improve Pinion Dr. to also allow for emergency access.”

Staff comment: The development has provided primary access and secondary emergency access points as required under the Development Code. Primary access will be off of Geiger Grade, while secondary emergency vehicle access will include improvements to Moon Lane, which will connect to Geiger Grade via Kivett Lane. There currently are neither plans nor an identified funding source for improving Pinion Drive, which is a privately owned access easement that runs parallel to Kivett Lane to the east.

- 10) Appellant request: “Impact statistics on local fire stations and sheriff's office and how that will relate to safety and budgets for these services.”

Staff comment: The Truckee Meadows Fire Protection District provided several comments as part of their review of this project, including requirements for emergency vehicle access within the subdivision. The Washoe County Sheriff's Office has indicated that this development is not anticipated to have significant impact on their services, and that no additional resources are needed.

Additional public comments received in support of the appeal have also been provided as Attachment F.

FISCAL IMPACT

No fiscal impact.

- 4) Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System;
- 5) Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat;
- 6) Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems;
- 7) Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision;
- 8) Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles;
- 9) Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan; and
- 10) Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision."

Attachments:

- A. Appeal application
- B. Action Order for Tentative Subdivision Map Case WTM16-003
- C. Draft minutes of Feb. 7, 2017 Planning Commission meeting
- D. Staff report for Tentative Subdivision Map Case WTM16-003
- E. Addendums #1 & #2 to staff report for Tentative Subdivision Map Case WTM16-003
- F. Public comments received since Feb. 7, 2017 Planning Commission meeting

xc: Appellant: Kathleen Pfaff, 15170 Bailey Canyon Drive, Reno, NV 89521
Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511
Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570
Representatives: Wood Rodgers, Attn: Stacie Huggins, 1361 Corporate Blvd., Reno, NV 89502
Wood Rodgers, Attn: Steve Strickland, 1361 Corporate Blvd., Reno, NV 89502

RECOMMENDATION

It is recommended the Board of County Commissioners affirm the Planning Commission's approval with conditions of Tentative Subdivision Map Case WTM16-003 (Bailey Creek Estates).

POSSIBLE MOTIONS

Three possible motion options are provided, depending on whether the Board chooses to affirm, modify or reverse the Planning Commission's approval with conditions of Tentative Subdivision Map Case WTM16-003 (Bailey Creek Estates).

Affirm

Should the Board agree with the Planning Commission's action, a possible motion would be:

“Move to deny the appeal and affirm the decision of the Planning Commission to approve with conditions Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates).”

Modify

Should the Board wish to modify the Planning Commission's action and add additional conditions to the approval, a possible motion would be:

“Move to modify the decision of the Planning Commission to approve with conditions Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates), by adding the following condition(s) of approval: *[State conditions of approval to add to existing approval.]*”

Reverse

Should the Board disagree with the Planning Commission's action and wish to reverse the approval of Tentative Subdivision Map Case WTM16-003, a possible motion would be:

“Move to reverse the decision of the Planning Commission to approve with conditions Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates). This reversal of the Planning Commission's decision is based on the Board's review of the written materials provided for this item, as well as the oral testimony at the public hearing. The following finding(s) cannot be made by this Board:

[Select one or more of the following required findings for a tentative subdivision map, which the Board cannot make, and provide explanation as to why the finding(s) cannot be made.]

- 1) Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan;
- 2) Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan;
- 3) Type of Development. That the site is physically suited for the type of development proposed;

Community Services Department
Planning and Development
APPEAL TO BOARD OF COUNTY
COMMISSIONERS (BCC)
APPLICATION



Community Services Department
Planning and Development
1001 E. Ninth St., Bldg. A
Reno, NV 89520

Telephone: 775.328.3600

Washoe County Appeal of Decision to Board of County Commissioners

Your entire application is a public record. If you have a concern about releasing personal information please contact Planning and Development staff at 775.328.3600.

Appeal of Decision by (Check one)	
Note: Appeals to the Washoe County Board of County Commissioners are governed by WCC Section 110.912.20.	
<input checked="" type="checkbox"/> Planning Commission	<input type="checkbox"/> Board of Adjustment
<input type="checkbox"/> Hearing Examiner	<input type="checkbox"/> Other Deciding Body (specify) _____
Appeal Date Information	
Note: This appeal must be delivered in writing to the offices of the Planning & Development Division (address is on the cover sheet) within 10 calendar days from the date that the decision being appealed is filed with the Commission or Board Secretary (or Director) and mailed to the original applicant.	
Note: The appeal must be accompanied by the appropriate appeal fee (see attached Master Fee Schedule).	
Date of this appeal: <u>2/17/17</u>	
Date of action by County: <u>2/7/17</u>	
Date Decision filed with Secretary: <u>Unknown</u>	
Appellant Information	
Name: Kathleen Pfaff	Phone: 775-220-8409
Address:	Fax:
15170 Bailey Canyon Dr	Email: F4LL4X@gmail.com
City: Reno State: NV Zip: 89521	Cell: 775-220-8409
Describe your basis as a person aggrieved by the decision: A neighbor whose home and life will be directly impacted by the weight of this subdivision. My home value may be impacted and my quality of life.	
Appealed Decision Information	
Application Number: WTM-16-003	
Project Name: Bailey Creek Estates	
State the specific action(s) and related finding(s) you are appealing: The decision of the planning commission to go ahead with the project as proposed on 2/7/17.	

Appealed Decision Information (continued)

Describe why the decision should or should not have been made:

I don't believe all concerns presented to the board by the community and myself have been addressed. There is a known issue with drainage and flooding in this area that should be improved before further development, for the public benefit. There was overwhelming public opposition, comment and concern regarding this project that should hold some weight as the community in general does not think this subdivision is a good idea for the area proposed. This will impact overcrowding in the surrounding elementary and middle schools. Also, I want to know the horses will be safe and not pushed into our roads, causing a safety hazard for the residents. People in the area east of the development have come out to say there are drugs and drug dealers in the trailers behind the proposed subdivision on the east side and I'm concerned about the impact this could have on their ability to sell the homes for the proposed asking price of \$400,000 or more, which could have an impact on property values.

Cite the specific outcome you are requesting with this appeal:

*More flood mitigation for this entire area prior to construction completion.
*Less development in the flood x shaded zone. Maybe turn the flood x zone into common area instead.
*Houses across the creek to match existing on this side, even if more than 30 feet apart (one story for one story). 300 feet minimum between existing and new homes to protect privacy.
*If this is going to go through, it should wait until new elementary and high schools are built.
*No construction on Saturdays, and if so, please lessen the hours.
*A walking path in the new development to keep the character of the area, open space and to allow space for horses to pass that will help keep them off our roads and allow them to safely stay in the area. This will also help to keep people out of the creek area, allowing them a path to the Bailey Creek Park.
*A disclosure to the new home owners about flood risks, a clear statement about who maintains drainage (the HOA) and what happens to this responsibility should the HOA dissolve.
*Landscaping between our subdivisions so that we are not having to stare at homes in our backyards and vice versa.
*There should be a different access added for current residents trying to get to the Toll Rd area to aid with traffic, possibly off S. Virginia. And to improve Pinion Dr. to also allow for emergency access.
*Impact statistics on local fire stations and sheriff's office and how that will relate to safety and budgets for these services.

Did you speak at the public hearing when this item was considered?

Yes
 No

Did you submit written comments prior to the action on the item being appealed?

Yes
 No

Appellant Signature

Printed Name: **Kathleen Pfaff**

Signature: **Kathleen Pfaff**

Date: **2/17/17**

From: Kathleen Pfaff
To: Mullin, Kelly
Subject: Supplemental information for appeal
Date: Thursday, February 23, 2017 10:22:48 PM

Attached is a study that was done in 2006 on this area and flooding here. It appears to me that this study demonstrates that this area is not suitable for the dense construction that would come with this subdivision (and many of the already existing ones).

<http://www.reno.gov/home/showdocument?id=14117>

Also, here is a link to the petition that we started with comments from the public.

<http://www.reno.gov/home/showdocument?id=14117>

Additionally, this is a court case that seems to deal with what may wind up happening in our situation. <http://caselaw.findlaw.com/nv-supreme-court/1745487.html>

I hope this information conveys the reasons why I think the area is not a good place for this subdivision. If the commissioners don't agree with me, I hope that they can come to some sort of terms with us on how to make this better work for everyone. If there is to be an approval, the density of the project should be limited to less homes.

I understand that bringing this area up to the recommendations of the study is not cost effective, but I don't feel like it's right to put that burden on a private citizen, either. If it's not cost effective to make the improvements, then construction should be halted until the necessary improvements can be made. These are peoples' homes that could be destroyed and the life savings of families thrown away, whose lives could be ruined, which isn't cost effective for anyone..

Thank you,
Kathleen Pfaff



WASHOE COUNTY
Planning and Development
 INTEGRITY COMMUNICATION SERVICE

ATTACHMENT B Dept.
 Reno, Nevada 89520-0027
 Phone: (775) 328-6100
 Fax: (775) 328-6133

Planning Commission Action Order
Tentative Subdivision Map Case Number WTM16-003

Decision: **Approval with Conditions**

Decision Date: February 7, 2017

Mailing/Filing Date: February 9, 2017

Property Owner: Charles Maddox
 P.O. Box 70577
 Reno, NV 89570

Assigned Planner: Kelly Mullin, Planner
 Washoe County Community Services Department
 Planning and Development Division
 Phone: 775.328.3608
 E-Mail: kmullin@washoecounty.us

Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) – Hearing, discussion, and possible action to approve a 56-lot single-family residential subdivision on two parcels totaling ±28.76 acres. Residential lots will range in size from 14,520 sq. ft. (±0.33-acres) to 21,780 sq. ft. (±0.81-acres) with lot sizes averaging 17,869 sq. ft. (±0.41-acres). The subdivision includes approximately ±0.75-acres of common area for drainage facilities.

- Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511
- Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570
- Location: Immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive
- Assessor's Parcel Numbers: 017-520-03 and 017-480-02
- Parcel Sizes: 23.63-acres and 5.125-acres
- Area Plan: Southeast Truckee Meadows (SETM)
- Master Plan Categories: Suburban Residential and Rural
- Regulatory Zones: Medium Density Suburban (2 dwelling units per acre in SETM) and General Rural (1 dwelling unit per 40 acres)
- Citizen Advisory Board: South Truckee Meadows/Washoe Valley
- Development Code: Article 608, *Tentative Subdivision Maps* and Article 408, *Common Open Space Development*
- Commission District: 2 – Commissioner Lucey
- Section/Township/Range: Sections 27 and 34, T18N, R20E, MDM, Washoe County, NV

Notice is hereby given that the Washoe County Planning Commission granted approval with conditions of the above referenced case number based on the findings in accordance with Washoe County Code Chapter 110 (Development Code) Article 608, *Tentative Subdivision Maps* and Article 408, *Common*

To: Charles Maddox
Subject: WTM16-003
Date: February 9, 2017
Page: 2

Open Space Development. If no appeals have been filed within 10 calendar days after the Mailing/Filing date shown on this Action Order, the approval by the Washoe County Planning Commission is final. If filed, an appeal stays any further action on the permit until final resolution of the appeal. An appeal shall be filed in accordance with the provisions found in Article 912 of the Washoe County Development Code. This decision is based on having made all ten findings in accordance with Washoe County Code Section 110.608.25:

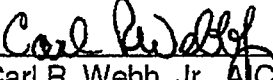
1. Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan;
2. Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan;
3. Type of Development. That the site is physically suited for the type of development proposed;
4. Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System;
5. Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat;
6. Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems;
7. Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision;
8. Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles;
9. Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan; and
10. Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision.

This Action Order is issued subject to the attached conditions and Washoe County development standards. Please contact the planner assigned to your project at the above-referenced phone number within seven days of receipt of this Order to review the steps necessary to satisfy the Conditions of Approval. Any business license, certificate of occupancy or final approval shall not be issued until all of the Conditions of Approval (attached) are satisfied. Additionally, compliance shall be required with all federal, state and local statutes, ordinances, and regulations applicable to the approved project.

This Action Order does not authorize any development, to include building construction and grading, without the required permits from the Washoe County Building and Safety Division.

To: Charles Maddox
Subject: WTM16-003
Date: February 9, 2017
Page: 3

Washoe County Community Services Department
Planning and Development Division



Carl R. Webb, Jr., AICP
Secretary to the Planning Commission

CRW/KM/ks

xc:

Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511

Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570

Representative: Wood Rodgers, Attn: Stacie Huggins, 1361 Corporate Blvd., Reno, NV 89502

Representative: Wood Rodgers, Attn: Steve Strickland, 1361 Corporate Blvd., Reno, NV 89502

Action Order xc: Nathan Edwards, District Attorney's Office; Keirsten Beck, Assessor's Office; Cori Burke, Assessor's Office; Dwayne Smith, Clara Lawson, Tim Simpson, and Leo Vesely, Engineering & Capital Projects Division; Chad Giesinger and Vahid Behmaram, Planning & Development Division; Wes Rubio, Health District; Amy Ray, Truckee Meadows Fire Protection District; Pat Mohn, Nevada Division of Environmental Protection; Steve Shell, Nevada Division of Water Resources; Mike Boster, Washoe County School District; Amanda Duncan, Truckee Meadows Water Authority; Rebecca Kapuler, Regional Transportation Commission; South Truckee Meadows/Washoe Valley Citizen Advisory Board, Chair



Conditions of Approval

Tentative Subdivision Map Case Number WTM16-003

The project approved under Tentative Subdivision Map Case Number WTM16-003 shall be carried out in accordance with the Conditions of Approval granted by the Planning Commission on February 7, 2017. Conditions of Approval are requirements placed on a permit or development by each reviewing agency. These Conditions of Approval may require submittal of documents, applications, fees, inspections, amendments to plans, and more. These conditions do not relieve the applicant of the obligation to obtain any other approvals and licenses from relevant authorities required under any other act or to abide by all other generally applicable Codes, and neither these conditions nor the approval by the County of this project/use override or negate any other applicable restrictions on uses or development on the property.

Unless otherwise specified, all conditions related to the approval of this Tentative Subdivision Map shall be met or financial assurance must be provided to satisfy the conditions of approval prior to issuance of a grading or building permit. The agency responsible for determining compliance with a specific condition shall determine whether the condition must be fully completed or whether the applicant shall be offered the option of providing financial assurance. All agreements, easements, or other documentation required by these conditions shall have a copy filed with the County Engineer and with the Planning and Development Division.

Compliance with the conditions of approval related to this Tentative Subdivision Map is the responsibility of the applicant, his/her successor in interest, and all owners, assignees, and occupants of the property and their successors in interest. Failure to comply with any of the conditions imposed in the approval of the Tentative Subdivision Map may result in the initiation of revocation procedures.

Washoe County reserves the right to review and revise the conditions of approval related to this Tentative Subdivision Map should it be determined that a subsequent license or permit issued by Washoe County violates the intent of this approval.

For the purpose of conditions imposed by Washoe County, "may" is permissive and "shall" or "must" is mandatory.

Conditions of Approval are usually complied with at different stages of the proposed project. Those stages are typically:

- Prior to recordation of a final map.
- Prior to obtaining a final inspection and/or a certificate of occupancy.
- Prior to the issuance of a business license or other permits/licenses.
- Some "Conditions of Approval" are referred to as "Operational Conditions." These conditions must be continually complied with for the life of the project.

The Washoe County Commission oversees many of the reviewing agencies/departments with the exception of the following agencies.

- **The DISTRICT BOARD OF HEALTH, through the Washoe County Health District, has jurisdiction over all public health matters in the Health District. Any conditions set by the Health District must be appealed to the District Board of Health.**

- **The TRUCKEE MEADOWS WATER AUTHORITY (TMWA) is directed and governed by its own board. Therefore, any conditions set by TMWA must be appealed to that Board.**

STANDARD CONSIDERATIONS FOR SUBDIVISIONS
Nevada Revised Statutes 278.349

Pursuant to NRS 278.349, when contemplating action on a Tentative Subdivision Map, the governing body or the Planning Commission, if it is authorized to take final action on a tentative map, shall consider:

- (a) Environmental and health laws and regulations concerning water and air pollution, the disposal of solid waste, facilities to supply water, community or public sewage disposal and, where applicable, individual systems for sewage disposal;
- (b) The availability of water which meets applicable health standards and is sufficient for the reasonably foreseeable needs of the subdivision;
- (c) The availability and accessibility of utilities;
- (d) The availability and accessibility of public services such as schools, police and fire protection, transportation, recreation and parks;
- (e) Conformity with the zoning ordinances and master plan, except that if any existing zoning ordinance is inconsistent with the master plan, the zoning ordinance takes precedence;
- (f) General conformity with the governing body's master plan of streets and highways;
- (g) The effect of the proposed subdivision on existing public streets and the need for new streets and highways to serve the subdivision;
- (h) Physical characteristics of the land such as floodplain, slope and soil;
- (i) The recommendations and comments of those entities reviewing the tentative map pursuant to NRS 278.330 and 278.335; and
- (j) The availability and accessibility of fire protection, including, but not limited to, the availability and accessibility of water and services for the prevention and containment of fires, including fires in wild lands.

FOLLOWING ARE CONDITIONS OF APPROVAL REQUIRED BY THE REVIEWING AGENCIES. EACH CONDITION MUST BE MET TO THE SATISFACTION OF THE ISSUING AGENCY.

Washoe County Planning and Development Division

1. The following conditions are requirements of the Planning and Development Division, which shall be responsible for determining compliance with these conditions.

Contact: Kelly Mullin, 775.328.3608, kmullin@washoecounty.us

Washoe County Conditions of Approval

- a. The applicant shall demonstrate substantial conformance to the plans approved as part of this tentative subdivision map.
- b. Failure to comply with the conditions of approval shall render this approval null and void.
- c. The subdivision shall be in substantial conformance with the provisions of Washoe County Code Chapter 110, Article 408, *Common Open Space Development*, Article 604, *Design Requirements*, and Article 608, *Tentative Subdivision Maps*.
- d. Final maps and final construction drawings shall comply with all applicable statutes, ordinances, rules, regulations and policies in effect at the time of submittal of the tentative map or, if requested by the developer and approved by the applicable agency, those in effect at the time of approval of the final map.
- e. The subdivider shall present to Washoe County a final map, prepared in accordance with the tentative map, for the entire area for which a tentative map has been approved, or one of a series of final maps, each covering a portion of the approved tentative map, within four years after the date of approval of the tentative map or within two years of the date of approval for subsequent final maps. On subsequent final maps, that date may be extended by two years if the extension request is received prior to the expiration date.
- f. Final maps shall be in substantial compliance with all plans and documents submitted with and made part of this tentative map request. as may be amended by action of the final approving authority.
- g. All final maps shall contain the applicable portions of the following Jurat:

THE TENTATIVE MAP FOR WTM16-003 FOR BAILEY CREEK ESTATES WAS APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON FEBRUARY 7, 2017.

THIS FINAL MAP, MAP NAME AND UNIT/PHASE #, MEETS ALL APPLICABLE STATUTES, ORDINANCES AND CODE PROVISIONS, IS IN SUBSTANTIAL CONFORMANCE WITH THE TENTATIVE MAP AND ITS CONDITIONS, WHICH ARE INCORPORATED HEREIN BY THIS REFERENCE, AND THOSE CONDITIONS HAVE BEEN SATISFIED FOR RECORDATION OF THIS MAP, EXCEPT THAT THE "OPERATIONAL CONDITIONS" CONTAINED IN THE RECORDED ACTION ORDER SHALL REMAIN IN FULL FORCE AND EFFECT IN PERPETUITY.

IF ALL LOTS ON THIS MAP ARE REVERTED TO ACREAGE AND A NEW SUBDIVISION APPROVAL IS OBTAINED AT A FUTURE DATE, THE PROVISIONS OF THIS APPROVAL SHALL BE NULL AND VOID, UPON APPROVAL BY WASHOE COUNTY OF THOSE ACTIONS.

[Omit the following paragraph if this is the first and last (only) final map.]

THE FIRST FINAL MAP FOR THIS TENTATIVE MAP WAS APPROVED AND ACCEPTED FOR RECORDATION ON date of Planning and Development Director's signature on first final map. THE MOST RECENTLY RECORDED FINAL MAP WAS APPROVED AND ACCEPTED FOR RECORDATION ON date of Planning and Development Director's signature on most recent final map. [If an extension has been granted after that date – add the following]: A TWO YEAR EXTENSION OF TIME FOR THE TENTATIVE MAP WAS APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON _____.

THE NEXT FINAL MAP FOR WTM16-003 MUST BE APPROVED AND ACCEPTED FOR RECORDATION BY THE PLANNING AND DEVELOPMENT DIRECTOR ON OR BEFORE THE EXPIRATION DATE, THE _____ DAY OF _____, 20____. OR AN EXTENSION OF TIME FOR THE TENTATIVE MAP MUST BE APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON OR BEFORE SAID DATE.

THIS FINAL MAP IS APPROVED AND ACCEPTED FOR RECORDATION THIS _____ DAY OF _____, 20____ BY THE PLANNING AND DEVELOPMENT DIRECTOR. THE OFFER OF DEDICATION FOR STREETS, SEWERS, ETC. IS REJECTED AT THIS TIME, BUT WILL REMAIN OPEN IN ACCORDANCE WITH NRS CHAPTER 278.

WILLIAM H. WHITNEY, DIRECTOR,
PLANNING AND DEVELOPMENT DIVISION

- h. The applicant shall record the Action Order with the County Recorder. A copy of the recorded Action Order stating conditional approval of this tentative map shall be attached to all applications for administrative permits issued by Washoe County.
- i. A note shall be placed on all grading plans and construction drawings stating:

NOTE

Should any prehistoric or historic remains/artifacts be discovered during site development, work shall temporarily be halted at the specific site and the State Historic Preservation Office of the Department of Museums, Library and Arts shall be notified to record and photograph the site. The period of temporary delay shall be limited to a maximum of two (2) working days from the date of notification.

- j. The final map shall designate faults that have been active during the Holocene epoch of geological time, and the final map shall contain the following note:

NOTE

No habitable structures shall be located on a fault that has been active during the Holocene epoch of geological time.

- k. The developer and all successors shall direct any potential purchaser of the site to meet with the Planning and Development Division to review conditions of approval prior to the final sale of the site. Any subsequent purchasers of the site shall notify the Planning and Development Division of the name, address, telephone number and contact person of the new purchaser within thirty (30) days of the final sale.
- l. Prior to any ground disturbing activity, the applicant shall submit a landscaping/architectural design plan to the Planning and Development Division for review and approval by the Design Review Committee. Said plan shall address, but not be limited to: signage, exterior lighting (including streetlights), fencing, landscaping design, landscaping material (if plant material: type, size at time of planting, maturation size at full growth, period of time between planting and full growth), landscaping location, landscaping irrigation system, and financial assurances that landscaping will be planted and maintained. At least two separate xeriscape options for subdivision landscape design shall be provided, emphasizing the use of native vegetation, with non-native and atypical vegetation integrated sparingly into any landscaped area.
- m. The applicant shall provide financial assurances to the Planning and Development Division equal to one hundred and twenty percent (120%) of the cost of revegetation and irrigation of all disturbed areas. The cost shall be calculated by a certified landscape contractor. The financial assurances are to be held with automatic renewal for not less than three years and are intended to ensure the continued survival of plants beyond that time period for mitigation of visual scarring and for erosion control. If the applicant chooses to provide a bond as financial assurance, it must be issued from an acceptable company rated A- or better. The applicant must also execute a Hold Harmless Agreement with right of entry. This condition must be completed to the satisfaction of the Planning and Development Division prior to issuance of a grading permit.
- n. A certification letter or series of letters by a registered landscape architect or other persons permitted to prepare landscaping and irrigation plans pursuant to NRS 623A shall be submitted to and approved by the Planning and Development Division and the Design Review Committee. The letter(s) shall certify that all applicable landscaping provisions of Articles 408, 410 and 412 of the Washoe County Code Chapter 110 (Development Code) have been met. Any landscaping plans and the letter shall be wet-stamped. The letter shall indicate any provisions of the code that the Director of the Planning and Development Division has waived.
- o. All landscaping and revegetation shall be maintained in accordance with the provisions found in Washoe County Code Section 110.412.75, Maintenance. A three-year maintenance plan shall be submitted by a licensed landscape architect registered in the State of Nevada to the Planning and Development Division prior to a Certificate of Occupancy. The plan shall be wet-stamped.

- p. The applicant shall submit and follow a plan for the control of noxious weeds. Prior to any ground-disturbing activity, the applicant shall provide the Planning and Development Division a copy of the plan, which should be developed through consultation with the Washoe County Health District, the University of Nevada Cooperative Extension, and/or the Washoe-Storey Conservation District.
- q. Any lighting proposed, including street lights, shall show how it is consistent with current best practice "dark-sky" standards and meets the requirements of Southeast Truckee Meadows Area Plan Policy 2.2. Lights shall be shielded to prevent light spillage onto adjacent properties or streets.
- r. Conditions, covenants, and restrictions (CC&Rs), including any supplemental CC&Rs, shall be submitted to the Planning and Development staff for review and subsequent forwarding to the District Attorney for review and approval. The final CC&Rs shall be signed and notarized by the owner(s) and submitted to the Planning and Development Division with the recordation fee prior to the recordation of the final map. The CC&Rs shall require all phases and units of the subdivision approved under this tentative map to be subject to the same CC&Rs. Washoe County shall be made a party to the applicable provisions of the CC&Rs to the satisfaction of the District Attorney's Office. Said CC&Rs shall specifically address the potential for liens against the properties and the individual property owners' responsibilities for the funding of maintenance, replacement, and perpetuation of the following items, at a minimum:
- i. Maintenance of public access easements, common areas, and common open spaces. Provisions shall be made to monitor and maintain, for a period of three (3) years regardless of ownership, a maintenance plan for the common open space area. The maintenance plan for the common open space area shall, as a minimum, address the following:
 - Vegetation management;
 - Watershed management;
 - Debris and litter removal;
 - Fire access and suppression; and
 - Maintenance of public access and/or maintenance of limitations to public access.
 - ii. All drainage facilities and roadways not maintained by Washoe County shall be privately maintained and perpetually funded by the homeowners association.
 - iii. All open space identified as common area on the final map shall be privately maintained and perpetually funded by the homeowners association. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The maintenance of the common areas and related improvements shall be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.
 - iv. The project adjacent to undeveloped land shall maintain a fire fuel break of a minimum 30 feet in width until such time as the adjacent land is developed.

Washoe County Conditions of Approval

- v. Locating habitable structures on potentially active (Holocene) fault lines, whether noted on the recorded map or disclosed during site preparation, is prohibited.
 - vi. All outdoor lighting on buildings and streets within the subdivision shall be down-shielded.
 - vii. No motorized vehicles shall be allowed on the platted common area except emergency vehicles, utility service vehicles, or vehicles involved in homeowner association maintenance and repair of common area facilities.
 - viii. Mandatory solid waste collection.
 - ix. Fence material (if any), height, and location limitations, and re-fencing standards. Replacement fence must be compatible in materials, finish and location of existing fence.
 - x. Dwellings adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30-foot or wider landscaped buffer area. A note to this effect shall be placed on applicable final maps, and a disclosure made by the developer to affected homebuyers on their closing documents.
-
- s. The common open space owned by the homeowners association shall be noted on the final map as "common open space" and the related deed of conveyance shall specifically provide for the preservation of the common open space in perpetuity. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The deed shall be presented with the CC&Rs for review by the Planning and Development staff and the District Attorney.
 - t. Disturbed areas left undeveloped for more than thirty (30) days must be revegetated by methods approved by Planning and Development and that comply with the requirements of Southeast Truckee Meadows Area Plan Policy 11.5.
 - u. Construction hours are limited to 7 a.m. to 7 p.m.. Monday through Saturday.
 - v. A will-serve from Truckee Meadows Water Authority and mylar map of the proposed project shall be presented to the State Engineer for approval and signed through his office prior to development.

Washoe County Engineering and Capital Projects Division

2. The following conditions are requirements of the Engineering and Capital Projects Division. Unless otherwise noted, the County Engineer shall be responsible for determining compliance with these conditions.

Contact: Leo Vesely, 775.328.2313, lvesely@washoecounty.us

General Conditions

- a. Final maps and final construction drawings shall comply with all applicable statutes, ordinances, rules, regulations, and policies in effect at the time of submittal of the tentative map or, if requested by the developer and approved by the applicable agency, those in effect at the time of approval of the final map.
- b. Prior to acceptance of public improvements and release of any financial assurances, the developer shall furnish to the water and sewer provider(s) and Engineering and Capital Projects Division a complete set of reproducible as-built construction drawings prepared by a civil engineer registered in the State of Nevada.
- c. The developer shall be required to participate in any applicable General Improvement District or Special Assessment District formed by Washoe County. The applicable County Department shall be responsible for determining compliance with this condition.
- d. The developer shall provide written approval from the U.S. Postal Service concerning the installation and type of mail delivery facilities. The system, other than individual mailboxes, must be shown on the project construction plans and installed as part of the onsite improvements.
- e. A complete set of construction improvement drawings, including an onsite grading plan, shall be submitted to the County Engineer for approval prior to finalization of any portion of the tentative map. Grading shall comply with best management practices (BMP's) and shall include detailed plans for grading and drainage on each lot, erosion control (including BMP locations and installation details), slope stabilization and mosquito abatement. Placement or disposal of any excavated material shall be indicated on the grading plan.
- f. All open space shall be identified as common area on the final map. A note on the final map shall indicate that all common areas shall be privately maintained and perpetually funded by the Homeowners Association. The County Engineer shall determine compliance with this condition. The maintenance of the common areas shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.
- g. Any existing easements or utilities that conflict with the development shall be relocated, quitclaimed, and/or abandoned, as appropriate.
- h. Any easement documents recorded for the project shall include an exhibit map that shows the location and limits of the easement in relationship to the project.
- i. All existing overhead utility lines shall be placed underground, except electric transmission lines greater than 100 kilovolts, which can remain above ground.
- j. With each affected final map, provide written approval from NV Energy for any improvements located within their easement or under their facilities.
- k. Appropriate easements shall be granted for any existing or new utilities, with each affected final map. This includes, but is not limited, to electrical lines, water lines, and drainage maintenance access.

Drainage and Storm Water Discharge Program Conditions (Washoe County Code Chapter 110, Articles 420 & 421)

- i. The conditional approval of this tentative map shall not be construed as final approval of the drainage facilities shown on the tentative map. Final approval of the drainage facilities will occur during the final map review and will be based upon the final hydrology report.
- m. Prior to finalization of the first final map, a master hydrology/hydraulic report and a master storm drainage plan shall be submitted to the County Engineer for approval.
- n. Prior to finalization of any portion of the tentative map, a final, detailed hydrology/hydraulic report for that unit shall be submitted to the County Engineer. All storm drainage improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided.
- o. Any increase in stormwater runoff resulting from the development and based on the 5-year and 100-year storm(s) shall be detained onsite, or off-site with necessary permission and easements from the property owner.
- p. Standard reinforced concrete headwalls or other approved alternatives shall be placed on the inlet and outlet of all drainage structures, and grouted rock riprap shall be used to prevent erosion at the inlets and outlets of all culverts to the satisfaction of the Engineering and Capital Projects Division.
- q. The developer shall provide pretreatment for petrochemicals and silt for all storm drainage leaving the site to the satisfaction of the Engineering and Capital Projects Division.
- r. The Truckee Meadows Regional Stormwater Quality Management Program Construction Permit Submittal Checklist and Inspection Fee shall be submitted with each final map.
- s. In medians with irrigated landscaping adjacent to the curb, a subdrain system shall be installed a minimum of one foot behind the back face of curb to intercept drainage from the landscaping. The system shall be tied to the storm drain system or an acceptable alternative drainage system.
- t. Drainage swales that drain more than two lots are not allowed to flow over the curb into the street; these flows shall be intercepted by an acceptable storm drain inlet and routed into the storm drain system.
- u. A note on the final map shall indicate that all drainage facilities not maintained by Washoe County shall be privately maintained and perpetually funded by a homeowners association. As an alternative to a homeowners association, the developer may request the establishment of a County Utility Service Area under which fees would be paid for maintenance of the proposed storm drainage detention facility. The fee amount will be based on the additional service above that normally provided by the County to maintain new stormwater facilities dedicated by the developer (i.e., curb and gutter, drop inlets and piping). The County Engineer shall determine compliance with this condition. The

maintenance and funding of these drainage facilities shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.

- v. The maximum permissible flow velocity (that which does not cause scour) shall be determined for all proposed channels and open ditches. The determination shall be based on a geotechnical analysis of the channel soil, proposed channel lining and channel cross section, and it shall be in accordance with acceptable engineering publications/calculations. Appropriate linings shall be provided for all proposed channels and open ditches such that the 100-year flows do not exceed the maximum permissible flow velocity.
- w. All slopes steeper than 3:1 shall be mechanically stabilized to control erosion. As an alternative to riprap, an engineered solution (geofabric, etc.) may be acceptable.
- x. Drainage easements shall be provided for all storm runoff that crosses more than one lot.
- y. Maintenance access roadways and drainage easements shall be provided for all existing and proposed drainage facilities. All drainage facilities located within Common Area shall be constructed with an adjoining minimum 12' wide gravel access road. Maintenance access road shall be provided to the bottom of proposed detention basins as well as over County owned and maintained storm drainage facilities.
- z. The FEMA 100-year floodplain shall be shown on the final map and grading plan to the satisfaction of the County Engineer. All grading in these areas shall be in conformance with the Washoe County Code Article 416.
- aa. Common Area or offsite drainage draining onto residential lots shall be perpetuated through or around residential lots and drainage facilities capable of passing a 100-year storm shall be constructed with the subdivision improvements to perpetuate the storm water runoff to improved or natural drainage facilities.
- bb. Prior to the finalization of any final map, provide verification that permission has been granted to construct Bailey Canyon Creek improvements on offsite parcels not owned by the applicant.
- cc. Drainage easements shall be recorded over all FEMA A zones and floodways.

Traffic and Roadway (Washoe County Code Chapter 110, Article 436)

- dd. All roadway improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided.
- ee. Street names shall be reviewed and approved by the Regional Street Naming Coordinator.
- ff. Proposed landscaping and/or fencing along street rights-of-way and within median islands shall be designed to meet American Association of State Highway and Transportation Officials (AASHTO) sight distances and safety guidelines. No tree shall overhang the curb line of any public street.

- gg. For any utilities placed in existing County streets, the streets shall be repaired to the satisfaction of the County Engineer. At a minimum, this will require full depth removal and replacement of asphalt for half the street width, or replacement of non-woven pavement reinforcing fabric with a 2" asphalt overlay for half the street width. Type II slurry seal is required for the entire street width with either option. Full width street improvements may be required if the proposed utility location is too close to the centerline of the existing street.
- hh. Streetlights shall be constructed to Washoe County standards at locations to be determined at the final design stage.
- ii. AASHTO clear zones shall be determined for all streets adjacent to retaining walls or slopes steeper than 3:1. If a recoverable or traversable clear zone cannot be provided, an analysis to determine if barriers are warranted shall be submitted for approval.
- jj. All retaining walls that are adjacent to, provide support for or retain soil from the County right-of-way shall be constructed of reinforced masonry block or reinforced concrete and designed by an engineer licensed in the State of Nevada.
- kk. No retaining walls that retain soil from the County right-of-way shall be located within a plowed snow storage easement.
- ll. Appropriate curve warning signs and/or a lower speed limit shall be determined and posted on all horizontal roadway curves that do not meet the standard Washoe County 25-mile per hour design speed. The minimum centerline radius allowed shall be 100'.
- mm. Appropriate transitions shall be provided between the existing and proposed improvements at all proposed street connections. This may include removal of existing pavement.
- nn. Access to parcels 017-053-01 & 02 from Moon Lane shall be perpetuated.
- oo. Any streetlights that do not meet Washoe County standards shall be placed outside Washoe County right-of-way. These streetlights shall be private, and the CC&R's shall indicate operation and maintenance of the streetlights shall be the responsibility of the Homeowners Association. The County Engineer and the District Attorney's Office shall determine compliance with this condition.
- pp. Provide a deceleration lane along the southern side of Geiger Grade (State Route 341) at the project entrance to the satisfaction of the County Engineer and NDOT.
- qq. An occupancy permit shall be obtained from NDOT for access to, from or under roads and highways maintained by NDOT, and a copy of the permit shall be submitted to the County Engineer prior to finalization of the affected final map.
- rr. A note on the final map shall state the no direct access from individual lots shall be allowed onto Geiger Grade or Shadow Hills Drive. This note shall also be included in the CC&Rs to the satisfaction of the District Attorney's office.

- ss. Prior to finalization of the any final map, provide written verification from NV Energy that proper clearances are maintained between the proposed improvements for Shadow Hills Drive and Moon Lane and the existing overhead power lines.

Washoe County Utilities

- 3. The following conditions are requirements of Washoe County Utilities, which shall be responsible for determining compliance with these conditions.

Contact: Tim Simpson, 775.954.4648, tsimpson@washoecounty.us

- a. All fees shall be paid or deferred in accordance with Washoe County Ordinance prior to the approval of each final map.
- b. Improvement plans shall be submitted and approved by CSD prior to approval of the final map. They shall be in compliance with Washoe County Design Standards and be designed by a Professional Engineer licensed to practice in the State of Nevada.
- c. The Applicant shall submit an electronic copy of the street and lot layout for each final map at initial submittal time. The files must be in a format acceptable to Washoe County.
- d. The Developer shall construct and/or provide the financial assurance for the construction of any on-site and off-site sanitary sewer collection systems prior to signature on each final map. The financial assurance must be in a form and amount acceptable to the CSD.
- e. Approved improvement plans shall be used for the construction of on-site and off-site sanitary sewer collection systems. The CSD will be responsible to inspect the construction of the sanitary sewer collection systems.
- f. The sanitary sewer collection systems must be offered for dedication to Washoe County along with the recordation of each final map.
- g. Easements and real property for all sanitary sewer collection systems and appurtenances shall be in accordance with Washoe County Design Standards and offered for dedication to Washoe County along with the recordation of each final map.
- h. A master sanitary sewer report for the entire tentative map shall be prepared and submitted by the applicant's engineer at the time of the initial submittal for the first final map which addresses:
 - i. the estimated sewage flows generated by this project;
 - ii. projected sewage flows from potential or existing development within tributary areas;
 - iii. the impact on capacity of existing infrastructure;
 - iv. slope of pipe, invert elevation and rim elevation for all manholes; and
 - v. proposed collection line sizes, on-site and off-site alignment, and half-full velocities.

- i. No Certificate of Occupancy will be issued until all the sewer collection facilities necessary to serve each final map have been completed, accepted and completed as-built drawings delivered to the utility. As-built drawings must be in a format acceptable to Washoe County.
- j. No permanent structures (including rockery or retaining walls, building's, etc.) shall be allowed within or upon any County maintained utility easement.
- k. A minimum 30-foot wide sanitary sewer easement shall be dedicated to Washoe County over any sanitary sewer not located within the proposed right-of-way.
- l. A minimum 12-foot wide all weather sanitary sewer access road shall be constructed to facilitate access to off-site sanitary sewer.
- m. Any major infrastructure such as pump structures, controls, telemetry and appurtenances, lift stations, force mains, sewer mains and interceptors that are necessary to accommodate the project, the Developer will be responsible to fund the design and construction. However, the actual design will be the responsibility of the CSD. Prior to initiation of design the Developer shall pay the estimated design costs to Washoe County. The CSD may either provide such design in-house, or select an outside consultant. When an outside consultant is to be selected, the CSD and the Developer shall jointly select that consultant.
- n. The CSD shall reserve the right to over-size the design of infrastructure to accommodate future development as determined by accepted engineering calculations. Funding shall be the responsibility of Washoe County. Washoe County shall either participate monetarily at the time of design and/or shall credit an appropriate dollar amount to the Developer at the time of recordation of the subdivision map.

Washoe County Health District

4. The following conditions are requirements of the Health District, which shall be responsible for determining compliance with these conditions. The District Board of Health has jurisdiction over all public health matters in the Health District. Any conditions set by the Health District must be appealed to the District Board of Health.

Contact: Wes Rubio, 775.328.2635, wrubio@washoecounty.us

The Environmental Health Services (EHS) Division requires the following conditions to be completed prior to review and approval of any Final Map:

- a. Prior to any final grading or other civil site improvements, a complete water system plan and Water Project submittal for the referenced proposal must be submitted to this Division. The plan must show that the water system will conform to the State of Nevada Design, Construction, Operation and Maintenance Regulations for Public Water Systems, NAC Chapter 445A, and the State of Nevada Regulations Governing Review of Plans for Subdivisions, Condominiums, and Planned Unit Developments, NAC 278.400 and 278.410.
 - i. The application for a Water Project shall conform to the requirements of NAC 445A.66695.

- ii. Two copies of complete construction plans are required for review. All plans must include an overall site plan, additional phases that will eventually be built to indicate that the water system will be looped, all proposed final grading, utilities, and improvements for the proposed application.
- b. Mass grading may proceed after approval of the Tentative Map and after a favorable review by this Division of a grading permit application.
 - i. The application shall include a Truckee Meadows Water Authority annexation and discovery with the mass grading permit.
- c. Improvement plans for the water system may be constructed prior to Final Map submittal only after Water Project approval by this Division.
 - i. For improvement plans approved prior to Final Map submittal, the Developer shall provide certification by the Professional Engineer of record that the improvement plans were not altered subsequent to Final Map submittal.
 - ii. Any changes to previously approved improvement plans made prior to Final Map submittal shall be resubmitted to this Division for approval per NAC 278.290 and NAC 445A.66715.

The EHS Division requires the following to be submitted with the Final Map application for review and approval:

- d. Construction plans for the development must be submitted to this Division for approval. The construction drawings must conform to the State of Nevada Regulations Concerning Review of Plans for Subdivisions, Condominiums and Planned Unit Developments, and any applicable requirements of this Division.
- e. Prior to approval of a Final Map for the referenced project and pursuant to NAC 278.370, the developer must have the design engineer or a third person submit to the satisfaction this Division an inspection plan for periodic inspection of the construction of the systems for water supply and community sewerage. The inspection plan must address the following:
 - i. The inspection plan must indicate if an authorized agency, city or county is performing inspection of the construction of the systems for water supply and community sewerage.
 - ii. The design engineer or third person shall, pursuant to the approved inspection plan, periodically certify in writing to this Division that the improvements are being installed in accordance with the approved plans and recognized practices of the trade.
 - iii. The developer must bear the cost of the inspections.
 - iv. The developer may select a third-person inspector but the selection must be approved by the Division or local agency. A third-person inspector must be a disinterested person who is not an employee of the developer.
 - v. A copy of the inspection plan must be included with the Final Map submittal.

- f. Prior to final approval, a "Commitment for Service" letter from the sewage purveyor committing sewer service for the entire proposed development must be submitted to this Division. The letter must indicate that the community facility for treatment will not be caused to exceed its capacity and the discharge permit requirements by this added service, or the facility will be expanded to provide for the added service.
 - i. A copy of this letter must be included with the Final Map submittal.
- g. Prior to final approval, a "Commitment for Water Service" letter from the water purveyor committing adequate water service for the entire proposed development must be submitted to this Division.
 - i. A copy of this letter must be included with the Final Map submittal.
- h. The Final Map application packet must include a letter from Nevada Division of Environmental Protection to this Division certifying their approval of the Final Map.
- i. The Final Map application packet must include a letter from Division of Water Resources certifying their approval of the Final Map.
- j. Pursuant to NAC 278.360 of the State of Nevada Regulations Governing Review of plans for Subdivision, Condominiums, and Planned Unit Developments, the development of the subdivision must be carried on in a manner which will minimize water pollution.
 - i. Construction plans shall clearly show how the subdivision will comply with NAC 278.360.
- k. Prior to approval of the final map, the applicant must submit to this Division the Final Map fee.
- l. All grading and development activities must be in compliance with the DBOH Regulations Governing the Prevention of Vector-Borne Diseases.

Truckee Meadows Fire Protection District (TMFPD)

5. The following conditions are requirements of the Truckee Meadows Fire Protection District, which shall be responsible for determining compliance with these conditions.

Contact: Amy Ray, 775.326.6005, aray@tmfpd.us

- a. Plans shall be submitted for review and approval to TMFPD.
- b. Any developments on the property shall meet the requirements of Washoe County Code (WCC) Chapter 60.
- c. HOA and CC&R requirements and conditions shall be submitted for review, comment and approval by TMFPD prior to recording, adoption and use.
- d. Open spaces and drainages shall be maintained in accordance with WCC Chapter 60, the Vegetation Management Plan and conditions placed in the HOA

and CC&R documents, ensuring vegetation management and maintenance in those areas.

- e. Two means of access and/or egress may be provided.
- f. Cul-de-sacs shall measure a minimum of 50-feet for radius and 100-feet for diameter.

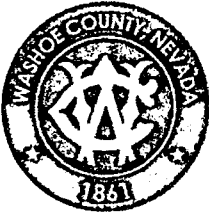
Truckee Meadows Water Authority (TMWA)

- 6. The following conditions are requirements of the Truckee Meadows Water Authority, which shall be responsible for determining compliance with these conditions. TMWA is directed and governed by its own board. Therefore, any conditions set by TMWA must be appealed to that board.

Contact: Amanda Duncan, 775.834.8035, aduncan@tmwa.com

- a. Truckee Meadows Water Authority will require dedication of acceptable water resources, approval of the water supply plan by the local health authority, the execution of a Water Service Agreement, payment of TMWA fees, and the construction and dedication of infrastructure in accordance with TMWA rules and tariffs in effect at the time of application for service.

*** End of Conditions ***



WASHOE COUNTY PLANNING COMMISSION Meeting Minutes

Planning Commission Members

James Barnes, Chair
Sarah Chvilicek, Vice Chair
Larry Chesney
Francine Donshick
Philip Horan
Greg Prough
Carl R. Webb, Jr., AICP, Secretary

Tuesday, February 7, 2017
6:30 p.m.

Washoe County Commission Chambers
1001 East Ninth Street
Reno, NV

The Washoe County Planning Commission met in a scheduled session on Tuesday, February 7, 2017, in the Washoe County Commission Chambers, 1001 East Ninth Street, Reno, Nevada.

1. Determination of Quorum

Chair Barnes called the meeting to order at 6:32 p.m. The following Commissioners and staff were present:

Commissioners present: James Barnes, Chair
Sarah Chvilicek, Vice Chair
Larry Chesney
Francine Donshick
Philip Horan
Greg Prough

Staff present: Carl R. Webb, Jr., AICP, Secretary
Kelly Mullin, Planner, Planning and Development
Eva M. Krause, AICP, Planner, Planning and Development
Dwayne E. Smith, Director, Engineering and Capital Projects
Nathan Edwards, Deputy District Attorney, District Attorney's Office
Katy Stark, Recording Secretary, Planning and Development
Kathy Emerson, Administrative Secretary Supervisor, Planning and Development

2. *Pledge of Allegiance

Commissioner Horan led the pledge to the flag.

3. *Ethics Law Announcement

Deputy District Attorney Edwards provided the ethics procedure for disclosures.

4. *Appeal Procedure

Mr. Webb recited the appeal procedure for items heard before the Planning Commission.

5. *Public Comment

Chair Barnes opened the Public Comment period. John Enloe, Director of Natural Resources Truckee Meadows Water Authority, said that he and Jim Smitherman would be in front of this Commission next month answering questions with respect to water and wastewater issues. The handout he provided to the Secretary contained suggested resource material regarding water rights, resources, and demand projections regarding ground water issues in Spanish Springs, which could be used as background material for the Commission to prepare for the meeting.

Jim Smitherman, Western Regional Water Commission and Northern Nevada Water Planning Commission, stated he brought to the Commission a draft report regarding a water balance budget being put together for the Regional Water Plan that was being updated now. He said it was in review and there may be some things that would change, but it would form the basis of the report he would bring to the Planning Commission next month.

Bill Whitney stated he retired as the Director of Planning and stopped by to say goodbye to the Commission. He thanked the Commission for their public service.

6. Approval of Agenda

In accordance with the Open Meeting Law, Commissioner Chvilicek moved to approve the Agenda for the February 7, 2017 meeting. Commissioner Donshick seconded the motion, which carried unanimously.

7. Approval of January 3, 2017 Draft Minutes

On motion by Commissioner Chesney, seconded by Commissioner Donshick, which carried unanimously, it was ordered that the minutes for January 3, 2017 be approved.

8. Planning Items

***A. Presentation on the Washoe County Regional Parks Master Plan – Dennis Troy, Park Planner.** Washoe County Regional Parks and Open Space (WCRPOS) is updating the Washoe County Regional Parks Master Plan. The presentation will discuss the update process, to include developing base maps for all parks, a demographic analysis, development of a capital improvement matrix and an analysis of investment strategies throughout the districts. In addition to these updates, the master plan process will look at the possibility of consolidating several of the 20 sub-districts into a smaller number of sub-districts to allow for more flexibility with regards to funding projects. The presentation will include the efforts/timeline moving forward.

Dennis Troy, Parks Planner, said he wanted to focus on the update of the county-wide Master Plan. He noted it was started a few years ago, tabled and then had been resurrected. The County currently did not have a Regional Parks Master Plan; they had several Master Plans for individual, specific regional facilities, but not one that took a look at the Parks throughout the County. He said there were about 35 parks, 35 neighborhood parks and pocket parks and 10 regional park facilities that were over 20 acres. He said there were also a number of special use facilities such as water parks, amphitheaters, archery facilities and horse arenas. The WCRPOS received its funding through the General Fund as well as grants, WC-1 Bond money and residential construction tax. He said the residential construction tax was collected when a new residence was built and they would contribute up to \$1,000 to a specific sub-district in the County. He showed a map which depicted where the 20 sub-districts were located and he explained how the tax was distributed. He said there was a wide-range of balances, some districts had over a million dollars and one district only had \$13.

Mr. Troy stated the County contracted with Wood Rodgers to help facilitate the process, which could take from six to nine months, but there would be significant outreach to different user groups and also the different jurisdictions, including the City of Sparks, Reno and other major entities. He said they were looking at consolidating some of the sub-districts because of the differences in fund balances. They would explore options which would allow for the flexibility of funding money throughout the general area.

Mr. Troy said they would also look at the surplus and deficiencies throughout the County; what areas were lacking parks and what areas had too many parks. He presented the NRPA National Standards that were just released, which reduced the average for residents served by parks. He said the most recent housing study showed a lot of growth and the EDawn numbers showed even more growth, so what they needed to do was focus on planning for that growth and put parks at the forefront and not an afterthought.

Mr. Troy said the Parks operating budget was at about a 60 percent reduction from 2007 to 2009. One of the things they were struggling with was maintaining existing and new facilities. He said there were districts that had funding to build a facility; however, they simply did not have the staff to maintain it. When they were contacted by the homeowner's associations about improving a pocket park they could easily provide the funding to construct it, but they had to enter into a maintenance agreement with them to maintain the facilities.

Mr. Troy said he met with Wood Rodgers last week and they started updating the base map and they had a lot of facilities to go through and account for. Now they were preparing the base map and working towards the demographic analysis. During the summer they would be going out and identifying facility priorities, as well as preparing a capital improvement matrix. They would hold the public outreach process this summer, which would be the main focus of the plan and update. He said they were going to shoot for adoption in the late fall of 2017.

Commissioner Chvilicek asked if he had heard any discussion about a piece of legislation to create a separate park district. Mr. Troy said he had.

Chair Barnes opened Public Comment. Hearing none, he closed the Public Comment period.

There was no action taken on this item.

9. Public Hearings

A. Amendment of Conditions Case Number WAC16-0001 for Tentative Subdivision Map Case Number TM05-011 (Ladera Ranch) – Hearing, discussion, and possible action to approve an amendment to two of the original conditions of approval for Tentative Subdivision Map Case Number TM05-011 (Ladera Ranch). The amendment seeks to reduce the side yard setback from 6-feet (existing) to 5-feet (proposed), and to reduce the front yard setback from 20-feet (existing) to 10-feet (proposed) for the living area of the house and side-turned garages. The front yard setback would remain 20-feet for front-facing garages.

- Applicant: D.R. Horton, Inc., Attn: Mark Jones, 1081 Whitney Ranch Drive, Henderson, NV 89014
- Property Owner: Ladera Ranch, LLC, Attn: Kelly Burt, 2641 Talon Way, Park City, UT 84060
- Location: South of the intersection of East Golden Valley Road/West 7th Avenue and Dream Catcher Drive

- Assessor's Parcel Numbers: Total of 113 parcels: 502-700-01; 502-700-02; 502-700-03; 502-700-06; 502-250-05; 502-711-01 to 14; 502-712-01 to 09; 502-721-01 to 13; 502-722-01 to 46; 502-731-01 to 10; and 502-732-01 to 16
- Parcel Size: Total project area is ±291.92 acres, with parcels ranging in size from ±5,713 square feet to ±157.79-acres
- Master Plan Categories: Suburban Residential, Rural Residential and Open Space
- Regulatory Zones: Medium Density Suburban, Low Density Suburban, High Density Rural and Open Space
- Area Plan: Sun Valley
- Citizen Advisory Board: Sun Valley
- Development Code: Article 408, Common Open Space Development and Article 608, Tentative Subdivision Maps
- Commission District: 3 – Commissioner Jung
- Section/Township/Range: Sections 13 and 24, T20N, R19E, MDM, Washoe County, NV
- Prepared by: Kelly Mullin, Planner
Washoe County Community Services Department
Planning and Development Division
- Phone: 775.328.3608
- E-Mail: kmullin@washoecounty.us

Mr. Webb identified the property. Chair Barnes called for any disclosures. Commissioner Horan stated he served on a Homeowner's Association Board that was in a development that D.R. Horton built and they were in the process of a construction defense lawsuit; however, he did not believe that would impact his ability to make a decision on this item. DDA Edwards asked if the destruction deficiency case Commissioner Horan referenced involved this project. Commissioner Horan stated no. DDA Edwards asked if he had a pecuniary interest in the outcome of this project. Commissioner Horan stated no. DDA Edwards asked if Commissioner Horan's commitment to the Homeowner's Association he served on would prevent him from functioning impartially in this matter. Commissioner Horan stated no.

Kelly Mullin, Planner, presented her Staff Report. Chair Barnes opened up questions to the Commission. Commissioner Horan asked if the setbacks requested were consistent with other developments in the immediate area. Ms. Mullin stated the closest development was to the west and was located within the City limits of Reno and she was uncertain what those setback requirements were. She said the average lot size was less than 7,500 square feet and was most comparable to High Density Suburban (HDS) Regulatory zone, which required five foot side yard setbacks and 20 foot front yard setbacks. She said she had seen in other subdivisions in the County where setbacks had been reduced for the living portion of the home and for side-turn garages.

Commissioner Chvilicek asked why they requested the change in the setback footage. John Krmpotic, KLS Planning and Design, stated he represented D.R. Horton. He referred to the PowerPoint he provided and said there was a lot that went on with regard to setbacks. What they had was typical of an HDS Subdivision with 5,700 square foot minimum lot sizes and higher. He reviewed slides he provided showing different yard designs with turned garages and different side setbacks and rear yard setbacks. He said with the 10 foot front yard setback they would expect a nicer street scape and a nicer neighborhood. He said many years ago they did it with 20 foot setbacks, garage forward, same roof lines and same elevations, which was not

what they wanted to do again. He said they believed the varied setbacks would give them more flexibility, less two-story products and more interest in the street scene.

Chair Barnes opened up Public Comment. Hearing none, he closed Public Comment and opened up questions to the Commission. Hearing none, he closed the Public Hearing and brought back discussion to the Commission. Hearing none he called for a motion.

Commissioner Prough moved that after giving reasoned consideration to the information contained within the staff report and received during the public hearing, the Washoe County Planning Commission approve Amendment of Conditions Case Number WAC16-0001 for D.R. Horton for Tentative Subdivision Map Case Number TM05-011 (Ladera Ranch), with the amended conditions of WAC16-0001 LADERA RANCH Washoe County Planning Commission Staff Report Date: January 23, 2017 Amendment of Conditions Case Number WAC16-0001 Page 8 of 8 approval included as Exhibit A to this matter, having made all ten findings in accordance with Washoe County Code Section 110.608.25. Commissioner Chesney seconded the motion, which carried unanimously.

1) Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan;

2) Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan;

3) Type of Development. That the site is physically suited for the type of development proposed;

4) Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System;

5) Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat;

6) Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems;

7) Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision;

8) Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles;

9) Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan; and

10) Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision. Appeal Process Planning Commission action will be effective 10 calendar days after the written decision.

B. Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) – Hearing, discussion, and possible action to approve a 56-lot single-family residential

subdivision on two parcels totaling ±28.76 acres. Residential lots will range in size from 14,520 sq. ft. (±0.33-acres) to 21,780 sq. ft. (±0.81-acres) with lot sizes averaging 17,869 sq. ft. (±0.41-acres). The subdivision includes approximately ±0.75-acres of common area for drainage facilities.

- Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511
- Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570
- Location: Immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive
- Assessor's Parcel Numbers: 017-520-03 and 017-480-02
- Parcel Sizes: 23.63-acres and 5.125-acres
- Area Plan: Southeast Truckee Meadows (SETM)
- Master Plan Categories: Suburban Residential and Rural
- Regulatory Zones: Medium Density Suburban (2 dwelling units per acre in SETM) and General Rural (1 dwelling unit per 40 acres)
- Citizen Advisory Board: South Truckee Meadows/Washoe Valley
- Development Code: Article 608, *Tentative Subdivision Maps* and Article 408, *Common Open Space Development*
- Commission District: 2 – Commissioner Lucey
- Section/Township/Range: Sections 27 and 34, T18N, R20E, MDM, Washoe County, NV
- Prepared by: Kelly Mullin, Planner
Washoe County Community Services Department
Planning and Development Division
- Phone: 775.328.3608
- E-Mail: kmullin@washoecounty.us

Mr. Webb identified the property for the Commission. Chair Barnes called for any disclosures. He disclosed he had received many emails, many public comment letters and he believed each Commissioner was given a copy of those emails and letters. Commissioner Horan said he received a phone call from Wood Rodgers who inquired if he would be interested in meeting with them to discuss this item; however, he declined the request. It was noted that all the Commissioners had been contacted by Wood Rodgers to discuss this item and they all declined.

Chair Barnes opened the public hearing. Kelly Mullin, Planner, presented her Staff Report.

Dwayne Smith, Director of Engineering and Capital Projects, addressed the drainage and flooding concerns raised by neighbors of this project. He said the proposed development had to go through the review processes which included the submittal of the Tentative Map, storm water reports and designs proposed for the development. He noted his staff reviewed the designs and reviewed the reports and their review confirmed the proposed project complied with what the County requirements were for storm water. He said he was speaking about storm water and not floodwater; there was a big difference between what they expected during flooding. He noted this project was located adjacent to a FEMA designated flood plain. He said the development had plans to mitigate impacts for storm water through routing of detention; there were several detention basins included in the proposed design, which was a requirement of all developments. They would also make sure the Final Map conformed to the Tentative Map requirements.

Commissioner Donschick asked if the properties in the southern portion would automatically be mandated to have flood insurance because they were in a FEMA flood plain. Mr. Smith stated the southern portion of the site was in the shaded zone "x" area. He said everywhere had the potential to flood, so even the areas that were outside the lines on the map could flood under certain conditions. The shaded zone "x" was what FEMA designated as the 500-year probability. The Code requirements did not require any special modifications to that area for development. The developer complied with Chapters 416 and 420 of the Development Code for detention and routing. He said there was no specific requirement to deal with the 500-year flood plain. The designated 100-year flood plain would have many requirements including special issues for building anything within that flood plain and those areas would require flood insurance.

Commissioner Chvilicek stated the upper area showed it was a floodway and it looked like it abutted the property and at some points went over the border of the property. Mr. Smith said he believed the entire project, except for the southern portion, was outside of the flood plain. Commissioner Chvilicek wondered what the unintentional affects could be on adjacent properties because there was lots of different topography and designated flood zone areas adjacent to this property. Mr. Smith said through his department's review of the project and confirming that it conformed to County requirements; all storm water that was captured on the property would be routed and conveyed to detention basins so post-development would not exceed pre-development flows, which was a basic requirement of all developments. He said when there were floods, they would exceed the carrying capacities of the designed infrastructure; the County did not require development to design infrastructure to handle those large flood events; it would not be reasonable, practical or cost-effective. The only requirement was for storm water and that's what Washoe County Engineering made sure the proposed design conformed to. Commissioner Chvilicek asked if the County required notification to potential future homeowners of the adjacency to different types of floodways and flood zones. Mr. Smith said he thought through the public process such as today and even going through the rest of it, there was a lot of public notification about where flood plains and floodways were. He said this development may also have an HOA and CC&Rs which could contain information regarding flood water and storm water. Commissioner Chvilicek wondered if future homeowners were given information regarding the risks. Mr. Smith said since this project was not within a FEMA defined flood plain, he did not believe there would be a specific notification process that the County or FEMA had to provide.

Chair Barnes called for the Applicant's presentation. Stacie Huggins, Wood Rodgers, representative of the Applicant, stated Ms. Mullin did a great job of covering the project. She said the developer agreed with staff and she introduced other individuals who were present that could answer any questions the Commission may have pertaining to specific issues such as traffic or legal issues. She stated disclosures regarding flood zones were commonly provided by the lenders and the developers through the Title Report process. Ms. Huggins went through her presentation and said the developer was proposing to install an emergency access gate at Moon Lane that would be closed until and unless the residents could not get out the other way. She stated the Fire Department would control it and the residents would not be able to control it. She went over key issues including drainage, utilities, traffic, schools, open space, lot matching, building types, horse migration, and access.

Chair Barnes opened the Public Comment period. Ray Fierro, 15200 Bailey Canyon Drive; Kathleen Pfaff, 15170 Bailey Canyon Drive; Tom Aust, 14668 Gold Run Drive; Cris Damico, 13583 Gold Run Drive; Elmira Coker, Geiger Grade; Randy Coker, Geiger Grade; Stephen Schrader, 14665 Gold Run Drive; Sandi Moore, 749 Sterling Hills Court; Karen Degney, 15150 Bailey Canyon Drive; Barbara Middleton, 1440 Moon Lane; Ron Ellis, 1260 High Chaparral Drive; Cathy Brandhorst; and, Don Dalliver, 14415 Chamy Drive all discussed their concerns with the project. Highlights of those concerns and opposition consisted of the petition in

opposition, the condition of Toll Road, drainage and flooding, wild horses, views, construction traffic, construction hours, noise, emergency access, school and school capacity, water resources, maintenance of open space, privacy, quality of life, one-story versus two-story dwellings, disclosures regarding the flood plain, pets and farm animals, ingress/egress, street names, annexation, property values, exit off of Kivett Lane, infrastructure, rural landscape, Moon Lane, crime and additional safety enforcement, property taxes and the condition of Geiger Grade.

Lonnie Edwards-Detrick, 15111 Kivett Lane, stated she was in favor of the proposed development. She said she had lived there a long time and she would be happy to see new homes and development instead of junk yards. She said no one from Kivett Lane had been before the Commission because most of them on that side supported the development; they were looking forward to having an upscale community on half-acre lots. Bruce Bacon, 1530 King Lane; stated he was also in favor of the project because he did not want to see land grabbed by the City of Reno. He did not think the County would ever improve the Toll Road intersection unless a subdivision of this size and caliber was developed. He noted there was a lot of trespass on the project with motorcycles and off-road vehicles, which was a tremendous nuisance.

Chair Barnes closed the Public Comment period and opened up questions for the Commission. Commissioner Chesney asked Mr. Smith if he knew of any future plans for helping facilitate the drainage on Geiger Grade. Mr. Smith stated they could come back on a future agenda to talk about flooding in that area.

Commissioner Prough said he was a Realtor by profession and when people bought homes the underwriters would require flood insurance when they were in a flood zone. He asked what financing companies would be used. Rich Balestreri, Sacramento, California, stated they would be using Wells Fargo who would not underwrite in a flood zone but would underwrite these because they were not in a flood zone. Commissioner Prough asked what the homes would be going for. Mr. Balestreri stated he did not have an exact number but believed a little higher than \$400,000. Commissioner Prough stated if they were going to be using in-house financing then there would be a disclosure to every potential homeowner that they may be required to purchase flood insurance in order to complete the deal. Mr. Balestreri said he disagreed because they were not in a flood zone. Zone "x" was a 100-year flood zone and as far as he knew that was not a requirement for flood insurance. Commissioner Prough said he bought in this area at one time and Bank of America said it was not required, but then 18 months later FEMA came back and said it was and tried to force him to purchase flood insurance. His concern for the public was that there be a disclosure by the underwriters that flood insurance may be required.

Steve Mollath, Attorney, stated they would disclose whatever they were required to disclose to the buyers under any law, statute, regulation or ordinance, whether it be federal, state or local. Mr. Balestreri stated they were very thorough on their disclosures and as they vetted out more fully through the process, everything that had to be disclosed would be disclosed. Commissioner Prough stated he was making it a point of record because the Commission had questioned the fact about flood insurance and the flood zone and the public had shown photographs of abnormal amounts of water. He understood flooding could happen at any time; however, he just wanted to make sure that everyone went in with their eyes wide open.

Commissioner Prough said Nevada law required open range disclosure with regard to the wild horses and he wanted to make sure that was disclosed as well. Mr. Mollath stated all requirements that covered every development in the state would be followed and any of the FEMA, Corps of Engineers, lenders and bank's regulations would be followed.

Commissioner Prough said there was a lot of concern regarding the wild horses and designating a wild horse to a feral horse seemed a little unjust. He asked if there was any thought about gathering them up and taking them to the project in Palomino Valley. Ms. Huggins stated they had not looked into that. Commissioner Prough said he would like to see some kind of discussion regarding gathering them up as opposed to them getting hit by cars. Ms. Huggins said Ms. Mullin reached out to the Department of Agriculture to see what could be done as they were the entity that oversaw those horses.

Mr. Webb said he knew they had tried to take some of those horses out of that area in the past, specifically from the Virginia Foothills and the Virginia Highlands. He said when the BLM cleared the Virginia Highlands and Foothills area, what was left were the strays and those were actually feral horses. There had been a lot of sentiment and controversy on both sides of the issue over the years, but the point was they were classified as stray/feral horses with certain protections that mainly protected the property owner. He pointed out there was nothing in County Code that would provide for the protection for stray/feral horses, so he cautioned the Commission from heading down that path. Commissioner Prough said he could not imagine having feral horses wandering around a proposed project that would create traffic hazards. Ms. Huggins said from the developer's perspective that was a conversation to have with the Department of Agriculture, and they did not want to see any tragedy happen.

Commissioner Donshick said traffic was a major concern and their plan was one left-hand deceleration lane and she wondered if that was because currently it met the level of standards for that area and did not warrant anything more at this time. Mr. Smith said the traffic study that was submitted, even though it was not required, gave some recommendations. He said 56 homes and the number of movements identified in the traffic report did not meet warrants for traffic signalization on Geiger Grade.

Commissioner Chvilicek said the map displayed had two common areas and the detention area and she wondered if one was being shared as common area with the other development. Ms. Huggins asked if she was talking about the Creek common area. Commissioner Chvilicek stated that was correct. Ms. Huggins stated that common area was not being absorbed as part of this project; that common area was part of the 1994 original approval of the bigger project. Currently, the ownership of those parcels was still under Mr. Maddox's name and they were not encroaching into those with the exception of the one detention area. Commissioner Chvilicek asked if they were proposing annexation. Ms. Huggins stated no; however, several months ago they looked at the opportunity to increase the density. They discovered that could not happen so they looked at the opportunity to annex. She said that application was pulled by the developer because they decided they would rather build a project that met County Code to the density that was in the Area Plan and be consistent with the character of the neighborhood.

Commissioner Chvilicek stated a few months ago there was a preliminary presentation on approved-but-not-yet-built developments. She said she saw no reference in this submittal for approved-but-not-yet-built properties in the area. Ms. Mullin said she thought that had been provided to the Commission in Exhibit G of approved residential subdivisions in the vicinity of Toll Road. Commissioner Chvilicek asked if staff would make that more prominent within the Staff Report. Mr. Webb stated staff prepared the map and was asked to focus on the East side of the Highway and when they realized nothing was there, staff expanded the scope to try and pull in those approved and not yet built properties.

Commissioner Chvilicek said many months ago the Commission asked for a decision tree or plan of action so that at the CAB level people would know what the steps were. Mr. Webb said staff had been working on that and the flow chart was being created. Commissioner Chvilicek

stated she thought the community was not fully aware of all the steps that went into play and all of these citizens came tonight to voice their concerns. The decision the Commission would be making tonight was on a Tentative Map and these concerned citizens would have to come back and come back. She said if they saw a flow chart they would understand what was involved.

Commissioner Chvilicek asked if the County had updated FEMA maps of this area. Mr. Smith stated the FEMA map he printed out had been revised in March 2009.

Chair Barnes closed the public hearing and brought it back to the Commission for discussion. Commissioner Chesney stated this was the beginning of a long drawn out process and what occurred tonight would be the first step of months and possibly years of getting to a Final Map. He said although he had sympathy for the wild horses and the flooding, the owner of this property had a constitutional right to develop his property. He was not sure if he supported this or not, but he felt the public should know that these sorts of developments had many steps to be addressed between now, the Final Map and the actual development. He acknowledged the public would have many chances to give input and give the developer time to address those issues.

Commissioner Horan said one of the challenges he faced as a member of this Commission was that they had to look at what the Code stated and what the experts said about the project. Although sometimes they would be sympathetic about certain situations, they had to comply with the Codes and he believed what was presented was in line with what the Code required.

Commissioner Prough said when a project was brought to the Commission by staff they had to look at Code and recommendations specifically; however, they did not ignore the emotional impact on either side of those who wanted the project and those who did not want the project. He said each voice was equal when they listened to the arguments, which meant all they could do was go by the Code and determine if the Applicant met the requirements. If the public did not like the way the Code was written, he suggested they take steps to change them. He did not think this project would be detrimental to the area from a financial standpoint by lowering property values. He noted any home that started at \$400,000 and up could only bring the property values up. He said there were some things to work out, but under this Tentative Map it was okay for the Commission to go ahead and approve it because the Applicant had met the necessary requirements to take the next step.

Commissioner Chvilicek applauded staff and the developers for recognition of the Southeast Truckee Meadows Area Plan and the restrictions that the citizens developed to protect their area. She said the Area Plan was a very binding, strong document.

Chair Barnes called for a motion.

Commissioner Chesney moved that after giving reasoned consideration to the information contained in the staff report and information received during the public hearing, the Washoe County Planning Commission approve Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) for Silver Crest Homes, with the Conditions of Approval included as Exhibit A to this matter, having made all ten findings in accordance with Washoe County Code Section 110.608.25. Commissioner Prough seconded the motion, which carried unanimously.

1) Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan;

2) Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan;

3) Type of Development. That the site is physically suited for the type of development proposed;

4) Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System;

5) Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat;

6) Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems;

7) Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision;

8) Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles;

9) Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan; and

10) Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision. Appeal Process Planning Commission action will be effective 10 calendar days after the written decision.

C. Abandonment Case Number AB16-005 (Havniear) – Hearing, discussion, and possible action to approve the abandonment of a 4 foot wide strip of public right-of-way (305.5 sq. ft.) along the front (southern) property line of 70 Sunbeam Lane.

- Applicant: Jerry Havniear
- Property Owner: Jerry Havniear
- Location: 70 Sunbeam Lane
- Assessor's Parcel Number: 045-611-06
- Parcel Size: 1.022 acres
- Master Plan Category: Suburban Residential (SR)
- Regulatory Zone: Low Density Suburban (LDS)
- Area Plan: South Valleys
- Citizen Advisory Board: South Truckee Meadows/Washoe Valley
- Development Code: Article 806 Vacations and Abandonments of Easements or Streets
- Commission District: 2 – Commissioner Lucey
- Section/Township/Range: Section 07, T17N, R20E, MDM, Washoe County, NV
- Prepared by: Eva M. Krause - AICP, Planner
Washoe County Community Services Department
Planning and Development Division
- Phone: 775.328.3628
- E-Mail: ekrause@washoecounty.us

Mr. Webb identified the property. Chair Barnes called for any disclosures from the Commissioners. Hearing none, he opened the Public Hearing. Eva Krause, Planner, presented her Staff Report. She said it was staff's recommendation to deny.

Chair Barnes opened up questions to the Commission. Commissioner Chesney asked exactly how the abandonment resulted in material injury to the public. Dwayne Smith, Washoe County Engineer, stated rights-of-way were present for the public's benefit and had been set aside for the benefit of the public. He believed if the County began the process of abandoning public rights-of-way that would not be good practice and he believed there was an alternative the property owner could go through. Commissioner Chesney asked what that was. Mr. Smith responded there were two processes; abandonment or a variance. He was opposed to abandonments and he believed a variance would be better.

Commissioner Chvilicek asked how the homeowner could obtain a variance to reduce the setback when the site plan stated there were few solutions, none of which were easily achieved. Ms. Krause said she could not see how planning staff could professionally make a recommendation of approval for a variance because it was a self-induced hardship. She noted another correction could be to tear down the new addition, but she hated to see that happen for this project. Mr. Webb stated that any action by this Commission or the Board of Adjustment could be appealed to the Board of the County Commissioners (BCC). He asked if the Commission recalled prior abandonments cases where Mr. Smith had appeared and stated it was his recommendation to not abandon any rights-of way. He said if the Applicant decided to go forward with the variance and the Board of Adjustment denied it, it could be appealed and approved by the BCC.

Chair Barnes called for the Applicant's presentation. Derek Wilson, Rubicon Design Group, gave his presentation. He said he did not believe this project provided any public benefit and it would not be a detriment to the public. He said the owner hired someone to build a garage and he thought that professional would adhere to the rules. The contractor took a plan to County staff, but took a shortcut and put the garage in the wrong spot. He said he did not know how the owner would know what was correct as he was not a contractor and he did not measure it; he took the builder's word for it. The owner had attempted to get in touch with the contractor, but to no avail as the contractor disappeared. He showed a picture of the property and said the neighbors did not find the garage a detriment. He said they were asking to abandon a four-foot strip of extra right-of-way that went around his cul-de-sac. By getting rid of that strip, it would change the setback and make his garage legal. He said they were proposing to protect the public's interest by removing that right-of-way and replacing it with a public's use easement so all the functions of the right-of-way would be maintained with the one exception of adding a new street. He proposed there was no scenario that would require additional street space because that street would not connect anywhere. He said staff modified their request to only abandon the section that was directly in front of the garage, which was fine with the owner. Mr. Wilson said County Engineering had a finding objection but he felt they could find that the public would not be harmed. He agreed the variance process would be difficult for them because variance language tended to refer to parcel shapes and topography and not to structures.

Chair Barnes opened Public Comment. Cathy Brandhorst spoke on issues of concern to herself. Chair Barnes closed the Public Comment period and opened up discussion to the Commission.

Commissioner Chvilicek said in the initial presentation Ms. Krause stated those findings could be found. Ms. Krause stated the No Detriment was the one they had an issue with but the Master Plan and the existing easements were fine. Commissioner Chvilicek asked if the public easement was something that would be palatable to staff. Ms. Krause said it would be.

Chair Barnes closed the Public Hearing and called for discussion. Commissioner Horan said this was a case that the Commission needed to follow the recommendations and the Code and he did not support it because the Applicant could find an alternative solution. Commissioner Prough said he believed this was so minor and the Applicant's request would not disturb anyone and he supported it. Commissioner Chesney stated he felt the Applicant was more of a victim and he agreed with the Engineer that once the Commission went down this road and allowed abandonments it would set a precedent, but he believed the Commission should have the ability to make an exception. He said he supported allowing the abandonment.

Commissioner Chvilicek stated Ms. Krause referenced Exhibit D, which was not in the Commission's packet. Ms. Krause stated that was correct. Exhibit D contained the conditions of approval should the Commission approve the project. DDA Edwards informed the Commission they could make a note for the record that Exhibit D with proposed conditions of approval had been provided to the Commission and copies would be made available to the public.

Chair Barnes called for a motion.

Commissioner Prough moved that after giving reasoned consideration to the information contained in the staff report and information received during the public hearing, the Washoe County Planning Commission approve with conditions submitted by Staff as Exhibit D Abandonment Case Number AB16-005 for Havniar, having made all three of the following findings in accordance with Washoe County Code Section 110.806.20. Mr. Webb asked if the motioner could be specific to the No Detriment Finding. Commissioner Prough said when he looked at the map he did not see where that little bit of real estate would be a detriment to the County in anyway. Commissioner Chesney seconded the motion. Commissioner Horan stated he was sympathetic to the case but felt there were other avenues available to the Applicant. Commissioner Chvilicek said the owner's agent offered a viable alternative through a public easement and she supported the project. Commissioner Donshick concurred with Commissioner Chvilicek. On call for the vote, the motion carried four in favor and Commissioner Horan and Chair Barnes voting nay.

- 1) Master Plan. The abandonment or vacation is consistent with the policies, action programs, standards and maps of the Master Plan and the South Valleys Area Plan; and
- 2) No Detriment. Due to the small amount of right-of-way being abandoned, the abandonment does not result in a material injury to the public; and
- 3) Existing Easements. Existing public utility easements in the area to be abandoned or vacated can be reasonably relocated to provide similar or enhanced service.

10. Chair and Commission Items

***A. Future agenda items**

Commissioner Donshick stated that she would like to know where the flood plains were within the County and some storm water mitigation information that would help the Commission. Mr. Webb asked if she was referring to the flood plains or discussion about the recent flooding. Commissioner Chvilicek stated Mr. Smith indicated he would talk to the Commission about storm water runoff and flood runoff and what the County's plan was for all of that. Mr. Webb stated Water Resources would be attending the meeting in March and he wondered if it was okay if they moved that presentation to the April meeting and Commissioner Donshick stated that would be fine.

Commissioner Chesney wanted to let the Commission know that he put his home on the market and would be moving to Tucson, Arizona and would give a written resignation to the Commission once his home was in escrow. He said it had been an honor to serve on this Commission.

***B. Requests for information from staff**

There were none.

11. Director's and Legal Counsel's Items

***A. Report on previous Planning Commission items**

Mr. Webb stated the Code Amendment for cell towers in the General Residential zone in Warm Springs had been pulled from the January 10th Board of County Commissioner's agenda and was rescheduled to February 14th and February 28th. He noted it was pulled because of concerns from the Commissioner who represented that District and a CAB member.

***B. Legal information and updates**

There were no updates.

12. General Public Comment

Chair Barnes opened Public Comment. Cathy Brandhorst spoke on issues of concern to herself. Lonnie Edwards-Detrick stated earlier this evening there was mention of a petition. She said it was an online petition and she was concerned that folks from California, Arizona and Sparks were concerned about this little 56 lot development that was in her backyard. The reason she knew where some of those people were from was because she decided to go to the Assessor's Office and look them up. She hoped all of the names on the petition did not hold too much weight with the Commission because most of them did not live there and would not be affected. She mentioned as she went through the Southeast Truckee Meadows Master Plan she noticed there were two emergency roads planned for that area that was supposed to lead out of Toll Road. She was not sure any of the folks that were concerned about the accesses read the STMAP, because she had not read it either. She said that Plan was written in 2011 and she wondered what the current status was. She said the CAB meeting minutes did not address the four points she addressed in her letter and she was concerned about that because the minutes said all she spoke about was the flooding and that was not an accurate statement. She did speak about flooding but she spoke about a lot more.

13. Adjournment

9:34 p.m. Commissioner Donshick moved to adjourn the meeting, which carried unanimously.

Respectfully submitted,

Jaime Deller, Independent Contractor

Approved by Commission in session on March 7, 2017.

Carl R. Webb, Jr., AICP
Secretary to the Planning Commission



Planning Commission Staff Report

Meeting Date: February 7, 2017

Subject: Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates)

Applicant: Silver Crest Homes

Agenda Item Number: 9B

Project Summary: 56-lot single-family residential common open space subdivision

Recommendation: Approval with Conditions

Prepared by: Kelly Mullin, Planner
Washoe County Community Services Department
Planning and Development Division
775.328.3608
kmullin@washoecounty.us

Description

Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) – Hearing, discussion, and possible action to approve a 56-lot single-family residential subdivision on two parcels totaling ±28.76 acres. Residential lots will range in size from 14,520 sq. ft. (±0.33-acres) to 21,780 sq. ft. (±0.81-acres) with lot sizes averaging 17,869 sq. ft. (±0.41-acres). The subdivision includes approximately ±0.75-acres of common area for drainage facilities.

- Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511
- Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570
- Location: Immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive
- Assessor's Parcel Numbers: 017-520-03 and 017-480-02
- Parcel Sizes: 23.63-acres and 5.125-acres
- Area Plan: Southeast Truckee Meadows (SETM)
- Master Plan Categories: Suburban Residential and Rural
- Regulatory Zones: Medium Density Suburban (2 dwelling units per acre in SETM) and General Rural (1 dwelling unit per 40 acres)
- Citizen Advisory Board: South Truckee Meadows/Washoe Valley
- Development Code: Article 608, *Tentative Subdivision Maps* and Article 408, *Common Open Space Development*
- Commission District: 2 – Commissioner Lucey
- Section/Township/Range: Sections 27 and 34, T18N, R20E, MDM, Washoe County, NV

Staff Report Contents

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Exhibit Contents

Conditions of Approval Exhibit A

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Public Notice Map Exhibit C

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Project Application Exhibit E

Traffic Impact Report, Dated December 2016 Exhibit F

Map of Approved Residential Subdivisions in Vicinity of Toll Road..... Exhibit G

Tentative Subdivision Map Process

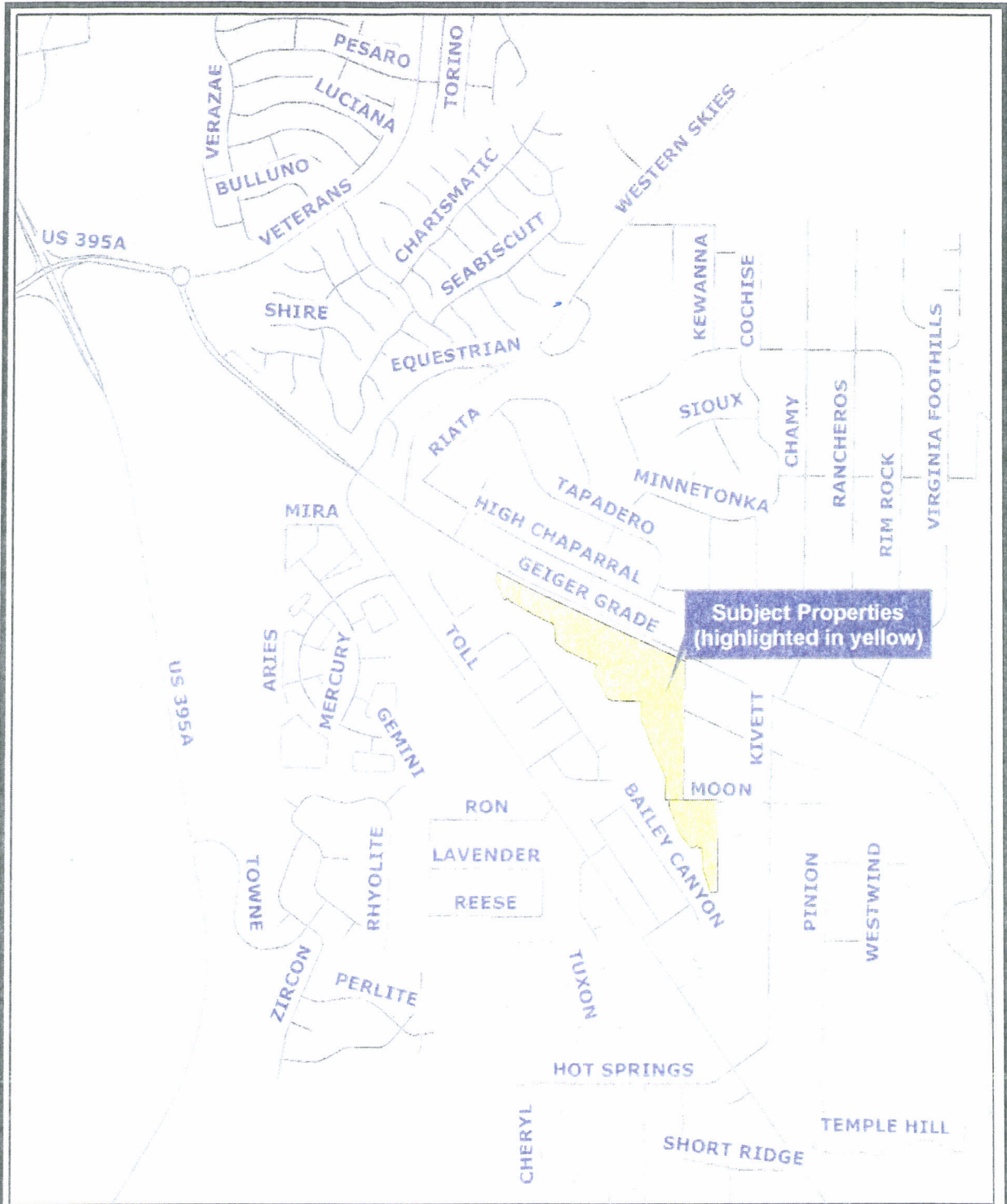
The purpose of a Tentative Subdivision Map is:

- To allow the creation of saleable lots;
- To implement the Washoe County Master Plan, including the Area Plans;
- To establish reasonable standards of design and reasonable procedures for subdivision and re-subdivision in order to further the orderly layout and use of land and insure proper legal descriptions and monumenting of subdivided land; and;
- To safeguard the public health, safety and general welfare by establishing minimum standards of design and development for any subdivision platted in the unincorporated area of Washoe County.

If the Planning Commission grants approval of the Tentative Subdivision Map, that approval is subject to Conditions of Approval. Conditions of Approval are requirements that need to be completed during different stages of the proposed project. Those stages are typically:

- Prior to recordation of a final map.
- Prior to obtaining a final inspection and/or a certificate of occupancy on a structure.
- Prior to the issuance of a business license or other permits/licenses.
- Some Conditions of Approval are referred to as "Operational Conditions." These conditions must be continually complied with for the life of the project.

The Conditions of Approval for Tentative Subdivision Map Case Number WTM16-003 are attached to this staff report and will be included with the Action Order if the Planning Commission approves the application.



Tentative Subdivision Map Case No. WTM16-003
Bailey Creek Estates



0 500 1,000
 Feet

Community Services
 Department, Planning
 and Development

WASHOE COUNTY
 NEVADA

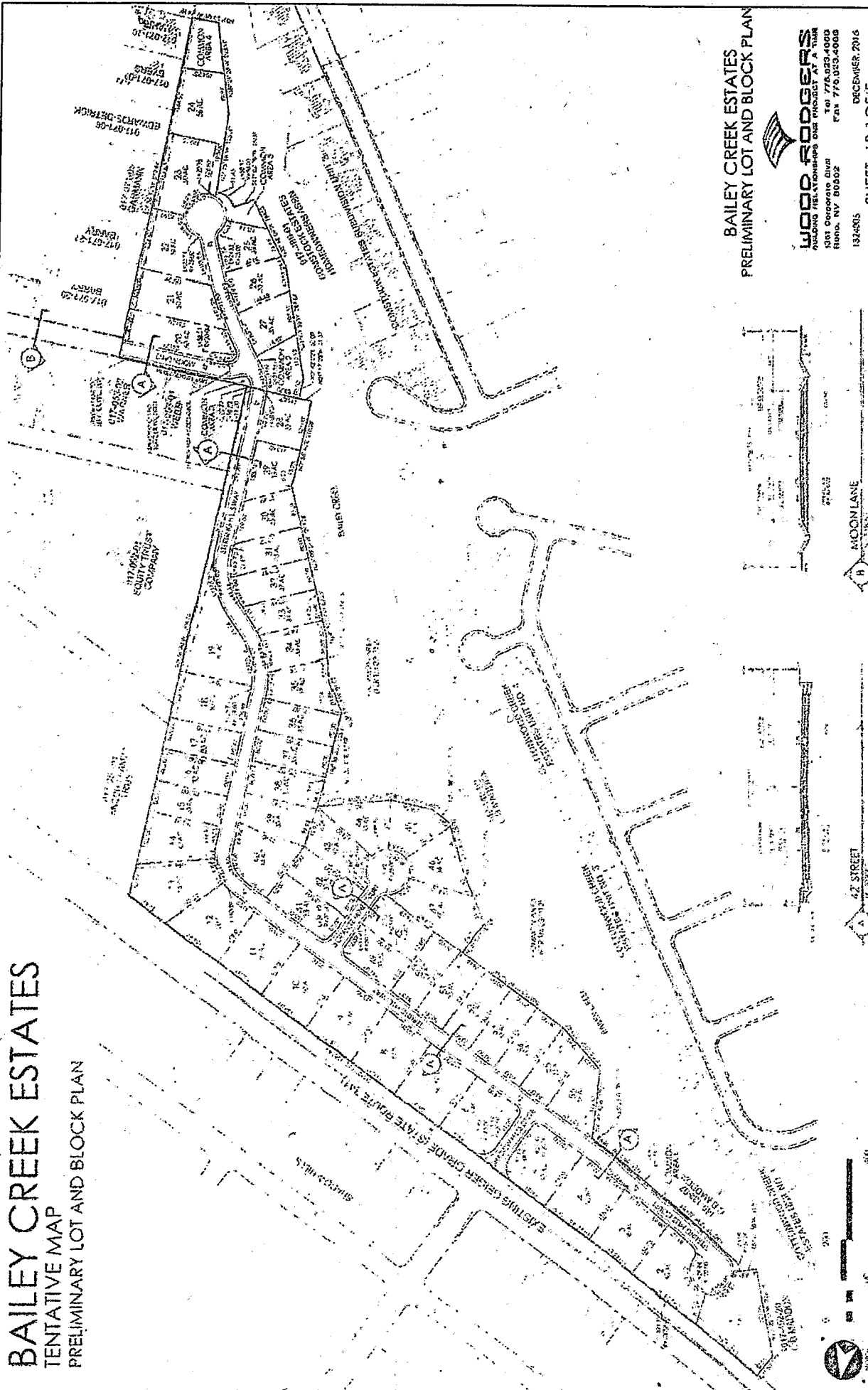
Source: Planning & Development

Date: January 18, 2017

Post Office Box 11150
 Reno, Nevada 89520 (775) 829-3900

Vicinity Map

BAILEY CREEK ESTATES TENTATIVE MAP PRELIMINARY LOT AND BLOCK PLAN



BAILEY CREEK ESTATES
PRELIMINARY LOT AND BLOCK PLAN



WOOD RODGERS
Subdividing Real Estate and Planning
1001 Colorado Blvd. Suite 400
Reno, NV 89502
1324505
FAX 775.353.4008
DECEMBER 2016

SHEET 1B-1 OF 5

Site Plan

Project Evaluation

The applicants are proposing to develop a 56-lot single-family residential subdivision on two parcels totaling ± 28.76 acres. The property has a regulatory zone of Medium Density Suburban (MDS), with a small portion of the property zoned General Rural (GR). In the Southeast Truckee Meadows Area Plan, MDS properties are limited to two dwelling units per acre, and the proposed subdivision maximizes its density with 56 residential lots. These residential lots will range in size from 14,520 sq. ft. (± 0.33 -acres) to 21,780 sq. ft. (± 0.81 -acres) with lot sizes averaging 17,869 sq. ft. (± 0.41 -acres). The subdivision also includes five smaller parcels that together total approximately ± 0.75 -acres of common area for drainage facilities.

The Southeast Truckee Meadows Area Plan identifies the subject site as being located within the Suburban Character Management Plan and Toll Road Character Management Area. As identified later in this report, the project is in compliance with the policies for these two areas.

Compatibility

This infill subdivision is situated between other residential developments sharing the same Medium Density Suburban regulatory zone.

- **West:** To the west of the property, across Bailey Canyon Creek, is the Cottonwood Creek Estates subdivision – a common open space development with the nearest lots ranging from approximately 1/4-acre to 1/3-acre in size. The Cottonwood Creek Estates subdivision's common open space separates it from the proposed Bailey Creek Estates project.
- **North:** Across Geiger Grade to the north are the Shadow Hills and Sagewood Estates subdivisions, which also share the MDS regulatory zone. Many of these lots are approximately 1/2-acre in size.
- **East:** To the east of the subject site are additional properties sharing the MDS regulatory zone, with the exception that they are also within a Trailer Overlay zone. These properties range in size from $\pm 1/2$ -acre to ± 3.75 acres and are individually developed residential properties. To the northeast is an area of several parcels with the General Commercial regulatory zone. The commercially zoned property abutting the northeast corner of the project site is currently undeveloped.
- **South:** To the south is the Comstock Estates subdivision, which contains additional MDS properties approximately 1/3 acre in size.

The Southeast Truckee Meadows Area Plan contains several policies requiring proposed development to minimize potential impacts to neighboring properties. These policies, and associated conditions of approval, are discussed beginning on page 9 of this staff report. Additionally, construction hours will be limited to 7 a.m. to 7 p.m., Monday through Saturday.



Photo: The project site (outlined in blue) is largely surrounded by other residential developments.

Washoe County Schools

The Washoe County School District (WCSD) anticipates the project to generate 14 new elementary school students, 3 middle school students and 7 high school students. The property is currently zoned for Brown Elementary School, Depoali Middle School and Damonte Ranch High School. WCSD has indicated that Brown Elementary School is operating at 137 percent of base capacity, Depoali Middle School at 94 percent of base capacity and Damonte Ranch High School at 108 percent of base capacity. Brown Elementary is scheduled to convert to a multi-track, year-round calendar for the 2017-18 school year. WCSD has stated that students from this development may be assigned to the closest schools with available capacity.

Traffic

The primary access to the project site is off of Geiger Grade, immediately opposite of Shadow Hills Drive. Gated emergency vehicle access will be provided off Moon Lane, which connects to

Kivett Lane. The project is anticipated to create 533 average daily trips, with 42 AM peak hour trips and 56 PM peak hour trips. The subdivision is below the threshold requiring a traffic impact report; however, the applicant did supply one as a courtesy to Washoe County for review. It is attached as Exhibit F.

The Washoe County Engineering and Capital Projects Division has provided several proposed standard conditions of approval related to traffic for the proposed development. These are included within Exhibit A. A deceleration lane will also be required along Geiger Grade to the entrance of the subdivision.

Grading and Drainage

The subject site is vacant and without significant topographic features. It is relatively level and slopes gently down from east to west. The Southeast Truckee Meadows Area Plan's Development Suitability Map identifies the property as being "most suitable" for development.

Currently, the parcels are largely undisturbed and contain significant native vegetation. The anticipated grading necessary to support the project involves the disturbance of approximately 29 acres, including the cut and fill of approximately 50,000 cubic yards of material to be balanced on site. The maximum allowable steepness for cut and fill within the development are 3:1 slopes.

Bailey Canyon Creek is located on adjacent property to the west of the project area. The northern parcel is largely FEMA Flood Zone X, with the southern parcel largely identified as Shaded X. Five common areas within the project boundaries are proposed for drainage and on-site detention. A preliminary drainage report was provided with the application and reviewed by the Engineering and Capital Projects Division. That division has provided several proposed conditions of approval related to drainage and stormwater discharge. The final design of the drainage system will need to ensure that the development has mitigated any increase in runoff, and that all storm drainage improvements are designed and constructed to Washoe County standards.

The continuing maintenance of common areas will be required to be addressed in the CC&Rs and funded in perpetuity through the homeowners' association.

Fire Protection

Fire protection services will be provided by the Truckee Meadows Fire Protection District (TMFPD). TMFPD has provided proposed conditions of approval related to overall development, open space and drainage area maintenance, access and turn-around widths. All development on the property will be required to comply with Washoe County Code Chapter 60.

Water and Sewer

The project is located within the Truckee Meadows Water Authority (TMWA) retail water service area, and TMWA will be the water service provider. An Acknowledgment of Water Service letter was provided to the applicant from TMWA and was included with the application. TMWA's provision of water will be contingent on the applicant satisfying a number of proposed conditions, including those identified in Exhibit A.

The State of Nevada's Division of Water Resources also reviewed the project and indicated that municipal water service is subject to TMWA requirements and approval by the Office of the State Engineer regarding water quantity and availability.

Sewer service will be provided by Washoe County and treatment will be at the South Truckee Meadows Water Reclamation Facility.

Relevant Southeast Truckee Meadows Area Plan Policies

SETM.2.2 The installation of new streetlights will be minimized and if approved will be for safety reasons. Any lighting proposed must show how it is consistent with current best practice “dark-sky” standards. Lights shall be shielded to prevent light spillage onto adjacent properties or streets.

Staff comment: A proposed condition of approval to this effect has been included with Exhibit A. Lighting will also be reviewed by the Design Review Committee, if this project is approved.

SETM.2.3 Site development plans for new subdivisions, commercial and public facilities in the Southeast Truckee Meadows planning area must submit and follow a plan for the control of noxious weeds. The plan should be developed through consultation with the Washoe County District Health Department, the University of Nevada Cooperative Extension, and/or the Washoe Story Conservation District.

Staff comment: A proposed condition of approval to this effect has been included with Exhibit A.

SETM.2.4 Applicants required to present their development proposal items to the Citizen Advisory Board must submit a statement to staff, not later than one week, following the meeting date, explaining how the final proposal responds to the community input received from the Citizen Advisory Board.

Staff comment: The South Truckee Meadows/Washoe Valley Citizen Advisory Board meeting will be held after this staff report is completed. However, the applicant’s statement will be provided to the Planning Commission prior to the February 7, 2017 hearing for this item.

SETM.2.5 During review of tentative maps and other development proposals, the Planning Commission will review the adequacy of the minimum standards established under Goals 2, 3, 4, and 5; and upon a finding that a standard is inadequate to implement these goals, may impose other similar standards as necessary to implement the relevant goal.

Staff comment: As discussed in this report, the proposed project meets (or there are proposed conditions for it to meet) the policies and goals of the Southeast Truckee Meadows Area Plan, including Goal 2. Goals 3, 4 and 5 are not applicable to the project site, as they provide guidance for other areas of the Southeast Truckee Meadows.

SETM.2.7 Dwellings in new subdivisions adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30 foot or wider landscaped buffer area.

Staff comment: A proposed condition of approval to this effect has been included with Exhibit A.

SETM.2.8 New subdivision homebuilders must offer at least two separate xeriscape options for subdivision landscape design that emphasize the use of native vegetation, with non-native and atypical vegetation integrated sparingly into any landscaped area.

Staff comment: A proposed condition of approval to this effect has been included with Exhibit A. Landscaping will also be reviewed by the Design Review Committee if this project is approved.

SETM.2.13 Ensure that future residential development within the medium density suburban land use designation is constructed at a maximum of two single-family dwelling units per acre. Lot sizes shall not be less than one-third acre and this size may be allowed only under the following conditions:

- a. New subdivisions must provide one-half acre minimum lot sizes on exterior lots when abutting a developed medium density suburban land use designation with one-half acre or greater lot sizes (roads or open space do not create non-abutting parcels).
- b. Exterior lots may be reduced to one-third acre when abutting a developed higher intensity land use designation or a ten-acre or larger undeveloped medium density suburban designation.

Staff comment: The subdivision design meets the provisions of this policy. Exterior lots of 0.5-acres or more are proposed when adjacent to existing MDS lots of this size or greater. No other lots are smaller than 0.33-acres in size.

SETM.11.5 Soils disturbed through the development process and left untreated for more than 30 days shall be re-vegetated or treated in a manner to prevent the blowing of soil from the site by wind or the movement of soil by precipitation. Drought tolerant/fire resistant plant species should be used where appropriate.

Staff comment: A proposed condition of approval to this effect has been included with Exhibit A.

South Truckee Meadows/Washoe Valley Citizen Advisory Board (STM/WV CAB)

The proposed project will be presented by the applicant's representative at the STM/WV Citizen Advisory Board meeting on January 25, 2017. Draft minutes from the meeting will be provided to the Planning Commission prior to the February 7, 2017 hearing for this item.

As of the date of this staff report, two comment letters have been received from members of the public regarding this request. These are attached as Exhibit D.

Reviewing Agencies

The following agencies received a copy of the project application for review and evaluation:

- Washoe County Community Services Department
 - Engineering and Capital Projects Division
 - Planning and Development Division
 - Regional Parks and Open Space
 - Traffic
 - Utilities (Sewer)
- Nevada Division of Environmental Protection

- Nevada Division of Water Resources
- Nevada Department of Conservation and Natural Resources
- Nevada Department of Transportation
- Nevada Department of Wildlife
- Regional Transportation Commission
- Reno-Tahoe Airport Authority
- Truckee Meadows Fire Protection District
- Truckee Meadows Regional Planning Agency
- Truckee Meadows Water Authority
- United States Postal Service
- Washoe County Health District
 - Air Quality Management Division
 - Environmental Health Services Division
 - Vector-Borne Disease Prevention Program
 - Emergency Medical Services Oversight Program
- Washoe County School District
- Washoe-Storey Conservation District

Several of the above-listed agencies/departments submitted responses to the proposed tentative subdivision map. A summary of each agency's comments and/or recommended conditions of approval and their contact information are provided. The Conditions of Approval document is attached to this staff report and will be included with the Action Order should the Planning Commission approve the tentative subdivision map application.

- Washoe County Planning and Development Division addressed common area standards, lot sizes, structure heights, landscaping, CC&Rs, grading, timing of final map submittals, etc.
Contact: Kelly Mullin, 775.328.3608, kmullin@washoecounty.us
- Washoe County Engineering and Capital Projects Division addressed grading, drainage, stormwater management, maintenance of common area, easements, roadway improvements, etc.
Contact: Leo Vesely, 775.328.2313, lvesely@washoecounty.us
- Washoe County Utility Services requires improvement plans for construction of sanitary sewer collection system(s), sanitary sewer report, fees, and easements.
Contact: Tim Simpson, 775.954.4648, tsimpson@washoecounty.us
- Washoe County Health District addressed water system requirements, inspection plans, mass grading, commitment of service letters, etc.
Contact: Wes Rubio, 775.328.2635, wrubio@washoecounty.us
- Washoe County School District identified current and anticipated capacity at nearby schools, and highlighted the District's overcrowding strategies.
Contact: Mike Boster 775.232.1571, mboster@washoeschools.net
- Truckee Meadows Fire Protection District addressed requirements of Washoe County Code Chapter 60, including access, vegetation management and CC&R requirements.
Contact: Amy Ray, 775.326.6000, aray@fmfpd.us

- Truckee Meadows Water Authority (TMWA) identified requirements related to water rights dedication, a water supply plan, fees and infrastructure.
Contact: Amanda Duncan, 775.834.8035, aduncan@tmwa.com
- Nevada Division of Environmental Protection (NDEP) stated that the developer will need to obtain coverage under NDEP's Construction Stormwater Permit prior to any grading.
Contact: Patrick Mohn, 775.687.9419, pmohn@ndep.nv.gov
- Regional Transportation Commission (RTC) identified regional access management standards and requested the developer construct pedestrian and bicycle facilities, and contact the RTC to discuss options for future transit.
Contact: Rebecca Kapuler, 775.332.0174, rkapuler@rtcwashoe.com
- Nevada Division of Water Resources stated that water rights are required and that a will-serve letter from TMWA will be required.
Contact: Steve Shell, 775.684.2836, sshell@water.nv.gov
- Washoe County Regional Parks and Open Space and the Reno-Tahoe Airport Authority reviewed the application and indicated they had no comments or conditions of approval.

Staff Comment on Required Findings

Washoe County Code Section 110.608.25 requires that all of the following findings be made to the satisfaction of the Washoe County Planning Commission before granting approval of the request. Staff has completed an analysis of the application and has determined that the proposal is in compliance with the required findings as follows.

- 1) Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan.
Staff Comment: The proposed tentative map, with the proposed Conditions of Approval, meets all of the applicable goals and policies of the Washoe County Master Plan and the Southeast Truckee Meadows Area Plan. The subdivision design takes into consideration the policies of the Area Plan, including lot matching requirements.
- 2) Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan.
Staff Comment: The proposed tentative map meets all of the density, lot size and common open space criteria of the Washoe County Master Plan and the Southeast Truckee Meadows Area Plan. The proposed development complies with the two dwelling units per acre overall density allowed in the Medium Density Suburban (MDS) regulatory zone for this area. Parcel sizes smaller than MDS requirements are enabled through Article 408, Common Open Space Development, allowing for non-residential parcels to be created for drainage and retention facilities in this development.
- 3) Type of Development. That the site is physically suited for the type of development proposed.
Staff Comment: The site is a relatively level property adjacent to paved access, located in the midst of other residential subdivisions, and is suitable for a development with 56 dwellings. Lots are sized to match adjacent residential properties, and the design

complies with relevant area plan policies. The Area Plan's Development Suitability Map also identifies the property as being "most suitable" for development.

- 4) Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System.
Staff Comment: There are adequate public services available to serve the proposed development, specifically community sanitary sewer service.
- 5) Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat.
Staff Comment: The application was sent to the Nevada Department of Wildlife for review and no comments were received regarding the proposal. The proposed development is not located within an environmentally sensitive location, and the proposed improvements are not anticipated to cause substantial environmental damage or harm to endangered plants, wildlife or their habitat.
- 6) Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems.
Staff Comment: The design of the subdivision has been reviewed by the Health District and will comply with all generally applicable public health standards.
- 7) Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision.
Staff Comment: The design of the subdivision includes primary and secondary (emergency vehicle) road access, pedestrian sidewalks and utility easements. Proposed conditions of approval regarding any existing/relocated easements have also been provided by the Engineering and Capital Projects Division.
- 8) Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles.
Staff Comment: The design of the subdivision provides necessary access to surrounding adjacent lands and provides an appropriate secondary access for emergency vehicles via Moon Lane, which will be improved to County standards.
- 9) Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan.
Staff Comment: Any improvements to be dedicated to the County are proposed or conditioned to be consistent with the Master Plan and County Code requirements.
- 10) Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision.
Staff Comment: The applicant has indicated that homes will be constructed using energy efficient design and will take water conservation into consideration. Additionally, Southeast Truckee Meadows Area Plan Policy 2.8 requires two various xeriscape landscape designs. These will be reviewed by the Design Review Committee if the project is approved.

Recommendation

Those agencies which reviewed the application recommended conditions in support of approval of the project. Therefore, after a thorough analysis and review, Tentative Subdivision Map Case Number WTM16-003 is being recommended for approval with conditions. Staff offers the following motion for the Board's consideration.

Motion

I move that, after giving reasoned consideration to the information contained in the staff report and information received during the public hearing, the Washoe County Planning Commission approve Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) for Silver Crest Homes, with the Conditions of Approval included as Exhibit A to this matter, having made all ten findings in accordance with Washoe County Code Section 110.608.25:

- 1) Plan Consistency. That the proposed map is consistent with the Master Plan and any specific plan;
- 2) Design or Improvement. That the design or improvement of the proposed subdivision is consistent with the Master Plan and any specific plan;
- 3) Type of Development. That the site is physically suited for the type of development proposed;
- 4) Availability of Services. That the subdivision will meet the requirements of Article 702, Adequate Public Facilities Management System;
- 5) Fish or Wildlife. That neither the design of the subdivision nor any proposed improvements is likely to cause substantial environmental damage, or substantial and avoidable injury to any endangered plant, wildlife or their habitat;
- 6) Public Health. That the design of the subdivision or type of improvement is not likely to cause significant public health problems;
- 7) Easements. That the design of the subdivision or the type of improvements will not conflict with easements acquired by the public at large for access through, or use of property within, the proposed subdivision;
- 8) Access. That the design of the subdivision provides any necessary access to surrounding, adjacent lands and provides appropriate secondary access for emergency vehicles;
- 9) Dedications. That any land or improvements to be dedicated to the County is consistent with the Master Plan; and
- 10) Energy. That the design of the subdivision provides, to the extent feasible, for future passive or natural heating or cooling opportunities in the subdivision.

Appeal Process

Planning Commission action will be effective 10 calendar days after the written decision is filed with the Secretary to the Planning Commission, unless the action is appealed to the Washoe County Board of Commissioners, in which case the outcome of the appeal shall be determined by that Board. Any appeal must be filed in writing with the Planning and Development Division within 10 calendar days after the written decision is filed with the Secretary to the Planning Commission and mailed to the applicant.

xc: Applicant: Silver Crest Homes, Attn: Rich Balestreri, 16500 Wedge Parkway, Bldg. A, Suite 200, Reno, NV 89511

Property Owner: Charles Maddox, P.O. Box 70577, Reno, NV 89570

Representatives: Wood Rodgers, Attn: Stacie Huggins, 1361 Corporate Blvd., Reno, NV 89502

Wood Rodgers, Attn: Steve Strickland, 1361 Corporate Blvd., Reno, NV 89502



Conditions of Approval

Tentative Subdivision Map Case Number WTM16-003

The project approved under Tentative Subdivision Map Case Number WTM16-003 shall be carried out in accordance with the Conditions of Approval granted by the Planning Commission on February 7, 2017. Conditions of Approval are requirements placed on a permit or development by each reviewing agency. These Conditions of Approval may require submittal of documents, applications, fees, inspections, amendments to plans, and more. These conditions do not relieve the applicant of the obligation to obtain any other approvals and licenses from relevant authorities required under any other act or to abide by all other generally applicable Codes, and neither these conditions nor the approval by the County of this project/use override or negate any other applicable restrictions on uses or development on the property.

Unless otherwise specified, all conditions related to the approval of this Tentative Subdivision Map shall be met or financial assurance must be provided to satisfy the conditions of approval prior to issuance of a grading or building permit. The agency responsible for determining compliance with a specific condition shall determine whether the condition must be fully completed or whether the applicant shall be offered the option of providing financial assurance. All agreements, easements, or other documentation required by these conditions shall have a copy filed with the County Engineer and with the Planning and Development Division.

Compliance with the conditions of approval related to this Tentative Subdivision Map is the responsibility of the applicant, his/her successor in interest, and all owners, assignees, and occupants of the property and their successors in interest. Failure to comply with any of the conditions imposed in the approval of the Tentative Subdivision Map may result in the initiation of revocation procedures.

Washoe County reserves the right to review and revise the conditions of approval related to this Tentative Subdivision Map should it be determined that a subsequent license or permit issued by Washoe County violates the intent of this approval.

For the purpose of conditions imposed by Washoe County, "may" is permissive and "shall" or "must" is mandatory.

Conditions of Approval are usually complied with at different stages of the proposed project. Those stages are typically:

- Prior to recordation of a final map.
- Prior to obtaining a final inspection and/or a certificate of occupancy.
- Prior to the issuance of a business license or other permits/licenses.
- Some "Conditions of Approval" are referred to as "Operational Conditions." These conditions must be continually complied with for the life of the project.

The Washoe County Commission oversees many of the reviewing agencies/departments with the exception of the following agencies.

- **The DISTRICT BOARD OF HEALTH, through the Washoe County Health District, has jurisdiction over all public health matters in the Health District. Any conditions set by the Health District must be appealed to the District Board of Health.**

- **The REGIONAL TRANSPORTATION COMMISSION (RTC) is directed and governed by its own Board. Conditions recommended by the RTC may be required, at the discretion of Washoe County.**
- **The NEVADA DEPARTMENT OF TRANSPORTATION (NDOT) is directed and governed by its own board. Therefore, any conditions set by the Nevada Department of Transportation must be appealed to that Board.**

STANDARD CONSIDERATIONS FOR SUBDIVISIONS
Nevada Revised Statutes 278.349

Pursuant to NRS 278.349, when contemplating action on a Tentative Subdivision Map, the governing body or the Planning Commission, if it is authorized to take final action on a tentative map, shall consider:

- (a) Environmental and health laws and regulations concerning water and air pollution, the disposal of solid waste, facilities to supply water, community or public sewage disposal and, where applicable, individual systems for sewage disposal;
- (b) The availability of water which meets applicable health standards and is sufficient for the reasonably foreseeable needs of the subdivision;
- (c) The availability and accessibility of utilities;
- (d) The availability and accessibility of public services such as schools, police and fire protection, transportation, recreation and parks;
- (e) Conformity with the zoning ordinances and master plan, except that if any existing zoning ordinance is inconsistent with the master plan, the zoning ordinance takes precedence;
- (f) General conformity with the governing body's master plan of streets and highways;
- (g) The effect of the proposed subdivision on existing public streets and the need for new streets and highways to serve the subdivision;
- (h) Physical characteristics of the land such as floodplain, slope and soil;
- (i) The recommendations and comments of those entities reviewing the tentative map pursuant to NRS 278.330 and 278.335; and
- (j) The availability and accessibility of fire protection, including, but not limited to, the availability and accessibility of water and services for the prevention and containment of fires, including fires in wild lands.

FOLLOWING ARE CONDITIONS OF APPROVAL REQUIRED BY THE REVIEWING AGENCIES. EACH CONDITION MUST BE MET TO THE SATISFACTION OF THE ISSUING AGENCY.

Washoe County Planning and Development Division

1. The following conditions are requirements of the Planning and Development Division, which shall be responsible for determining compliance with these conditions.

Contact: Kelly Mullin, 775.328.3608, kmullin@washoecounty.us

- a. The applicant shall demonstrate substantial conformance to the plans approved as part of this tentative subdivision map.
- b. Failure to comply with the conditions of approval shall render this approval null and void.
- c. The subdivision shall be in substantial conformance with the provisions of Washoe County Code Chapter 110, Article 408, *Common Open Space Development*, Article 604, *Design Requirements*, and Article 608, *Tentative Subdivision Maps*.
- d. Final maps and final construction drawings shall comply with all applicable statutes, ordinances, rules, regulations and policies in effect at the time of submittal of the tentative map or, if requested by the developer and approved by the applicable agency, those in effect at the time of approval of the final map.
- e. The subdivider shall present to Washoe County a final map, prepared in accordance with the tentative map, for the entire area for which a tentative map has been approved, or one of a series of final maps, each covering a portion of the approved tentative map, within four years after the date of approval of the tentative map or within two years of the date of approval for subsequent final maps. On subsequent final maps, that date may be extended by two years if the extension request is received prior to the expiration date.
- f. Final maps shall be in substantial compliance with all plans and documents submitted with and made part of this tentative map request, as may be amended by action of the final approving authority.
- g. All final maps shall contain the applicable portions of the following Jurat:

THE TENTATIVE MAP FOR WTM16-003 FOR BAILEY CREEK ESTATES WAS APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON FEBRUARY 7, 2017.

THIS FINAL MAP, MAP NAME AND UNIT/PHASE #, MEETS ALL APPLICABLE STATUTES, ORDINANCES AND CODE PROVISIONS, IS IN SUBSTANTIAL CONFORMANCE WITH THE TENTATIVE MAP AND ITS CONDITIONS, WHICH ARE INCORPORATED HEREIN BY THIS REFERENCE, AND THOSE CONDITIONS HAVE BEEN SATISFIED FOR RECORDATION OF THIS MAP, EXCEPT THAT THE "OPERATIONAL CONDITIONS" CONTAINED IN THE RECORDED ACTION ORDER SHALL REMAIN IN FULL FORCE AND EFFECT IN PERPETUITY.

IF ALL LOTS ON THIS MAP ARE REVERTED TO ACREAGE AND A NEW SUBDIVISION APPROVAL IS OBTAINED AT A FUTURE DATE, THE PROVISIONS OF THIS APPROVAL SHALL

BE NULL AND VOID, UPON APPROVAL BY WASHOE COUNTY OF THOSE ACTIONS.

[Omit the following paragraph if this is the first and last (only) final map.]

THE FIRST FINAL MAP FOR THIS TENTATIVE MAP WAS APPROVED AND ACCEPTED FOR RECORDATION ON date of Planning and Development Director's signature on first final map. THE MOST RECENTLY RECORDED FINAL MAP WAS APPROVED AND ACCEPTED FOR RECORDATION ON date of Planning and Development Director's signature on most recent final map. [If an extension has been granted after that date – add the following]: A TWO YEAR EXTENSION OF TIME FOR THE TENTATIVE MAP WAS APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON _____.

THE NEXT FINAL MAP FOR WTM16-003 MUST BE APPROVED AND ACCEPTED FOR RECORDATION BY THE PLANNING AND DEVELOPMENT DIRECTOR ON OR BEFORE THE EXPIRATION DATE, THE _____ DAY OF _____, 20____, OR AN EXTENSION OF TIME FOR THE TENTATIVE MAP MUST BE APPROVED BY THE WASHOE COUNTY PLANNING COMMISSION ON OR BEFORE SAID DATE.

THIS FINAL MAP IS APPROVED AND ACCEPTED FOR RECORDATION THIS _____ DAY OF _____, 20____ BY THE PLANNING AND DEVELOPMENT DIRECTOR. THE OFFER OF DEDICATION FOR STREETS, SEWERS, ETC. IS REJECTED AT THIS TIME, BUT WILL REMAIN OPEN IN ACCORDANCE WITH NRS CHAPTER 278.

WILLIAM H. WHITNEY, DIRECTOR,
PLANNING AND DEVELOPMENT DIVISION

- h. The applicant shall record the Action Order with the County Recorder. A copy of the recorded Action Order stating conditional approval of this tentative map shall be attached to all applications for administrative permits issued by Washoe County.
- i. A note shall be placed on all grading plans and construction drawings stating:

NOTE

Should any prehistoric or historic remains/artifacts be discovered during site development, work shall temporarily be halted at the specific site and the State Historic Preservation Office of the Department of Museums, Library and Arts shall be notified to record and photograph the site. The period of temporary delay

shall be limited to a maximum of two (2) working days from the date of notification.

- j. The final map shall designate faults that have been active during the Holocene epoch of geological time, and the final map shall contain the following note:

NOTE

No habitable structures shall be located on a fault that has been active during the Holocene epoch of geological time.

- k. The developer and all successors shall direct any potential purchaser of the site to meet with the Planning and Development Division to review conditions of approval prior to the final sale of the site. Any subsequent purchasers of the site shall notify the Planning and Development Division of the name, address, telephone number and contact person of the new purchaser within thirty (30) days of the final sale.
- l. Prior to any ground disturbing activity, the applicant shall submit a landscaping/architectural design plan to the Planning and Development Division for review and approval by the Design Review Committee. Said plan shall address, but not be limited to: signage, exterior lighting (including streetlights), fencing, landscaping design, landscaping material (if plant material: type, size at time of planting, maturation size at full growth, period of time between planting and full growth), landscaping location, landscaping irrigation system, and financial assurances that landscaping will be planted and maintained. At least two separate xeriscape options for subdivision landscape design shall be provided, emphasizing the use of native vegetation, with non-native and atypical vegetation integrated sparingly into any landscaped area.
- m. The applicant shall provide financial assurances to the Planning and Development Division equal to one hundred and twenty percent (120%) of the cost of revegetation and irrigation of all disturbed areas. The cost shall be calculated by a certified landscape contractor. The financial assurances are to be held with automatic renewal for not less than three years and are intended to ensure the continued survival of plants beyond that time period for mitigation of visual scarring and for erosion control. If the applicant chooses to provide a bond as financial assurance, it must be issued from an acceptable company rated A- or better. The applicant must also execute a Hold Harmless Agreement with right of entry. This condition must be completed to the satisfaction of the Planning and Development Division prior to issuance of a grading permit.
- n. A certification letter or series of letters by a registered landscape architect or other persons permitted to prepare landscaping and irrigation plans pursuant to NRS 623A shall be submitted to and approved by the Planning and Development Division and the Design Review Committee. The letter(s) shall certify that all applicable landscaping provisions of Articles 408, 410 and 412 of the Washoe County Code Chapter 110 (Development Code) have been met. Any landscaping plans and the letter shall be wet-stamped. The letter shall indicate any provisions of the code that the Director of the Planning and Development Division has waived.

- o. All landscaping and revegetation shall be maintained in accordance with the provisions found in Washoe County Code Section 110.412.75, Maintenance. A three-year maintenance plan shall be submitted by a licensed landscape architect registered in the State of Nevada to the Planning and Development Division prior to a Certificate of Occupancy. The plan shall be wet-stamped.
- p. The applicant shall submit and follow a plan for the control of noxious weeds. Prior to any ground-disturbing activity, the applicant shall provide the Planning and Development Division a copy of the plan, which should be developed through consultation with the Washoe County Health District, the University of Nevada Cooperative Extension, and/or the Washoe-Storey Conservation District.
- q. Any lighting proposed, including street lights, shall show how it is consistent with current best practice "dark-sky" standards and meets the requirements of Southeast Truckee Meadows Area Plan Policy 2.2. Lights shall be shielded to prevent light spillage onto adjacent properties or streets.
- r. Conditions, covenants, and restrictions (CC&Rs), including any supplemental CC&Rs, shall be submitted to the Planning and Development staff for review and subsequent forwarding to the District Attorney for review and approval. The final CC&Rs shall be signed and notarized by the owner(s) and submitted to the Planning and Development Division with the recordation fee prior to the recordation of the final map. The CC&Rs shall require all phases and units of the subdivision approved under this tentative map to be subject to the same CC&Rs. Washoe County shall be made a party to the applicable provisions of the CC&Rs to the satisfaction of the District Attorney's Office. Said CC&Rs shall specifically address the potential for liens against the properties and the individual property owners' responsibilities for the funding of maintenance, replacement, and perpetuation of the following items, at a minimum:
 - i. Maintenance of public access easements, common areas, and common open spaces. Provisions shall be made to monitor and maintain, for a period of three (3) years regardless of ownership, a maintenance plan for the common open space area. The maintenance plan for the common open space area shall, as a minimum, address the following:
 - Vegetation management;
 - Watershed management;
 - Debris and litter removal;
 - Fire access and suppression; and
 - Maintenance of public access and/or maintenance of limitations to public access.
 - ii. All drainage facilities and roadways not maintained by Washoe County shall be privately maintained and perpetually funded by the homeowners association.
 - iii. All open space identified as common area on the final map shall be privately maintained and perpetually funded by the homeowners association. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The maintenance of the common

- areas and related improvements shall be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.
- iv. The project adjacent to undeveloped land shall maintain a fire fuel break of a minimum 30 feet in width until such time as the adjacent land is developed.
 - v. Locating habitable structures on potentially active (Holocene) fault lines, whether noted on the recorded map or disclosed during site preparation, is prohibited.
 - vi. All outdoor lighting on buildings and streets within the subdivision shall be down-shielded.
 - vii. No motorized vehicles shall be allowed on the platted common area except emergency vehicles, utility service vehicles, or vehicles involved in homeowner association maintenance and repair of common area facilities.
 - viii. Mandatory solid waste collection.
 - ix. Fence material (if any), height, and location limitations, and re-fencing standards. Replacement fence must be compatible in materials, finish and location of existing fence.
 - x. Dwellings adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30-foot or wider landscaped buffer area. A note to this effect shall be placed on applicable final maps, and a disclosure made by the developer to affected homebuyers on their closing documents.
- s. The common open space owned by the homeowners association shall be noted on the final map as "common open space" and the related deed of conveyance shall specifically provide for the preservation of the common open space in perpetuity. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The deed shall be presented with the CC&Rs for review by the Planning and Development staff and the District Attorney.
 - t. Disturbed areas left undeveloped for more than thirty (30) days must be revegetated by methods approved by Planning and Development and that comply with the requirements of Southeast Truckee Meadows Area Plan Policy 11.5.
 - u. Construction hours are limited to 7 a.m. to 7 p.m., Monday through Saturday.
 - v. A will-serve from Truckee Meadows Water Authority and mylar map of the proposed project shall be presented to the State Engineer for approval and signed through his office prior to development.

Washoe County Engineering and Capital Projects Division

2. The following conditions are requirements of the Engineering and Capital Projects Division. Unless otherwise noted, the County Engineer shall be responsible for determining compliance with these conditions.

Contact: Leo Vesely, 775.328.2313, lvesely@washoecounty.us

General Conditions

- a. Final maps and final construction drawings shall comply with all applicable statutes, ordinances, rules, regulations, and policies in effect at the time of submittal of the tentative map or, if requested by the developer and approved by the applicable agency, those in effect at the time of approval of the final map.
- b. Prior to acceptance of public improvements and release of any financial assurances, the developer shall furnish to the water and sewer provider(s) and Engineering and Capital Projects Division a complete set of reproducible as-built construction drawings prepared by a civil engineer registered in the State of Nevada.
- c. The developer shall be required to participate in any applicable General Improvement District or Special Assessment District formed by Washoe County. The applicable County Department shall be responsible for determining compliance with this condition.
- d. The developer shall provide written approval from the U.S. Postal Service concerning the installation and type of mail delivery facilities. The system, other than individual mailboxes, must be shown on the project construction plans and installed as part of the onsite improvements.
- e. A complete set of construction improvement drawings, including an onsite grading plan, shall be submitted to the County Engineer for approval prior to finalization of any portion of the tentative map. Grading shall comply with best management practices (BMP's) and shall include detailed plans for grading and drainage on each lot, erosion control (including BMP locations and installation details), slope stabilization and mosquito abatement. Placement or disposal of any excavated material shall be indicated on the grading plan.
- f. All open space shall be identified as common area on the final map. A note on the final map shall indicate that all common areas shall be privately maintained and perpetually funded by the Homeowners Association. The County Engineer shall determine compliance with this condition. The maintenance of the common areas shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.
- g. Any existing easements or utilities that conflict with the development shall be relocated, quitclaimed, and/or abandoned, as appropriate.
- h. Any easement documents recorded for the project shall include an exhibit map that shows the location and limits of the easement in relationship to the project.
- i. All existing overhead utility lines shall be placed underground, except electric transmission lines greater than 100 kilovolts, which can remain above ground.

- j. With each affected final map, provide written approval from NV Energy for any improvements located within their easement or under their facilities.
- k. Appropriate easements shall be granted for any existing or new utilities, with each affected final map. This includes, but is not limited, to electrical lines, water lines, and drainage maintenance access.

Drainage and Storm Water Discharge Program Conditions (Washoe County Code Chapter 110, Articles 420 & 421)

- l. The conditional approval of this tentative map shall not be construed as final approval of the drainage facilities shown on the tentative map. Final approval of the drainage facilities will occur during the final map review and will be based upon the final hydrology report.
- m. Prior to finalization of the first final map, a master hydrology/hydraulic report and a master storm drainage plan shall be submitted to the County Engineer for approval.
- n. Prior to finalization of any portion of the tentative map, a final, detailed hydrology/hydraulic report for that unit shall be submitted to the County Engineer. All storm drainage improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided.
- o. Any increase in stormwater runoff resulting from the development and based on the 5-year and 100-year storm(s) shall be detained onsite, or off-site with necessary permission and easements from the property owner.
- p. Standard reinforced concrete headwalls or other approved alternatives shall be placed on the inlet and outlet of all drainage structures, and grouted rock riprap shall be used to prevent erosion at the inlets and outlets of all culverts to the satisfaction of the Engineering and Capital Projects Division.
- q. The developer shall provide pretreatment for petrochemicals and silt for all storm drainage leaving the site to the satisfaction of the Engineering and Capital Projects Division.
- r. The Truckee Meadows Regional Stormwater Quality Management Program Construction Permit Submittal Checklist and Inspection Fee shall be submitted with each final map.
- s. In medians with irrigated landscaping adjacent to the curb, a subdrain system shall be installed a minimum of one foot behind the back face of curb to intercept drainage from the landscaping. The system shall be tied to the storm drain system or an acceptable alternative drainage system.
- t. Drainage swales that drain more than two lots are not allowed to flow over the curb into the street; these flows shall be intercepted by an acceptable storm drain inlet and routed into the storm drain system.
- u. A note on the final map shall indicate that all drainage facilities not maintained by Washoe County shall be privately maintained and perpetually funded by a

homeowners association. As an alternative to a homeowners association, the developer may request the establishment of a County Utility Service Area under which fees would be paid for maintenance of the proposed storm drainage detention facility. The fee amount will be based on the additional service above that normally provided by the County to maintain new stormwater facilities dedicated by the developer (i.e., curb and gutter, drop inlets and piping). The County Engineer shall determine compliance with this condition. The maintenance and funding of these drainage facilities shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.

- v. The maximum permissible flow velocity (that which does not cause scour) shall be determined for all proposed channels and open ditches. The determination shall be based on a geotechnical analysis of the channel soil, proposed channel lining and channel cross section, and it shall be in accordance with acceptable engineering publications/calculations. Appropriate linings shall be provided for all proposed channels and open ditches such that the 100-year flows do not exceed the maximum permissible flow velocity.
- w. All slopes steeper than 3:1 shall be mechanically stabilized to control erosion. As an alternative to riprap, an engineered solution (geofabric, etc.) may be acceptable.
- x. Drainage easements shall be provided for all storm runoff that crosses more than one lot.
- y. Maintenance access roadways and drainage easements shall be provided for all existing and proposed drainage facilities. All drainage facilities located within Common Area shall be constructed with an adjoining minimum 12' wide gravel access road. Maintenance access road shall be provided to the bottom of proposed detention basins as well as over County owned and maintained storm drainage facilities.
- z. The FEMA 100-year floodplain shall be shown on the final map and grading plan to the satisfaction of the County Engineer. All grading in these areas shall be in conformance with the Washoe County Code Article 416.
- aa. Common Area or offsite drainage draining onto residential lots shall be perpetuated through or around residential lots and drainage facilities capable of passing a 100-year storm shall be constructed with the subdivision improvements to perpetuate the storm water runoff to improved or natural drainage facilities.
- bb. Prior to the finalization of any final map, provide verification that permission has been granted to construct Bailey Canyon Creek improvements on offsite parcels not owned by the applicant.
- cc. Drainage easements shall be recorded over all FEMA A zones and floodways.

Traffic and Roadway (Washoe County Code Chapter 110, Article 436)

- dd. All roadway improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided.

- ee. Street names shall be reviewed and approved by the Regional Street Naming Coordinator.
- ff. Proposed landscaping and/or fencing along street rights-of-way and within median islands shall be designed to meet American Association of State Highway and Transportation Officials (AASHTO) sight distances and safety guidelines. No tree shall overhang the curb line of any public street.
- gg. For any utilities placed in existing County streets, the streets shall be repaired to the satisfaction of the County Engineer. At a minimum, this will require full depth removal and replacement of asphalt for half the street width, or replacement of non-woven pavement reinforcing fabric with a 2" asphalt overlay for half the street width. Type II slurry seal is required for the entire street width with either option. Full width street improvements may be required if the proposed utility location is too close to the centerline of the existing street.
- hh. Streetlights shall be constructed to Washoe County standards at locations to be determined at the final design stage.
- ii. AASHTO clear zones shall be determined for all streets adjacent to retaining walls or slopes steeper than 3:1. If a recoverable or traversable clear zone cannot be provided, an analysis to determine if barriers are warranted shall be submitted for approval.
- jj. All retaining walls that are adjacent to, provide support for or retain soil from the County right-of-way shall be constructed of reinforced masonry block or reinforced concrete and designed by an engineer licensed in the State of Nevada.
- kk. No retaining walls that retain soil from the County right-of-way shall be located within a plowed snow storage easement.
- ll. Appropriate curve warning signs and/or a lower speed limit shall be determined and posted on all horizontal roadway curves that do not meet the standard Washoe County 25-mile per hour design speed. The minimum centerline radius allowed shall be 100'.
- mm. Appropriate transitions shall be provided between the existing and proposed improvements at all proposed street connections. This may include removal of existing pavement.
- nn. Access to parcels 017-053-01 & 02 from Moon Lane shall be perpetuated.
- oo. Any streetlights that do not meet Washoe County standards shall be placed outside Washoe County right-of-way. These streetlights shall be private, and the CC&R's shall indicate operation and maintenance of the streetlights shall be the responsibility of the Homeowners Association. The County Engineer and the District Attorney's Office shall determine compliance with this condition.
- pp. Provide a deceleration lane along the southern side of Geiger Grade (State Route 341) at the project entrance to the satisfaction of the County Engineer and NDOT.

- qq. An occupancy permit shall be obtained from NDOT for access to, from or under roads and highways maintained by NDOT, and a copy of the permit shall be submitted to the County Engineer prior to finalization of the affected final map.
- rr. A note on the final map shall state the no direct access from individual lots shall be allowed onto Geiger Grade or Shadow Hills Drive. This note shall also be included in the CC&Rs to the satisfaction of the District Attorney's office.
- ss. Prior to finalization of the any final map, provide written verification from NV Energy that proper clearances are maintained between the proposed improvements for Shadow Hills Drive and Moon Lane and the existing overhead power lines.

Washoe County Utilities

3. The following conditions are requirements of Washoe County Utilities, which shall be responsible for determining compliance with these conditions.

Contact: Tim Simpson, 775.954.4648, tsimpson@washoecounty.us

- a. All fees shall be paid or deferred in accordance with Washoe County Ordinance prior to the approval of each final map.
- b. Improvement plans shall be submitted and approved by CSD prior to approval of the final map. They shall be in compliance with Washoe County Design Standards and be designed by a Professional Engineer licensed to practice in the State of Nevada.
- c. The Applicant shall submit an electronic copy of the street and lot layout for each final map at initial submittal time. The files must be in a format acceptable to Washoe County.
- d. The Developer shall construct and/or provide the financial assurance for the construction of any on-site and off-site sanitary sewer collection systems prior to signature on each final map. The financial assurance must be in a form and amount acceptable to the CSD.
- e. Approved improvement plans shall be used for the construction of on-site and off-site sanitary sewer collection systems. The CSD will be responsible to inspect the construction of the sanitary sewer collection systems.
- f. The sanitary sewer collection systems must be offered for dedication to Washoe County along with the recordation of each final map.
- g. Easements and real property for all sanitary sewer collection systems and appurtenances shall be in accordance with Washoe County Design Standards and offered for dedication to Washoe County along with the recordation of each final map.
- h. A master sanitary sewer report for the entire tentative map shall be prepared and submitted by the applicant's engineer at the time of the initial submittal for the first final map which addresses:
 - i. the estimated sewage flows generated by this project;

- ii. projected sewage flows from potential or existing development within tributary areas;
 - iii. the impact on capacity of existing infrastructure;
 - iv. slope of pipe, invert elevation and rim elevation for all manholes; and
 - v. proposed collection line sizes, on-site and off-site alignment, and half-full velocities.
- i. No Certificate of Occupancy will be issued until all the sewer collection facilities necessary to serve each final map have been completed, accepted and completed as-built drawings delivered to the utility. As-built drawings must be in a format acceptable to Washoe County.
 - j. No permanent structures (including rockery or retaining walls, building's, etc.) shall be allowed within or upon any County maintained utility easement.
 - k. A minimum 30-foot wide sanitary sewer easement shall be dedicated to Washoe County over any sanitary sewer not located within the proposed right-of-way.
 - l. A minimum 12-foot wide all weather sanitary sewer access road shall be constructed to facilitate access to off-site sanitary sewer.
 - m. Any major infrastructure such as pump structures, controls, telemetry and appurtenances, lift stations, force mains, sewer mains and interceptors that are necessary to accommodate the project, the Developer will be responsible to fund the design and construction. However, the actual design will be the responsibility of the CSD. Prior to initiation of design the Developer shall pay the estimated design costs to Washoe County. The CSD may either provide such design in-house, or select an outside consultant. When an outside consultant is to be selected, the CSD and the Developer shall jointly select that consultant.
 - n. The CSD shall reserve the right to over-size the design of infrastructure to accommodate future development as determined by accepted engineering calculations. Funding shall be the responsibility of Washoe County. Washoe County shall either participate monetarily at the time of design and/or shall credit an appropriate dollar amount to the Developer at the time of recordation of the subdivision map.

Washoe County Health District

- 4. The following conditions are requirements of the Health District, which shall be responsible for determining compliance with these conditions. The District Board of Health has jurisdiction over all public health matters in the Health District. Any conditions set by the Health District must be appealed to the District Board of Health.

Contact: Wes Rubio, 775.328.2635, wrubio@washoecounty.us

The Environmental Health Services (EHS) Division requires the following conditions to be completed prior to review and approval of any Final Map:

- a. Prior to any final grading or other civil site improvements, a complete water system plan and Water Project submittal for the referenced proposal must be submitted to this Division. The plan must show that the water system will conform

to the State of Nevada Design, Construction, Operation and Maintenance Regulations for Public Water Systems, NAC Chapter 445A, and the State of Nevada Regulations Governing Review of Plans for Subdivisions, Condominiums, and Planned Unit Developments, NAC 278.400 and 278.410.

- i. The application for a Water Project shall conform to the requirements of NAC 445A.66695.
 - ii. Two copies of complete construction plans are required for review. All plans must include an overall site plan, additional phases that will eventually be built to indicate that the water system will be looped, all proposed final grading, utilities, and improvements for the proposed application.
- b. Mass grading may proceed after approval of the Tentative Map and after a favorable review by this Division of a grading permit application.
- i. The application shall include a Truckee Meadows Water Authority annexation and discovery with the mass grading permit.
- c. Improvement plans for the water system may be constructed prior to Final Map submittal only after Water Project approval by this Division.
- i. For improvement plans approved prior to Final Map submittal, the Developer shall provide certification by the Professional Engineer of record that the improvement plans were not altered subsequent to Final Map submittal.
 - ii. Any changes to previously approved improvement plans made prior to Final Map submittal shall be resubmitted to this Division for approval per NAC 278.290 and NAC 445A.66715.

The EHS Division requires the following to be submitted with the Final Map application for review and approval:

- d. Construction plans for the development must be submitted to this Division for approval. The construction drawings must conform to the State of Nevada Regulations Concerning Review of Plans for Subdivisions, Condominiums and Planned Unit Developments, and any applicable requirements of this Division.
- e. Prior to approval of a Final Map for the referenced project and pursuant to NAC 278.370, the developer must have the design engineer or a third person submit to the satisfaction this Division an inspection plan for periodic inspection of the construction of the systems for water supply and community sewerage. The inspection plan must address the following:
 - i. The inspection plan must indicate if an authorized agency, city or county is performing inspection of the construction of the systems for water supply and community sewerage.
 - ii. The design engineer or third person shall, pursuant to the approved inspection plan, periodically certify in writing to this Division that the improvements are being installed in accordance with the approved plans and recognized practices of the trade.

- iii. The developer must bear the cost of the inspections.
 - iv. The developer may select a third-person inspector but the selection must be approved by the Division or local agency. A third-person inspector must be a disinterested person who is not an employee of the developer.
 - v. A copy of the inspection plan must be included with the Final Map submittal.
- f. Prior to final approval, a "Commitment for Service" letter from the sewage purveyor committing sewer service for the entire proposed development must be submitted to this Division. The letter must indicate that the community facility for treatment will not be caused to exceed its capacity and the discharge permit requirements by this added service, or the facility will be expanded to provide for the added service.
- i. A copy of this letter must be included with the Final Map submittal.
- g. Prior to final approval, a "Commitment for Water Service" letter from the water purveyor committing adequate water service for the entire proposed development must be submitted to this Division.
- i. A copy of this letter must be included with the Final Map submittal.
- h. The Final Map application packet must include a letter from Nevada Division of Environmental Protection to this Division certifying their approval of the Final Map.
- i. The Final Map application packet must include a letter from Division of Water Resources certifying their approval of the Final Map.
- j. Pursuant to NAC 278.360 of the State of Nevada Regulations Governing Review of plans for Subdivision, Condominiums, and Planned Unit Developments, the development of the subdivision must be carried on in a manner which will minimize water pollution.
- i. Construction plans shall clearly show how the subdivision will comply with NAC 278.360.
- k. Prior to approval of the final map, the applicant must submit to this Division the Final Map fee.
- l. All grading and development activities must be in compliance with the DBOH Regulations Governing the Prevention of Vector-Borne Diseases.

Truckee Meadows Fire Protection District (TMFPD)

5. The following conditions are requirements of the Truckee Meadows Fire Protection District, which shall be responsible for determining compliance with these conditions.

Contact: Amy Ray, 775.326.6005, aray@tmfpd.us

- a. Plans shall be submitted for review and approval to TMFPD.

Washoe County Conditions of Approval

- b. Any developments on the property shall meet the requirements of Washoe County Code (WCC) Chapter 60.
- c. HOA and CC&R requirements and conditions shall be submitted for review, comment and approval by TMFPD prior to recording, adoption and use.
- d. Open spaces and drainages shall be maintained in accordance with WCC Chapter 60, the Vegetation Management Plan and conditions placed in the HOA and CC&R documents, ensuring vegetation management and maintenance in those areas.
- e. Two means of access and/or egress may be provided.
- f. Cul-de-sacs shall measure a minimum of 50-feet for radius and 100-feet for diameter.

Truckee Meadows Water Authority (TMWA)

- 6. The following conditions are requirements of the Truckee Meadows Water Authority, which shall be responsible for determining compliance with these conditions. TMWA is directed and governed by its own board. Therefore, any conditions set by TMWA must be appealed to that board.

Contact: Amanda Duncan, 775.834.8035, aduncan@tmwa.com

- a. Truckee Meadows Water Authority will require dedication of acceptable water resources, approval of the water supply plan by the local health authority, the execution of a Water Service Agreement, payment of TMWA fees, and the construction and dedication of infrastructure in accordance with TMWA rules and tariffs in effect at the time of application for service.

*** End of Conditions ***



Washoe County
COMMUNITY SERVICES DEPARTMENT
Engineering and Capital Projects Division

Date: January 13, 2017

To: Kelly Mullin, Planning and Development Division

From: Leo R. Vesely, P.E., Engineering and Capitol Projects Division

Re: **WTM16-003**
APN 017-520-03
Bailey Creek Estates Subdivision (56 Lots)

Recommended Conditions of Approval

The following conditions of approval should be applied to this proposed project. Conditions in italics are standard Engineering Conditions.

GENERAL CONDITIONS

1. *Final maps and final construction drawings shall comply with all applicable statutes, ordinances, rules, regulations, and policies in effect at the time of submittal of the tentative map or, if requested by the developer and approved by the applicable agency, those in effect at the time of approval of the final map.*
2. *Prior to acceptance of public improvements and release of any financial assurances, the developer shall furnish to the water and sewer provider(s) and Engineering and Capital Projects Division a complete set of reproducible as-built construction drawings prepared by a civil engineer registered in the State of Nevada.*
3. *The developer shall be required to participate in any applicable General Improvement District or Special Assessment District formed by Washoe County. The applicable County Department shall be responsible for determining compliance with this condition.*
4. *The developer shall provide written approval from the U.S. Postal Service concerning the installation and type of mail delivery facilities. The system, other than individual mailboxes, must be shown on the project construction plans and installed as part of the onsite improvements. The County Engineer shall determine compliance with this condition.*
5. *A complete set of construction improvement drawings, including an onsite grading plan, shall be submitted to the County Engineer for approval prior to finalization of any portion of the tentative map. Grading shall comply with best management practices (BMP's) and shall include detailed plans for grading and drainage on each lot, erosion control (including BMP locations and installation details), slope stabilization and mosquito abatement. Placement or disposal of any excavated material shall be indicated on the grading plan. The County Engineer shall determine compliance with this condition.*
6. *All open space shall be identified as common area on the final map. A note on the final map shall indicate that all common areas shall be privately maintained and perpetually funded by the Homeowners Association. The County Engineer shall determine compliance with this condition.*

The maintenance of the common areas shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.

- 7. Any existing easements or utilities that conflict with the development shall be relocated, quitclaimed, and/or abandoned, as appropriate. The County Engineer shall determine compliance with this condition.*
- 8. Any easement documents recorded for the project shall include an exhibit map that shows the location and limits of the easement in relationship to the project. The County Engineer shall determine compliance with this condition.*
- 9. All existing on-site overhead utility lines shall be placed underground, except electric transmission lines greater than 100 kilovolts, which can remain above ground. The County Engineer shall determine compliance with this condition.*
- 10. With each affected final map, provide written approval from NV Energy for any improvements located within their easement or under their facilities. The County Engineer shall determine compliance with this condition.*
- 11. Appropriate easements shall be granted for any existing or new utilities, with each affected final map. This includes, but is not limited, to electrical lines, water lines, and drainage maintenance access. The County Engineer shall determine compliance with this condition.*

DRAINAGE and STORM WATER DISCHARGE PROGRAM (COUNTY CODE 110.420 and 110.421)

The following are drainage conditions of approval:

- 1. The conditional approval of this tentative map shall not be construed as final approval of the drainage facilities shown on the tentative map. Final approval of the drainage facilities will occur during the final map review and will be based upon the final hydrology report.*
- 2. Prior to finalization of the first final map, a master hydrology/hydraulic report and a master storm drainage plan shall be submitted to the County Engineer for approval. The County Engineer shall determine compliance with this condition.*
- 3. Prior to finalization of any portion of the tentative map, a final, detailed hydrology/hydraulic report for that unit shall be submitted to the County Engineer. All storm drainage improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided. The County Engineer shall determine compliance with this condition.*
- 4. Any increase in stormwater runoff resulting from the development and based on the 5 year and 100 storm(s) shall be detained onsite, or off-site with necessary permission and easements from the property owner. The County Engineer shall determine compliance with this condition.*
- 5. Standard reinforced concrete headwalls or other approved alternatives shall be placed on the inlet and outlet of all drainage structures, and grouted rock riprap shall be used to prevent erosion at the inlets and outlets of all culverts to the satisfaction of the Engineering and Capital Projects Division.*
- 6. The developer shall provide pretreatment for petrochemicals and silt for all storm drainage leaving the site to the satisfaction of the Engineering and Capital Projects Division.*
- 7. The Truckee Meadows Regional Stormwater Quality Management Program Construction Permit Submittal Checklist and Inspection Fee shall be submitted with each final map. The County Engineer shall determine compliance with this condition.*
- 8. In medians with irrigated landscaping adjacent to the curb, a subdrain system shall be installed a minimum of one foot behind the back face of curb to intercept drainage from the landscaping. The*

system shall be tied to the storm drain system or an acceptable alternative drainage system. The County Engineer shall determine compliance with this condition.

9. *Drainage swales that drain more than two lots are not allowed to flow over the curb into the street; these flows shall be intercepted by an acceptable storm drain inlet and routed into the storm drain system. The County Engineer shall determine compliance with this condition.*
10. *A note on the final map shall indicate that all drainage facilities not maintained by Washoe County shall be privately maintained and perpetually funded by a homeowners association. As an alternative to a homeowners association, the developer may request the establishment of a County Utility Service Area under which fees would be paid for maintenance of the proposed storm drainage detention facility. The fee amount will be based on the additional service above that normally provided by the County to maintain new stormwater facilities dedicated by the developer (i.e., curb and gutter, drop inlets and piping). The County Engineer shall determine compliance with this condition. The maintenance and funding of these drainage facilities shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.*
11. *The maximum permissible flow velocity (that which does not cause scour) shall be determined for all proposed channels and open ditches. The determination shall be based on a geotechnical analysis of the channel soil, proposed channel lining and channel cross section, and it shall be in accordance with acceptable engineering publications/calculations. Appropriate linings shall be provided for all proposed channels and open ditches such that the 100-year flows do not exceed the maximum permissible flow velocity. The County Engineer shall determine compliance with this condition.*
12. *All slopes steeper than 3:1 shall be mechanically stabilized to control erosion. As an alternative to riprap, an engineered solution (geofabric, etc.) may be acceptable. The County Engineer shall determine compliance with this condition.*
13. *Drainage easements shall be provided for all storm runoff that crosses more than one lot. The County Engineer shall determine compliance with this condition.*
14. Maintenance access roadways and drainage easements shall be provided for all existing and proposed drainage facilities. All drainage facilities located within Common Area shall be constructed with an adjoining minimum 12' wide gravel access road. Maintenance access road shall be provided to the bottom of proposed detention basins as well as over County owned and maintained storm drainage facilities. County Engineer shall determine compliance with this condition.
15. The FEMA 100-year floodplain shall be shown on the final map and grading plan to the satisfaction of the County Engineer. All grading in these areas shall be in conformance with the Washoe County Code Article 416.
16. Common Area or offsite drainage draining onto residential lots shall be perpetuated through or around residential lots and drainage facilities capable of passing a 100-year storm shall be constructed with the subdivision improvements to perpetuate the storm water runoff to improved or natural drainage facilities. The County Engineer shall determine compliance with this condition.
17. Prior to the finalization of any final map, provide verification that permission has been granted to construct Bailey Canyon Creek improvements on offsite parcels not owned by the applicant. The County Engineer shall determine compliance with this condition.
18. Drainage easements shall be recorded over all FEMA A zones and floodways. The County Engineer shall determine compliance with this condition.

TRAFFIC AND ROADWAY (COUNTY CODE 110.436)

1. *All roadway improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided. The County Engineer shall determine compliance with this condition.*
2. *Street names shall be reviewed and approved by the Regional Street Naming Coordinator.*
3. *Proposed landscaping and/or fencing along street rights-of-way and within median islands shall be designed to meet American Association of State Highway and Transportation Officials (AASHTO) sight distances and safety guidelines. No tree shall overhang the curb line of any public street. The County Engineer shall determine compliance with this condition.*
4. *For any utilities placed in existing County streets, the streets shall be repaired to the satisfaction of the County Engineer. At a minimum, this will require full depth removal and replacement of asphalt for half the street width, or replacement of non-woven pavement reinforcing fabric with a 2" asphalt overlay for half the street width. Type II slurry seal is required for the entire street width with either option. Full width street improvements may be required if the proposed utility location is too close to the centerline of the existing street.*
5. *Streetlights shall be constructed to Washoe County standards at locations to be determined at the final design stage. The County Engineer shall determine compliance with this condition.*
6. *AASHTO clear zones shall be determined for all streets adjacent to retaining walls or slopes steeper than 3:1. If a recoverable or traversable clear zone cannot be provided, an analysis to determine if barriers are warranted shall be submitted for approval. The County Engineer shall determine compliance with this condition.*
7. *All retaining walls that are adjacent to, provide-support for or retain soil from the County right-of-way shall be constructed of reinforced masonry block or reinforced concrete and designed by an engineer licensed in the State of Nevada. The County Engineer shall determine compliance with this condition.*
8. *No retaining walls that retain soil from the County right-of-way shall be located within a plowed snow storage easement. The County Engineer shall determine compliance with this condition.*
9. *With Appropriate curve warning signs and/or a lower speed limit shall be determined and posted on all horizontal roadway curves that do not meet the standard Washoe County 25-mile per hour design speed. The minimum centerline radius allowed shall be 100'. The County Engineer shall determine compliance with this condition.*
10. *Appropriate transitions shall be provided between the existing and proposed improvements at all proposed street connections. This may include removal of existing pavement. The County Engineer shall determine compliance with this condition.*
11. *Access to parcels 017-053-01 & 02 from Moon Lane shall be perpetuated. The County Engineer shall determine compliance with this condition.*
12. *Any streetlights that do not meet Washoe County standards shall be placed outside Washoe County right-of-way. These streetlights shall be private, and the CC&R's shall indicate operation and maintenance of the streetlights shall be the responsibility of the Homeowners Association. The County Engineer and the District Attorney's Office shall determine compliance with this condition.*
13. *Provide a deceleration lane on Geiger Grade (State Route 341) at the project entrance to the satisfaction of the County Engineer and NDOT.*
14. *An occupancy permit shall be obtained from NDOT for access to, from or under roads and highways maintained by NDOT, and a copy of the permit shall be submitted to the County Engineer prior to finalization of the affected final map.*

15. A note on the final map shall state the no direct access from individual lots shall be allowed onto Geiger Grade or Shadow Hills Drive. County Engineer shall determine compliance with this condition. This note shall also be included in the CC&Rs to the satisfaction of the District Attorney's office.
16. Prior to finalization of the any final map, provide written verification from NV Energy that proper clearances are maintained between the proposed improvements for Shadow Hills Drive and Moon Lane and the existing overhead power lines. The County Engineer shall determine compliance with this condition.



Washoe County
COMMUNITY SERVICES DEPARTMENT
Engineering and Capital Projects

January 6, 2017

To: Kelly Mullin, Community Development
From: Timothy Simpson, P.E., Environmental Engineer II
CC: Dwayne Smith, P.E., Division Director Eng & Cap Projects
Subject: WTM16-003 Bailey Creek Estates; 017-520-03 and 017-480-02

The Community Services Department (CSD) has reviewed the subject application and has the following comments:

1. The applicant is proposing to develop a 56-lot residential subdivision. The project is located off Geiger Grade Road and Shadow Hills Drive.
2. Sanitary sewer will be provided by Washoe County and treatment will be at the South Truckee Meadows Water Reclamation Facility.

The Community Services Department (CSD) recommends approval provided the following conditions are met:

1. All fees shall be paid or deferred in accordance with Washoe County Ordinance prior to the approval of each final map.
2. Improvement plans shall be submitted and approved by CSD prior to approval of the final map. They shall be in compliance with Washoe County Design Standards and be designed by a Professional Engineer licensed to practice in the State of Nevada.
3. The Applicant shall submit an electronic copy of the street and lot layout for each final map at initial submittal time. The files must be in a format acceptable to Washoe County.
4. The Developer shall construct and/or provide the financial assurance for the construction of any on-site and off-site sanitary sewer collection systems prior to signature on each final map. The financial assurance must be in a form and amount acceptable to the CSD.
5. Approved improvement plans shall be used for the construction of on-site and off-site sanitary sewer collection systems. The CSD will be responsible to inspect the construction of the sanitary sewer collection systems.
6. The sanitary sewer collection systems must be offered for dedication to Washoe County along with the recordation of each final map.

7. Easements and real property for all sanitary sewer collection systems and appurtenances shall be in accordance with Washoe County Design Standards and offered for dedication to Washoe County along with the recordation of each final map.
8. A master sanitary sewer report for the entire tentative map shall be prepared and submitted by the applicant's engineer at the time of the initial submittal for the first final map which addresses:
 - a. the estimated sewage flows generated by this project,
 - b. projected sewage flows from potential or existing development within tributary areas,
 - c. the impact on capacity of existing infrastructure,
 - d. slope of pipe, invert elevation and rim elevation for all manholes,
 - e. proposed collection line sizes, on-site and off-site alignment, and half-full velocities.
9. No Certificate of Occupancy will be issued until all the sewer collection facilities necessary to serve each final map have been completed, accepted and completed as-built drawings delivered to the utility. As-built drawings must be in a format acceptable to Washoe County.
10. No permanent structures (including rockery or retaining walls, building's, etc.) shall be allowed within or upon any County maintained utility easement.
11. A minimum 30-foot wide sanitary sewer easement shall be dedicated to Washoe County over any sanitary sewer not located within the proposed right-of-way.
12. A minimum 12-foot wide all weather sanitary sewer access road shall be constructed to facilitate access to off-site sanitary sewer.
13. Any major infrastructure such as pump structures, controls, telemetry and appurtenances, lift stations, force mains, sewer mains and interceptors that are necessary to accommodate the project, the Developer will be responsible to fund the design and construction. However, the actual design will be the responsibility of the CSD. Prior to initiation of design the Developer shall pay the estimated design costs to Washoe County. The CSD may either provide such design in-house, or select an outside consultant. When an outside consultant is to be selected, the CSD and the Developer shall jointly select that consultant.
14. The CSD shall reserve the right to over-size the design of infrastructure to accommodate future development as determined by accepted engineering calculations. Funding shall be the responsibility of Washoe County. Washoe County shall either participate monetarily at the time of design and/or shall credit an appropriate dollar amount to the Developer at the time of recordation of the subdivision map.

January 6, 2017

Kelly Mullin, Planner
Washoe County Community Services
Planning and Development Division
PO Box 11130
Reno, NV 89520-0027

RE: Bailey Creek Estates; APN 017-520-03 & 017-480-02
Tentative Subdivision Map; WTM16-003

Dear Ms. Mullin:

The Washoe County Health District, Environmental Health Services Division (Division) Engineering has reviewed the above referenced project. Approval by this Division is subject to the following conditions:

Tentative Map Review and Final Map Conditions per NAC 278

This Division requires the following conditions to be completed prior to review and approval of any Final Map:

1. Prior to any final grading or other civil site improvements, a complete water system plan and Water Project submittal for the referenced proposal must be submitted to this Division. The plan must show that the water system will conform to the State of Nevada Design, Construction, Operation and Maintenance Regulations for Public Water Systems, NAC Chapter 445A, and the State of Nevada Regulations Governing Review of Plans for Subdivisions, Condominiums, and Planned Unit Developments, NAC 278.400 and 278.410.
 - a. The application for a Water Project shall conform to the requirements of NAC 445A.66695.
 - b. Two copies of complete construction plans are required for review. All plans must include an overall site plan, additional phases that will eventually be built to indicate that the water system will be looped, all proposed final grading, utilities, and improvements for the proposed application.
2. Mass grading may proceed after approval of the Tentative Map and after a favorable review by this Division of a grading permit application.
 - a. The application shall include a Truckee Meadows Water Authority annexation and discovery with the mass grading permit.
3. Improvement plans for the water system may be constructed prior to Final Map submittal only after Water Project approval by this Division.
 - a. For improvement plans approved prior to Final Map submittal, the Developer shall provide certification by the Professional Engineer of record that the improvement plans were not altered subsequent to Final Map submittal.



- b. Any changes to previously approved improvement plans made prior to Final Map submittal shall be resubmitted to this Division for approval per NAC 278.290 and NAC 445A.66715.

This Division requires the following to be submitted with the Final Map application for review and approval:

1. Construction plans for the development must be submitted to this Division for approval. The construction drawings must conform to the State of Nevada Regulations Concerning Review of Plans for Subdivisions, Condominiums and Planned Unit Developments, and any applicable requirements of this Division.
2. Prior to approval of a Final Map for the referenced project and pursuant to NAC 278.370, the developer must have the design engineer or a third person submit to the satisfaction this Division an inspection plan for periodic inspection of the construction of the systems for water supply and community sewerage. The inspection plan must address the following:
 - a. The inspection plan must indicate if an authorized agency, city or county is performing inspection of the construction of the systems for water supply and community sewerage.
 - b. The design engineer or third person shall, pursuant to the approved inspection plan, periodically certify in writing to this Division that the improvements are being installed in accordance with the approved plans and recognized practices of the trade.
 - c. The developer must bear the cost of the inspections.
 - d. The developer may select a third-person inspector but the selection must be approved by the Division or local agency. A third-person inspector must be a disinterested person who is not an employee of the developer.
 - e. A copy of the inspection plan must be included with the Final Map submittal.
3. Prior to final approval, a "Commitment for Service" letter from the sewage purveyor committing sewer service for the entire proposed development must be submitted to this Division. The letter must indicate that the community facility for treatment will not be caused to exceed its capacity and the discharge permit requirements by this added service, or the facility will be expanded to provide for the added service.
 - a. A copy of this letter must be included with the Final Map submittal.
4. Prior to final approval, a "Commitment for Water Service" letter from the water purveyor committing adequate water service for the entire proposed development must be submitted to this Division.
 - a. A copy of this letter must be included with the Final Map submittal.
5. The Final Map application packet must include a letter from Nevada Division of Environmental Protection to this Division certifying their approval of the Final Map.
6. The Final Map application packet must include a letter from Division of Water Resources certifying their approval of the Final Map.
7. Pursuant to NAC 278.360 of the State of Nevada Regulations Governing Review of plans for Subdivision, Condominiums, and Planned Unit Developments, the development of the subdivision must be carried on in a manner which will minimize water pollution.
 - a. Construction plans shall clearly show how the subdivision will comply with NAC 278.360.
8. Prior to approval of the final map, the applicant must submit to this Division the Final Map fee.
9. All grading and development activities must be in compliance with the DBOH Regulations Governing the Prevention of Vector-Borne Diseases.

01/06/2017

Bailey Creek Estates; APN 017-520-03 & 017-480-02

Tentative Subdivision Map; WTM16-003

Page 3

If you have any questions or would like clarification regarding the foregoing, please contact Wes Rubio, Senior Environmental Health Specialist at wrubio@washoecounty.us regarding all Health District comments.

Sincerely,

A handwritten signature in black ink that reads "Bob Sack". The signature is written in a cursive style with a large initial "B".

Bob Sack, Division Director
Environmental Health Services Division
Washoe County Health District

BS:wr

Cc: File - Washoe County Health District



Washoe County School District

Every Child By Name And Face. To Graduation

3 January, 2017

Kelly Mullin, Planner
Washoe County Planning and Development Division, Community Services Dept.
P.O. Box 11130
Reno, NV 89520-0027

RE: CASE NUMBER: WTM16-003 (Bailey Creek Estates)

Dear Ms. Mullin,

56 new single-family residential units will impact Washoe County School District facilities. This project is currently zoned for the following schools:

Brown Elementary School

- **Estimated project impact = 14** new ES students (**56** single-family units x **.244** ES students per unit)
- **Base Capacity = 638**
- **2016-2017 Enrollment = 877**
- **% of Base Capacity = 137%**
- **2016-2017 Enrollment with Bailey Creek Estates = 891**
- **% of Base Capacity with Bailey Creek Estates = 140%**
- **Overcrowding Strategies:**
 - **Brown ES has 5** portable buildings (**10** classrooms) in use that provide temporary space for an additional **250** students.
 - Brown ES will convert to a multi-track, year-round (MTYR) calendar for the 2017-2018 school year in accordance with WCSD Policy 6111.
 - Assignment to the closest elementary school with available capacity may be used for students in this development.

Depoali Middle School

- **Estimated project impact = 3** new MS students (56 single-family units x .063 MS students per unit)
- **Base Capacity = 1,320**
- **2016-2017 Enrollment = 1,247**
- **% of Base Capacity = 94%**
- **2016-2017 Enrollment with Bailey Creek Estates = 1,250**
- **% of Base Capacity with Bailey Creek Estates = 95%**
- **Overcrowding Strategies:**
 - The **Depoali** MS property may be able to accommodate portable classrooms if necessary and if funding for the units is available.
 - Per adopted District Policy 6111, most middle schools will be converted to a double session^b calendar when enrollment exceeds 120% of capacity.
 - Assignment to the closest middle school with available capacity may be used for students in this development.

Damonte Ranch High School

- **Estimated project impact = 7** new HS students (56 single-family units x .121 HS students per unit)
- **Base Capacity = 1,597**
- **2016-2017 Enrollment = 1,723**
- **% of Base Capacity = 108%**
- **2016-2017 Enrollment with Bailey Creek Estates = 1,730**
- **% of Base Capacity with Bailey Creek Estates = 108%**
- **Overcrowding Strategies:**
 - **Damonte Ranch** HS has 4 portable units (8 classrooms) in place that provide temporary space for an additional 200 students.
 - Per adopted District Policy 6111, high schools will convert to a double session calendar^b when enrollment exceeds 120% of capacity.
 - Assignment to the closest high school with available capacity may be implemented for students in this development.

With the passage of Washoe County Question 1, the Washoe County School District now has sustainable, adequate funding for building and repairing schools (“capital” funding). Here are the three things to know as we move forward with using this funding to address overcrowding and repairs:

1. **Overcrowding and needed repairs will be addressed as quickly as possible, but solutions will take time.** The District’s problems with overcrowding and backlogged repair needs are the result of more than a decade without adequate capital funding, and will not be solved overnight.
 - o We should be able to avoid Double Sessions at middle and high schools.
 - o We cannot avoid Multi-Track at the elementary level, but will work to eliminate it as quickly as possible.
2. **We want to hear from you.** Capital projects must first be approved by an independent group of community members, and only then go to the school district’s Board of Trustees. All discussions take place in open, public meetings. The community is invited and encouraged to attend these meetings and give input there, through our online form, or by contacting Riley Sutton, our community outreach person on these issues, at 348-0278 or rsutton@washoeschools.net.
3. **Transparency is a top priority.** Past spending and future projects are posted on our Data Gallery (<http://datagallery.washoeschools.net/>). Capital projects follow the public bidding process, which can also be viewed there. We will continue to develop these tools as we go forward to further engage the public in the work we are doing. If you have an idea for other information you would like us to present or ways we could better present current information, please let us know

Definitions:

- a) **Multi-Track Year-Round Calendar (MTYR):** The school is divided into four groups (“tracks”) which start and end the school year on different dates, with only three tracks attending school at any one time. This can decrease overcrowding by as much as 25%.
- b) **Double Sessions:** Two “schools” are operated out of one building; the school is divided into two separate groups which start and end the day at different times, with no overlap. Double Sessions have not been done in WCSD for over 30 years; all details are still in process in terms of exact start and end times, division of the school, and more. Other school districts in Nevada, which have more recent experience with Double Sessions, ran the first high school session from 5:55am to 11:55am and the second session ran from approximately 12:00 p.m. to 6:00 p.m. Double Sessions can relieve overcrowding by as much as 50%.

Thank you for the opportunity to comment.

A handwritten signature in black ink, appearing to read "MBoster". The signature is stylized and cursive.

Mike Boster

School Planner

14101 Old Virginia Road

Reno NV USA 89521

Washoe County School District Capital Projects

775.789.3810

mboster@washoeschools.net

From: Duncan, Amanda
To: Mullin, Kelly
Cc: Zimmerman, John
Subject: RE: December Agency Review Memo IV (WTM 16-003) Bailey Creek Estates
Date: Thursday, January 05, 2017 8:45:12 AM

Kelly,

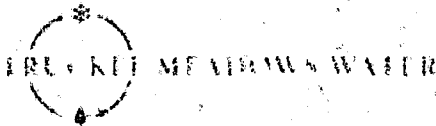
Good Morning. TMWA has the following condition to apply to this project.

Truckee Meadows Water Authority (TMWA) will require dedication of acceptable water resources, approval of the water supply plan by the local health authority, the execution of a Water Service Agreement, payment of TMWA fees, and the construction and dedication of infrastructure in accordance with TMWA rules and tariffs in effect at the time of application for service.

Please let us know if you have questions. Have a great day!

Amanda Duncan, ARWP

aduncan@tmwa.com | www.tmwa.com



From: Stark, Katherine [mailto:KRStark@washoecounty.us]
Sent: Friday, December 23, 2016 1:37 PM
To: Duncan, Amanda
Cc: Stark, Katherine; Emerson, Kathy; Zimmerman, John
Subject: December Agency Review Memo IV

Good afternoon,

Please find the attached Agency Review Memo with a case received in December by Washoe County Community Services Department, Planning & Development.

You've been asked to review the application for **Item 1**. The item description and a link to the application are provided in the memo. Also, please see the yellow highlighted note regarding an Agency Review Meeting for this case on January 11, 2017.

Thank you!

Katy Stark
Office Support Specialist
Washoe County Community Services Department
(775) 328-3618 (office)

WTM16-003
EXHIBIT B



NEVADA DIVISION OF
**ENVIRONMENTAL
PROTECTION**

STATE OF NEVADA
Department of Conservation & Natural Resources

Brian Sandoval, Governor
Leo M. Drozdoff, P.E., Director
David Emme, Administrator

January 11, 2017

BOB SACK
DISTRICT HEALTH
P.O. BOX 11130
RENO NV 89520

**Re: Tentative Map-Bailey Creek Estates; APN's 017-520-03 & 017-480-02
56 Lots in Washoe County, Nevada**

Dear Mr. SACK:

The Nevada Division of Environmental Protection has reviewed the above referenced subdivision and recommends approval of said subdivision with respect to water pollution and sewage disposal, provided that the Washoe County commits to provide sewage service to said subdivision.

Please note that if the developer of this subdivision will disturb more than one acre, he/she is required to obtain coverage under NDEP's Construction Stormwater General Permit NVR100000. A Notice of Intent must be filed electronically and submitted with a \$200 fee prior to commencing any earth-disturbing activities at the site. Visit NDEP's Bureau of Water Pollution Control's website at: http://ndep.nv.gov/bwpc/storm_cont03.htm for more information about this permit.

Sincerely,

Pat Mohn, P.E.
Technical Services Branch
Bureau of Water Pollution Control

cc:

-Washoe County Department of Water Resources, Utility Division, P.O. 11130 Reno 89520
-Kelly Mullin, Planner; Washoe County Comm. Services; 1001 E. 9th Street Bldg. A, Reno, NV 89512
Engineer: WOOD RODGERS 1361 Corporate Blvd., Reno, NV 89502
Developer: STL COMPANY LLC.; 16500 Wedge Pkwy. Bldg. A, Ste. 200, Reno, NV 89511

Control No. 11057



REGIONAL TRANSPORTATION COMMISSION

Metropolitan Planning • Public Transportation & Operations • Engineering & Construction

Metropolitan Planning Organization of Washoe County, Nevada

January 6, 2017

FR: Chrono/PL 183-17

Ms. Kelly Mullin, Planner
Community Services Department
Washoe County
P.O. Box 11130
Reno, NV 89520

RE: WTM16-003 (Bailey Creek Estates)

Dear Ms. Mullin,

The RTC has reviewed this request to approve a 56-lot single-family residential subdivision on two parcels totaling approximately 29 acres. Residential lots will range in size from 14,520 sq. ft. to 21,780 sq. ft. with lot sizes averaging 17,869 sq. ft. This project is located immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive

The 2035 Regional Transportation Plan (RTP) identifies Geiger Grade as an arterial with moderate access control (MAC). To maintain regional roadway capacity, the following RTP access management standards should be maintained.

Access Management Standards-Arterials¹ and Collectors							
Access Management Class	Posted Speeds	Signals Per Mile and Spacing²	Median Type	Left From Major Street? (Spacing from signal)	Left From Minor Street or Driveway?	Right Decel Lanes at Driveways?	Driveway Spacing³
Moderate Access Control	40-45 mph	3 or less Minimum spacing 1590 feet	Raised or painted w/turn pockets	Yes 500 ft. minimum	No, on 6 or 8-lane roadways w/o signal	Yes ⁴	200 ft./300 ft.

- ¹ On-street parking shall not be allowed on any new arterials. Elimination of existing on-street parking shall be considered a priority for major and minor arterials operating at or below the policy level of service.
- ² Minimum signal spacing is for planning purposes only; additional analysis must be made of proposed new signals in the context of existing conditions, planned signalized intersections, and other relevant factors impacting corridor level of service.
- ³ Minimum spacing from signalized intersections/spacing other driveways.
- ⁴ If there are more than 60 inbound right-turn movements during the peak-hour.

The policy Level of Service (LOS) standard for Geiger Grade is LOS D. Policy LOS for intersections shall be designed to provide a level of service consistent with maintaining the policy level of service of the intersecting corridor. This project should be required to meet all the conditions necessary to complete road improvements to maintain policy LOS standards.

The draft 2040 Regional Transportation Plan identifies Geiger Grade to be widened from 2 lanes to 4 lanes from Toll Road to Rim Rock Road in the 2022-2026 timeframe. Dedication of right-of-way or setbacks adequate to complete the 2040 RTP improvements are recommended. See the attached

RTC Board: Neoma Jardon (Chair) • Ron Smith (Vice Chair) • Bob Lucey • Paul McKenzie • Marsha Berkbigler
PO Box 30002, Reno, NV 89520 • 1105 Terminal Way, Reno, NV 89502 • 775-348-0400 • rtcwashoe.com

typical 98' right-of-way section for a 4-lane facility. Additional right-of-way may be required for dedicated turn lanes at intersections.

Please have the developer contact RTC Senior Transit Planner, Tina Wu, at 775-335-1908 or twu@rtcwashoe.com to discuss potential future transit.

The RTP, the RTC Bicycle/Pedestrian Master Plan and the Nevada Department of Transportation Pedestrian Safety Action Plan, all indicate that new development and re-development will be encouraged to construct pedestrian and bicycle facilities, internal and/or adjacent to the development, within the regional road system. Also, these plans recommend that the applicant be required to design and construct any sidewalks along the frontage of the property in conformance with the stated ADA specifications.

Thank you for the opportunity to comment on this application. Please feel free to contact me at 775-332-0174 if you have any questions or comments.

Sincerely,



Rebecca Kapuler
Planner

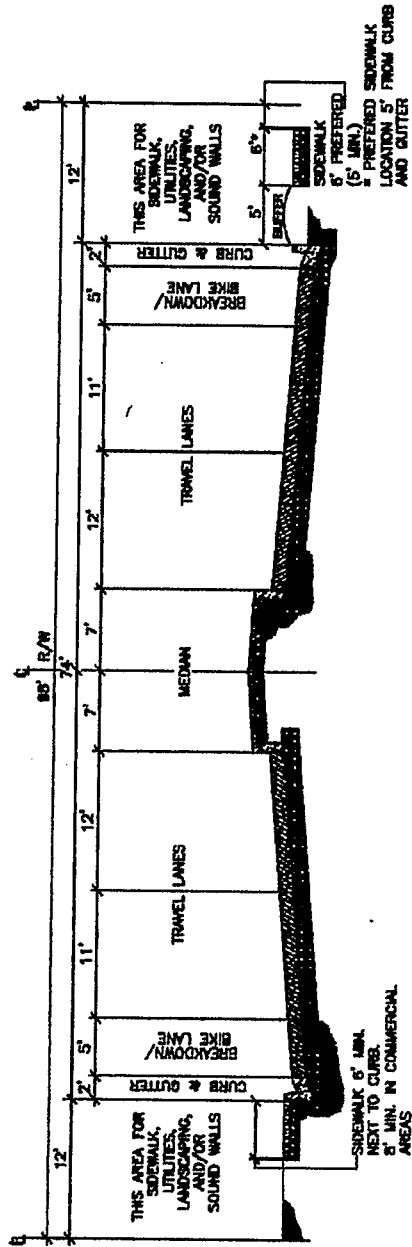
RK/jm

Attachment

Copies: Bill Whitney, Washoe County Community Services
Jae Pullen, NDOT District II
Daniel Doenges, Regional Transportation Commission
Julie Masterpool, Regional Transportation Commission
Tina Wu, Regional Transportation Commission
David Jickling, Regional Transportation Commission

/471 Bailey Creek Estates

TYPICAL 4-LANE RIGHT-OF-WAY SECTION



TYPICAL 98' RIGHT-OF-WAY SECTION
FOUR TRAVEL LANES

REGIONAL TRANSPORTATION COMMISSION
RIGHT-OF-WAY SECTION





**DEPARTMENT OF CONSERVATION AND NATURAL RESOURCES
DIVISION OF WATER RESOURCES**

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Carson City, Nevada 89701-5250
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(800) 992-0900
(In Nevada Only)
www.water.nv.gov

January 3, 2017

Subdivision Review No. 20888-T, Case Number WTM16-003

RE: Comments on Approval of Tentative Map for Bailey Creek Estates

To: Kelly Mullin, Planner
Community Development Department
City of Reno
P. O. Box 1900
Reno, NV 89505

Name: *Bailey Creek Estates*

County: Washoe County – Geiger Grade/Highway 341 and Shadow Hills Drive

Location: A portion of Section 27, Township 18 North, Range 20, East, MDB&M.

Plat: Tentative: Fifty-six (56) lots, common areas, and right-of-ways totaling approximately 28.76 acres and being Washoe County Assessor's Parcel Numbers 017-520-03 and 017-480-02.

**Water Service
Commitment**

Allocation: No water is committed at this time. No estimate of demand.

**Owner-
Developer:** C. B. Maddox
P. O. Box 70577
Reno, NV 89570

Engineer: Blake D. Carter, P. E.
Wood Rodgers
5440 Reno Corporate Drive
Reno, NV 89511

Water Supply: Truckee Meadows Water Authority

General: There are no active water rights appurtenant to the described lands in this proposed project. Any water used on the described lands should be provided by an established utility or under permit issued by the State Engineer's Office.

All waters of the State belong to the public and may be appropriated for beneficial use pursuant to the provisions of Chapters 533 and 534 of the Nevada Revised Statutes (NRS), and not otherwise.

Any water or monitor wells, or boreholes that may be located on either acquired or transferred lands are the ultimate responsibility of the owner of the property at the time of the transfer and must be plugged and abandoned as required in Chapter 534 of the Nevada Administrative Code. If artesian water is encountered in any well or borehole it shall be controlled as required in NRS § 534.060(3).

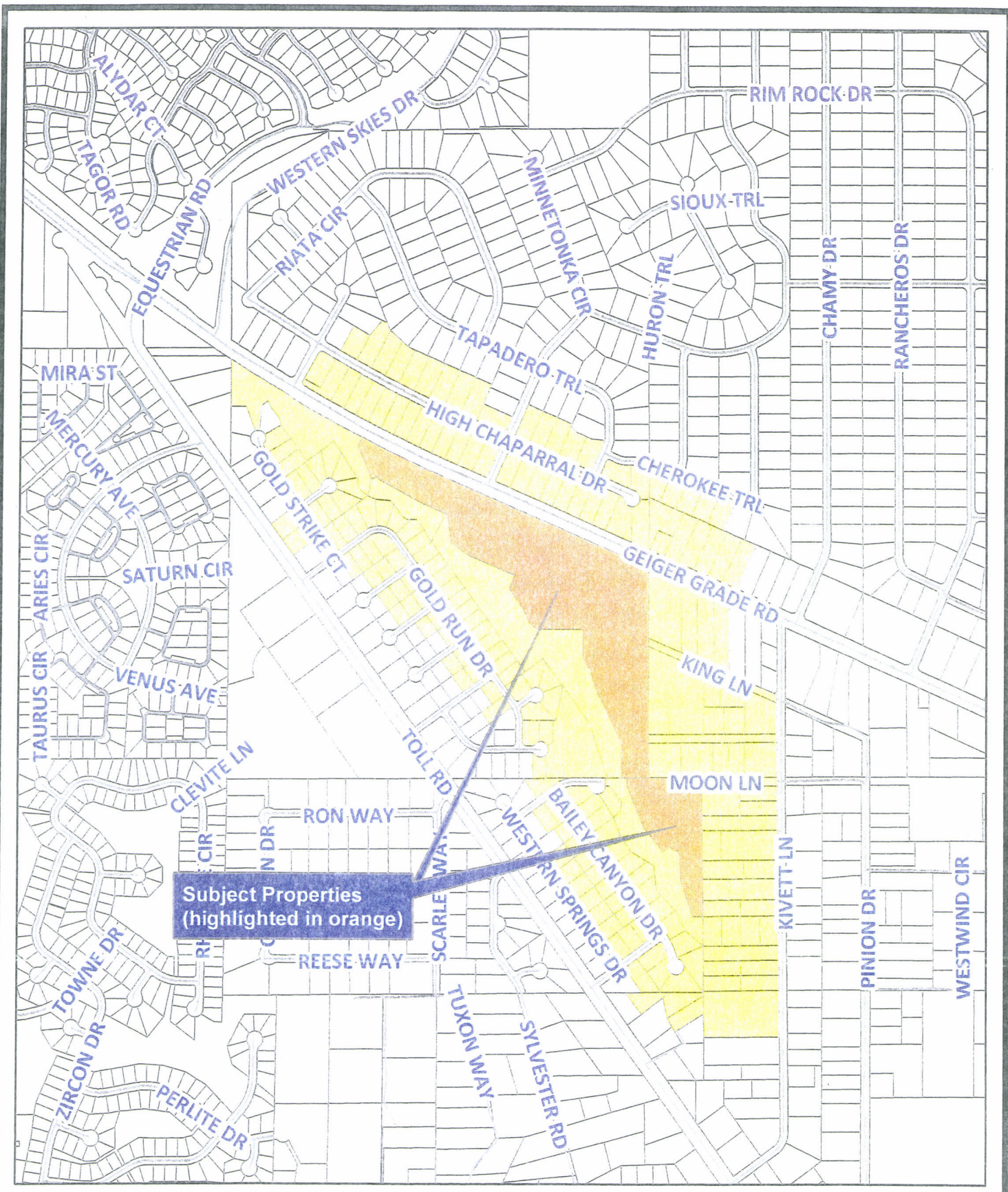
Municipal water service is subject to Truckee Meadows Water Authority rules and regulations and approval by the Office of the State Engineer regarding water quantity and availability.

A Will Serve from Truckee Meadows Water Authority and mylar map of the proposed project must be presented to the State Engineer for approval and signed through his office prior to development.

Action: Tentative approval of *Bailey Creek Estates* subdivision based on acceptance of Water Will Serve by Truckee Meadows Water Authority.

Best regards,

Steve Shell
Water Resource Specialist II



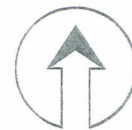
Subject Properties
(highlighted in orange)

Public Notice Map

Tentative Map Case WTM16-003
(Bailey Creek Estates)

204 parcels selected within a distance
of 500 feet of the project site.

Source: Planning and Development Division



Date: December 21, 2016

Community Services
Department

WASHOE COUNTY
NEVADA

Post Office Box 11130
Reno, Nevada 89520 (775) 328-3600

From: JEFF HALICZER
To: Mullin, Kelly
Subject: Baily Creek Estates
Date: Saturday, January 21, 2017 5:35:14 PM

Received a notice about the upcoming meeting and because of other commitments I will not be able to attend. Yet felt the need to express my opinion.

I am a resident in the area off Geiger Grade, on Pinion Dr. Been in the south part of the Truckee Meadows since I moved to Nevada in 1990. I love it out here for a variety of reasons.

Yet the urban sprawl that has encroached further south all the time is upsetting.

I own an acre and all the neighbors in the area are on an acre, it is country and it is wonderful to not have people jammed in so tight.

But to hear about this development and the small lot sizes of .41 of an acre is upsetting. Kutri Ranch is possibly similar and the houses are so close to each other I am amazed at the number of houses in these developments.

The inadequate access into and out of the proposed area is a concern. The lack of a center turn lane on Geiger Grade (I have called the NVDOT a few times on this) and the amount of space for drainage (.75) is inadequate especially with the recent weather we have been having.

I oppose this plan and wanted to go on record on this.

Respectfully,
Jeff Haliczzer
15225 Pinion Dr.
Reno, Nevada 89521

From: Holly O'Driscoll
To: [Mullin, Kelly](#)
Cc: [Kim Davis](#); [solferino@sbcglobal.net](#); [joncady@sbcglobal.net](#); [Bill O'Driscoll](#)
Subject: Re: Bailey Creek Estates Development off Geiger Grade
Date: Thursday, January 19, 2017 8:06:52 PM

Ms. Mullen,

Reviewing the information online about this proposed subdivision raises several concerns regarding development of this plot of land. I live on High Chaparral Drive and part of this development will be across Geiger Grade from me.

Traffic:

The estimated traffic volume seems extremely low for the number of homes. Years ago, under a prior plan for about 100 homes (as I recall) the estimated traffic was 500 or more trips a day (I do not recall the exact numbers). Because of the volume -- my understanding was that a dedicated turn lane on the south side of Geiger Grade would be included in future development. I do not see that in the plot maps for this project. The traffic numbers that are in the plan are confusing. How many trips a day will be added to the intersection?

I was told that under the prior plan, access going *into* the development would be allowed from Geiger Grade, via the one-lane widening. Exit access onto Geiger Grade would be from Kivet or Moon Lane -- areas that do not cause an intersection problem.

The reason for my concern: Shadow Hills is a major artery in and out of the Foothills neighborhood. If people get backed up getting in or out via Shadow Hills, they will use High Chaparral Drive to High Chaparral Way as a cut off -- endangering the many children and pedestrians on my block. This would adversely impact my neighborhood -- and my property values. There is a dedicated turn lane on Geiger Grade to turn north into to High Chaparral. There should be a dedicated lane to turn south into this project.

Flood/water/drainage

I see that part of the proposed area is designated as a flood zone. In these past weeks, significant flooding has occurred over there -- and backed up to the point of closing Toll Road.

This plan seems to indicate that it would not impact or change the flood danger. I am not convinced ... and quite concerned that grading and topography changes could cause water to rise to the Geiger Grade level -- and by extension toward my property.

Horses

Wild horses traverse and graze in that plot on a regular basis. I presume they also access whatever water flows down the drainage area that flows through the entire plot. Will the horses continue to have access? Will more be pushed into the road -- and in front of cars?

I would appreciate your feed back on these concerns -- particularly the traffic issue as that is the most crucial and likely harm to be felt by residents throughout the existing Foothill neighborhood. New development should not take precedence over our safety -- especially when it can be mitigated by changing the traffic pattern in and out of this project.

Best Regards,

Holly O'Driscoll
1240 High Chaparral Drive
Reno, NV 89521
775-762-7576

Tentative Map Application Bailey Creek Estates

Submitted to Washoe County
December 15, 2016

ORIGINAL

Prepared for

Silver Crest Homes

16500 Wedge Parkway, Bldg A, Ste 200

Reno, NV 89511

Prepared by



WOOD RODGERS

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WTM16-003 - EXHIBIT E

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Submitted Separately

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Map Pocket

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Section 1

Washoe County Development Application

Your entire application is a public record. If you have a concern about releasing personal information, please contact Planning and Development staff at 775.328.3600.

Project Information		Staff Assigned Case No.: _____	
Project Name: Bailey Creek Estates			
Project Description: A Tentative Map for a 56 lot single family residential subdivision with lots ranging in size from 1/2 acre to 1/3 acre.			
Project Address: Geiger Grade/State Route 431			
Project Area (acres or square feet): 28.76 acres			
Project Location (with point of reference to major cross streets AND area locator): The proposed project is located E. of Toll Road; S. of Geiger Grade in the SETM Area Plan/Toll Rd Character Mgmt Area			
Assessor's Parcel No.(s):	Parcel Acreage:	Assessor's Parcel No.(s):	Parcel Acreage:
017-520-03	23.63		
017-480-02	5.125		
Section(s)/Township/Range: Section 27, T18N, R20E			
Indicate any previous Washoe County approvals associated with this application: Case No.(s).			
Applicant Information (attach additional sheets if necessary)			
Property Owner:		Professional Consultant:	
Name: Charles B. Maddox		Name: Wood Rodgers, Inc.	
Address: P.O. Box 70577, Reno, NV		Address: 1361 Corporate Blvd; Reno, NV	
Zip: 89570		Zip: 89502	
Phone: 852-4466	Fax:	Phone: 775-823-5258	Fax: 823-4066
Email: danmcgill@prodigy.net		Email: shuggins@woodrogers.com	
Cell:	Other:	Cell: 775-250-8213	Other:
Contact Person: Dan McGill		Contact Person: Stacie Huggins	
Applicant/Developer:		Other Persons to be Contacted:	
Name: Silver Crest Homes		Name: Wood Rodgers, Inc.	
Address: 16500 Wedge Parkway, Bldg A, Ste 200		Address: 1361 Corporate Blvd; Reno, NV	
Zip: 89511		Zip: 89502	
Phone: 916-787-3420	Fax:	Phone: 775-823-4050	Fax: 826-4066
Email: rbalestreri@timlewis.com		Email: sstrickland@woodrogers.com	
Cell: 916-425-5657	Other:	Cell: 775-745-4207	Other:
Contact Person: Rich Balestreri		Contact Person: Steve Strickland	
For Office Use Only			
Date Received:	Initial:	Planning Area:	
County Commission District:		Master Plan Designation(s):	
CAB(s):		Regulatory Zoning(s):	

Tentative Subdivision Map Application Supplemental Information

(All required information may be separately attached)

Chapter 110 of the Washoe County Code is commonly known as the Development Code. Specific references to tentative subdivision maps may be found in Article 608, Tentative Subdivision Maps.

1. What is the location (address or distance and direction from nearest intersection)?

The proposed project is located on two parcels fronting on Geiger Grade/Highway 341 directly south of Shadow Hills Drive. The subject parcels are approximately 1/4 mile from the intersection of Geiger Grade/Highway 341 and Toll Road in the Toll Road Character Management Area of the Southeast Truckee Meadows Area Plan (SETM).

2. What is the subdivision name (proposed name must not duplicate the name of any existing subdivision)?

Bailey Creek Estates

3. Density and lot design:

a. Acreage of project site	28.76 acres
b. Total number of lots	56
c. Dwelling units per acre	1.95 du/acre
d. Minimum and maximum area of proposed lots	0.33 min - 0.81 max
e. Minimum width of proposed lots	80 feet
f. Average lot size	0.41 acres (17,869 sqft)

4. Utilities:

a. Sewer Service	Washoe County
b. Electrical Service	NV Energy
c. Telephone Service	AT&T
d. LPG or Natural Gas Service	NV Energy
e. Solid Waste Disposal Service	Waste Management
f. Cable Television Service	Charter Communications
g. Water Service	TMWA

5. For common open space subdivisions (Article 408), please answer the following:

a. Acreage of common open space:

0.75+/- acres

b. Development constraints within common open space (slope, wetlands, faults, springs, ridgelines):

Common open space areas are needed to accommodate drainage and on-site detention.

c. Range of lot sizes (include minimum and maximum lot size):

min lot size = 0.33 acre; max lot size = 0.81 acre

d. Average lot size:

0.41 ac

e. Proposed yard setbacks if different from standard:

Setbacks for Bailey Creek Estates will match the zoning setbacks of MDS.

f. Justification for setback reduction or increase, if requested:

Not applicable.

g. Identify all proposed non-residential uses:

There are no non-residential uses associated with Bailey Creek Estates.

- h. Improvements proposed for the common open space:

Common areas are proposed to remain natural. The only anticipated disturbance within these areas is anticipated to be associated with detention and drainage facilities for appropriate, controlled conveyance of stormwater and drainage.

- i. Describe or show on the tentative map any public or private trail systems within common open space of the development:

There are no public or private trail systems within the Bailey Creek Estates project.

- j. Describe the connectivity of the proposed trail system with existing trails or open space adjacent to or near the property:

Not applicable.

- k. If there are ridgelines on the property, how are they protected from development?

There are no ridgelines on the property.

- l. Will fencing be allowed on lot lines or restricted? If so, how?

Yes, fencing will be allowed on side and rear lot lines in accordance with Washoe County standards.

m. Identify the party responsible for maintenance of the common open space:

The Bailey Creek Estates Homeowners Association will be responsible for maintenance of the common open space areas.

6. Is the project adjacent to public lands or impacted by "Presumed Public Roads" as shown on the adopted April 27, 1999 Presumed Public Roads (see Washoe County Engineering website at <http://www.washoecounty.us/pubworks/engineering.htm>). If so, how is access to those features provided?

The site does not appear to be impacted by "presumed public roads" based on the Presumed Public Roads "Carson" area map.

7. Is the parcel within the Truckee Meadows Service Area?

Yes

No

8. Is the parcel within the Cooperative Planning Area as defined by the Regional Plan?

Yes

No

If yes, within what city? City of Reno

9. Will a special use permit be required for utility improvement? If so, what special use permits are required and are they submitted with the application package?

No special use permits are required for this project.

10. Has an archeological survey been reviewed and approved by SHPO on the property? If yes, what were the findings?

At this time, an archaeological survey has not been conducted.

11. Indicate the type and quantity of water rights the application has or proposes to have available:

a. Permit #		acre-feet per year	
b. Certificate #		acre-feet per year	
c. Surface Claim #		acre-feet per year	
d. Other #		acre-feet per year	

e. Title of those rights (as filed with the State Engineer in the Division of Water Resources of the Department of Conservation and Natural Resources):

The property is within the TMWA Retail Water Service Area. Water rights to serve the project will be dedicated prior to recordation of each final map.

12. Describe the aspects of the tentative subdivision that contribute to energy conservation:

The proposed project should be considered as an in-fill project as the site is surrounded by existing development on all sides. To address energy conservation, homes are anticipated to be constructed using energy efficient designs including water conservation considerations.

13. Is the subject property in an area identified Planning and Development as potentially containing rare or endangered plants and/or animals, critical breeding habitat, migration routes or winter range? If so, please list the species and describe what mitigation measures will be taken to prevent adverse impacts to the species:

The site does not appear to be in an area containing rare or endangered plants/animals, critical breeding habitat, migration routes or winter range.

14. If private roads are proposed, will the community be gated? If so, is a public trail system easement provided through the subdivision?

The proposed project does not include any private roads. The primary access will be Sterling Hills Way, which will be accessed by an extension of Shadow Hills Drive on the south side of Geiger Grade. Gated emergency access will be provided at the intersection of Sterling Hills Way and Moon Lane near the southeast portion of the site.

Pedestrian access will be provided through the project site via streets and sidewalks.

15. Is the subject property located adjacent to an existing residential subdivision? If so, describe how the tentative map complies with each additional adopted policy and code requirement of Article 434, Regional Development Standards within Cooperative Planning Areas and all of Washoe County, in particular, grading within 50 and 200 feet of the adjacent developed properties under 5 acres and parcel matching criteria:

The project site is adjacent to the Bailey Creek drainage, which serves as a natural buffer between the proposed project and the previously approved, and fully built, Cottonwood Creek Subdivision. The existing single family residences to the south and east of the project site have a medium density suburban (MDS) land use designation, consistent with the project site. To comply with lot adjacency standards, in addition to the natural buffer provided by the Bailey Creek drainage, parcels abutting the drainage have been sized in accordance with the SETM requirements with similar sized lots adjacent to the drainage and larger lots along the exterior of the project.

16. Are there any applicable policies of the adopted area plan in which the project is located that require compliance? If so, which policies and how does the project comply?

The project site is located in the Southeast Truckee Meadows Area Plan, Toll Road Character Management Area and has a land use designation of Medium Density Suburban. In accordance with SETM Policy 2.13, the proposed project restricts density to 2 dwelling units per acre and includes 1/2 acre lots on the exterior that abuts developed MDS and 1/3 acre lots where abutting higher intensity land uses. This proposed project meets SETM Policy 2.13 (a) and (b) as well as all Washoe County Development Code requirements.

17. Are there any applicable area plan modifiers in the Development Code in which the project is located that require compliance? If so, which modifiers and how does the project comply?

The project site is located in the Southeast Truckee Meadows Area Plan and has a land use designation of Medium Density Suburban. In accordance with Section 110.212.05 Medium Density Suburban Area Modifier, the maximum number of dwelling units that may be located in the MDS zone in the Southeast Truckee Meadows planning area is two units per acre. Additionally, the modifier limits minimum lot area to 1/2 acre lots on an exterior that abuts developed MDS and 1/3 acre lots where abutting higher intensity land uses.

This proposed project meets WC Development Code and SETM Policy 2.13 (a) and (b) requirements.

18. Will the project be completed in one phase or is phasing planned? If so, please provide that phasing plan:

The subdivision is anticipated to be developed in one phase.

19. Is the project subject to Article 424, Hillside Development? If yes, please address all requirements of the Hillside Ordinance in a separate set of attachments and maps.

Yes No If yes, include a separate set of attachments and maps.

20. Is the project subject to Article 418, Significant Hydrologic Resources? If yes, please address Special Review Considerations within Section 110.418.30 in a separate attachment.

Yes No If yes, include separate attachments.

Grading

Please complete the following additional questions if the project anticipates grading that involves: (1) Disturbed area exceeding twenty-five thousand (25,000) square feet not covered by streets, buildings and landscaping; (2) More than one thousand (1,000) cubic yards of earth to be imported and placed as fill in a special flood hazard area; (3) More than five thousand (5,000) cubic yards of earth to be imported and placed as fill; (4) More than one thousand (1,000) cubic yards to be excavated, whether or not the earth will be exported from the property; or (5) If a permanent earthen structure will be established over four and one-half (4.5) feet high:

21. How many cubic yards of material are you proposing to excavate on site?

50,000 +/- cubic yards

22. How many cubic yards of material are you exporting or importing? If exporting of material is anticipated, where will the material be sent? If the disposal site is within unincorporated Washoe County, what measures will be taken for erosion control and revegetation at the site? If none, how are you balancing the work on-site?

It is not anticipated that any import or export of soil (to or from the site) will be necessary. Site grading will result in balance of cut/fill materials.

23. Can the disturbed area be seen from off-site? If yes, from which directions, and which properties or roadways? What measures will be taken to mitigate their impacts?

Yes. The proposed development will be visible from all sides. Landscaping and trees are proposed along Geiger Grade to mitigate views from the north. Fencing will be provided along side and rear yards in accordance with County code to help mitigate visibility of the proposed project.

24. What is the slope (Horizontal:Vertical) of the cut and fill areas proposed to be? What methods will be used to prevent erosion until the revegetation is established?

Grading is proposed to not exceed 3:1. However, if grading exceeds 3:1, it may be armored per code. Where necessary, erosion control matting, or equivalent, may be provided until such revegetation is established.

25. Are you planning any berms and, if so, how tall is the berm at its highest? How will it be stabilized and/or revegetated?

Berms, no greater than 3:1, may be associated with fencing along Geiger Grade. Berms will be revegetated with native vegetation where appropriate.

26. Are retaining walls going to be required? If so, how high will the walls be, will there be multiple walls with intervening terracing, and what is the wall construction (i.e. rockery, concrete, timber, manufactured block)? How will the visual impacts be mitigated?

No. Walls are not proposed as part of this project.

27. Will the grading proposed require removal of any trees? If so, what species, how many, and of what size?

No. The proposed project does not require removal of any trees.

28. What type of revegetation seed mix are you planning to use and how many pounds per acre do you intend to broadcast? Will you use mulch and, if so, what type?

Specific seed mix for revegetation areas will be determined during final design, however, the applicant does not anticipate using mulch.

29. How are you providing temporary irrigation to the disturbed area?

No areas are proposed to need temporary irrigation. Dust control on flatter areas of the graded site will be provided through the use of dust palliative or other acceptable, non-irrigated means.

30. Have you reviewed the revegetation plan with the Washoe Storey Conservation District? If yes, have you incorporated their suggestions?

No.

Property Owner Affidavit

Applicant Name: Silver Crest Homes

The receipt of this application at the time of submittal does not guarantee the application complies with all requirements of the Washoe County Development Code, the Washoe County Master Plan or the applicable area plan, the applicable regulatory zoning, or that the application is deemed complete and will be processed.

STATE OF NEVADA)
COUNTY OF WASHOE)

C. B. Maddox
(please print name)

being duly sworn, depose and say that I am the owner* of the property or properties involved in this application as listed below and that the foregoing statements and answers herein contained and the information herewith submitted are in all respects complete, true, and correct to the best of my knowledge and belief. I understand that no assurance or guarantee can be given by members of Planning and Development.

(A separate Affidavit must be provided by each property owner named in the title report.)

Assessor Parcel Number(s) 017-520-03 and 017-480-D2

Printed Name C. B. Maddox

Signed [Signature]

Address P.O. Box 70577

Reno, NV 89570

Subscribed and sworn to before me this 21 day of December, 2016
[Signature]
Notary Public in and for said county and state

My commission expires: 10/25/19



*Owner refers to the following: (Please mark appropriate box.)

- Owner
- Corporate Officer/Partner (Provide copy of record document indicating authority to sign.)
- Power of Attorney (Provide copy of Power of Attorney.)
- Owner Agent (Provide notarized letter from property owner giving legal authority to agent.)
- Property Agent (Provide copy of record document indicating authority to sign.)
- Letter from Government Agency with Stewardship

LEGAL DESCRIPTION

All that real property situate in the County of Washoe, State of Nevada, described as follows:

PARCEL 1:

Parcel 3B-1 of Reversion to Acreage Tract Map of COTTONWOOD ESTATES UNITS 7 & 8, according to the map thereof, filed in the office of the County Recorder of Washoe County, State of Nevada, on June 24, 2014, as Document No. 4366040, Official Records, Tract Map No. 5083.

PARCEL 2:

Parcels A and C as shown on that certain Second Parcel Map for JANE P. PRECISSI, Parcel Map No. 1948, according to the map thereof, filed in the office of the County Recorder of Washoe County, State of Nevada, on February 13, 1986, as File No. 1052547, Official Records.

EXCEPTING THEREFROM that portion within the boundaries of COMSTOCK ESTATES UNIT 1, filed in the office of the County Recorder of Washoe County, Nevada, on August 26, 1992, as File No. 1600029, Map No. 2875 and amended by document recorded October 26, 1992, as Document No. 1616563, Official Records.

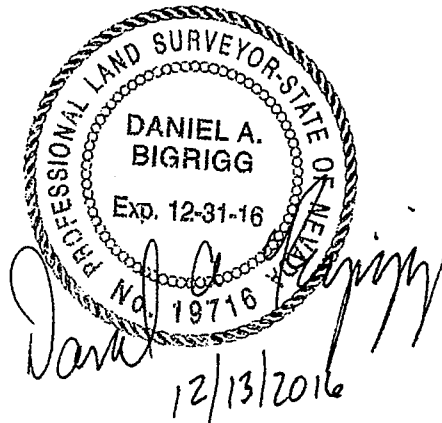
ALSO EXCEPTING THEREFROM that portion lying within the boundaries of COMSTOCK ESTATES UNIT NO. 2, according to the map thereof, filed in the office of the County Recorder of Washoe County, State of Nevada, on March 18, 1994, as File No. 1776765, Official Records.

FURTHER EXCEPTING THEREFROM that portion lying within the boundaries of COMSTOCK ESTATES UNIT NO. 3, according to the map thereof, filed in the office of the County Recorder of Washoe County, State of Nevada, on September 8, 1994, as File No. 1831350, Official Records

Assessor's Parcel Number(s): 017-480-02 & 017-520-03

Prepared by:
Wood Rodgers, Inc.
1361 Corporate Boulevard
Reno, Nevada 89502

Daniel A. Bigrigg, PLS
Nevada Certification No. 19716



Account Detail

[Back to Search Results](#)

[Change of Address](#)

[Print this Page](#)

Washoe County Parcel Information

Parcel ID 01752003	Status Active	Last Update 12/13/2016 2:09:51 AM
Current Owner: MADDOX, CHARLES B PO BOX 70577 RENO, NV 89570	SITUS: 0 GEIGER GRADE RD RENO NV	
Taxing District 4000	Geo CD:	

Legal Description

Township 18 Section 27 Lot 3B-1 Block Range 20 SubdivisionName _REVERSION

Tax Bill (Click on desired tax year for due dates and further details)

Tax Year	Net Tax	Total Paid	Penalty/Fees	Interest	Balance Due
2016	\$3,873.67	\$1,936.84	\$0.00	\$0.00	\$1,936.83
2015	\$3,866.39	\$3,866.39	\$0.00	\$0.00	\$0.00
2014	\$3,746.48	\$3,746.48	\$0.00	\$0.00	\$0.00
Total					\$1,936.83

Important Payment Information

- **ALERTS:** If your real property taxes are delinquent, the search results displayed may not reflect the correct amount owing. Please contact our office for the current amount due.
- For your convenience, online payment is available on this site. E-check payments are accepted without a fee. However, a service fee does apply for online credit card payments. See Payment Information for details.

Pay Online

Payments will be applied to the oldest charge first.

Select a payment option:

- Total Due \$1,936.83
 Oldest Due \$968.42
 Partial

[ADD TO CART](#)

\$0.00

Pay By Check

Please make checks payable to:
WASHOE COUNTY TREASURER

Mailing Address:
P.O. Box 30039
Reno, NV 89520-3039

Overnight Address:
1001 E. Ninth St., Ste D140
Reno, NV 89512-2845

- [Payment Information](#)
- [Special Assessment District](#)
- [Installment Date Information](#)
- [Assessment Information](#)

The Washoe County Treasurer's Office makes every effort to produce and publish the most current and accurate information possible. No warranties, expressed or implied, are provided for the data herein, its use, or its interpretation. If you have any questions, please contact us at (775) 328-2510 or tax@washoecounty.us

This site is best viewed using Google Chrome, Internet Explorer 11, Mozilla Firefox or Safari.

Account Detail

[Back to Search Results](#)

[Change of Address](#)

[Print this Page](#)

Washoe County Parcel Information

Parcel ID	Status	Last Update
01748002	Active	12/13/2016 2:09:51 AM

Current Owner:
MADDOX, CHARLES B

SITUS:
0 MOON LN
WASHOE COUNTY NV

PO BOX 70577
RENO, NV 89570

Taxing District
4000

Geo CD:

Legal Description

Township 18 Range 20 SubdivisionName _UNSPECIFIED Section 34 Lot FR PAR C & FR PAR A Block

Tax Bill (Click on desired tax year for due dates and further details)

Tax Year	Net Tax	Total Paid	Penalty/Fees	Interest	Balance Due
2016	\$428.02	\$214.02	\$0.00	\$0.00	\$214.00
2015	\$426.92	\$426.92	\$0.00	\$0.00	\$0.00
2014	\$413.60	\$413.60	\$0.00	\$0.00	\$0.00
Total					\$214.00

Important Payment Information

- **ALERTS:** If your real property taxes are delinquent, the search results displayed may not reflect the correct amount owing. Please contact our office for the current amount due
- For your convenience, online payment is available on this site. E-check payments are accepted without a fee. However, a service fee does apply for online credit card payments. See Payment Information for details.

Pay Online

Payments will be applied to the oldest charge first.

Select a payment option:

- Total Due \$214.00
- Oldest Due \$107.00
- Partial

[ADD TO CART](#)

\$0.00

Pay By Check

Please make checks payable to:
WASHOE COUNTY TREASURER

Mailing Address:
P.O. Box 30039
Reno, NV 89520-3039

Overnight Address:
1001 E Ninth St., Ste D140
Reno, NV 89512-2845

Payment Information

Special Assessment District

Installment Date Information

Assessment Information

The Washoe County Treasurer's Office makes every effort to produce and publish the most current and accurate information possible. No warranties, expressed or implied, are provided for the data herein, its use, or its interpretation. If you have any questions, please contact us at (775) 328-2510 or tax@washocounty.us

This site is best viewed using Google Chrome, Internet Explorer 11, Mozilla Firefox or Safari

Section 2

Project Description

Location

The Bailey Creek Estates project is in south Washoe County near the intersection of Toll Road and Geiger Grade/Highway 341. The site consists of 28.76± acres and includes Washoe County Assessor Parcel Numbers: 017-520-03 and 017-480-02. The property is bordered by Geiger Grade/Highway 341 and existing residential to the north, a mix of undeveloped land and scattered single family residences to the east, and the Bailey Creek drainage and single family homes in the Cottonwood Creek subdivision to the south and west. *Refer to Vicinity Map, Assessor's Parcel Map and Site Aerial in Section 3 of this submittal packet.*

Site Characteristics

The project site is relatively flat with approximately 97.3 percent of the site with slopes less than 15%. *(Refer to Slope Map in Section 3 of this submittal packet).* The Bailey Creek drainage runs between Toll Road and Geiger Grade in an open space corridor located south of the site. The site is characterized by native vegetation (primarily native shrubs, sagebrush, grasses, and pinion pines).

A drainageway extends along the southern edge of the site in a south/north direction. The drainageway generally follows the FEMA flood zone AE alignment.

Zoning and Master Plan Designations

The project site is within the Toll Road Character Management Area of the Southeast Truckee Meadows Area Plan (SETM). Master Plan designations are as follows: Rural (0.90± acres) and Suburban Residential (27.815± acres). Zoning designations include: General Rural (0.90± acres) and Medium Density Suburban (27.815± acres) *(Refer to Existing Zoning Map, Existing Master Plan Map Exhibits in Section 3 of this submittal packet).*

Density calculations for the total number of lots permitted (excluding any allotment for the General Rural designated acreage) are as follows:

- Medium Density Suburban -2.0 acre minimum (27.815± acres/2.0 = 55.63 lots)
- General Rural – 40 acre minimum (0.90± acres/40 = 0.023 lots)

Total Lots Permitted = 55.63 (rounded to 56)

Cooperative Planning Area

The project site is in a Cooperative Planning Area and is subject to standards outlined in Washoe County Development Code Article 434. There are existing single family residences to the south and east of the project site that have a medium density suburban (MDS) land use designation. To comply with lot adjacency standards, in addition to the natural buffer provided by the Bailey Creek drainage, parcels abutting the drainage have been sized consistent with adjacent parcel sizes.

Current Request

The current project is a 56-lot single family residential development. Lots range in size from about 1/3 acre (14,520 sqft) to 1/2 acre (21,780 sqft) with an average lot size of 0.41± acres (17,869± sqft). The overall density is 1.95 units per acre and is in accordance with the allowed maximum density of 2.0 units per acre as outlined in the SETM. The project includes approximately 0.75± acres of common area.

The request is summarized as follows:

- A **Tentative Subdivision Map** to permit development of a 56-lot single-family subdivision on 28.76± acres.

Tentative Map Design

The Bailey Creek Estates project is an appropriate use for the project site and should be considered as an infill project. The proposed project is surrounded by existing residential development. Furthermore, the project has been designed in accordance with the policies outlined in the SETM Toll Road Character Management Area Plan and other pertinent Washoe County Development Code regulations.

Density calculations for the total number of lots permitted (excluding any allotment for the General Rural designated acreage) are as follows:

- Medium Density Suburban -2.0 acre minimum ($27.815\pm \text{ acres}/2.0 = 55.63 \text{ lots}$)
- General Rural – 40 acre minimum ($0.90\pm \text{ acres}/40 = 0.023 \text{ lots}$)

Total Lots Permitted = 55.63 (rounded to 56)

While the majority of the site will be developed with single family lots, the project will include approximately 0.75± acres of common area or 2.6% of the site. The overall density is 1.95 dwelling units per acre. (*Refer to Tentative Map Plan Set in Section 3 and Map Pocket of this submittal packet*).

Minimum lot sizes, widths and setbacks for the final map are proposed as follows:

Minimum Lot Size: 14,520± square feet

Minimum Lot Width: 80 feet

Minimum Building Envelope: 3,600 square feet

Minimum Setbacks:

Front Yard Setback = 20 feet

Side Yard Setback = 8 feet

Rear Yard Setback = 20 feet

House Design

Homes are proposed to be one and two story designs with minimum two car garages. House models are not available at this time.

Grading

Disturbed areas will be landscaped and/or revegetated with native vegetation and stabilized in accordance with Washoe County requirements. (*Refer to Tentative Map Plan Set in Section 3 and Map Pocket of this submittal packet*).

Drainage

The proposed drainage system for the project site consists of sheet flow from the lots and streets into gutters with which storm water is conveyed into drop inlets and underground storm drain pipes. Onsite flows will be directed to detention basins or directly to Bailey Creek. Offsite flows from the MDS parcels to the east will be picked up in v-ditches located on the project's east boundary. The ditches will pick up the sheet flow from the east and convey it to the underground storm drain system. Ultimately, all of the runoff collected from the offsite areas and developed portions of the project site will be directed into

proposed detention basins. There will be no negative impacts to adjacent or downstream properties as a result of the proposed development during the 5-year and 100-year storms due to the implementation of the proposed storm water management system. *(Refer to Tentative Map Plan Set and Preliminary Drainage Report in Section 3 and Map Pocket of this submittal packet).*

Traffic and Circulation

Access to the subdivision will be from an extension of Shadow Hills Drive with gated emergency access at the intersection of Sterling Hills Way and Moon Lane. The portion of Moon Lane that is located on the project site will be improved with a 50-foot right-of-way section in accordance with Washoe County design requirements for rural areas. At the project boundary, Moon Lane has an access easement that will allow connectivity with Kivett Lane. In addition to roadway improvements, the proposed subdivision includes sidewalk located on the south side of the main street through the project. *(Refer to Tentative Map Plan Set in Section 3 and Map Pocket of this submittal packet).*

Common Areas

Common areas are strategically located within the subdivision to accommodate detention and/or drainage improvements. *(Refer to Tentative Map Plan Set in Section 3 and Map Pocket of this submittal packet).* Common areas total 0.75± acres and will be landscaped and/or re-vegetated with native vegetation. *(Refer to Preliminary Landscaping Plan in Section 3 and the Map Pocket of this submittal packet).* Maintenance of common areas associated with the project will be maintained by the Bailey Creek Estates Home Owners Association (HOA).

Landscaping

In accordance with Section 110.412.35 all front, rear or side yards that adjoin a public street include at least one tree for every fifty linear feet of street frontage. Where lots abut Geiger Grade, the project includes a 5-foot wide buffer strip with four trees per lot. As depicted on the Preliminary Landscape Plan, the project includes 52 trees along Geiger Grade plus 1 additional tree for each lot that abuts public streets the roadways.

Front yard landscaping will also be provided for each lot. *(Refer to Preliminary Landscaping Plan in Section 3 and the Map Pocket of this submittal packet).*

Fencing

With construction of the homes, standard, 6-foot high, solid fencing will be provided along rear and side lot lines throughout the development.

Project Signage

Project signage will consist of monument style entry sign(s) located near the main project entry point along Geiger Grade. Materials will be consistent with the style of the future homes. Lighting of the sign(s) will be indirect.

Water, Sewer and Utilities

Utilities are currently stubbed near the site in Geiger Grade, Shadow Hills Drive and Kivett Lane.

The site is located with the TMWA Retail Water Service Area. Water rights sufficient to serve the proposed subdivision will be dedicated at the time of the final map as required *(Refer to Estimation of Water Demand for Land Development Projects in Section 4 of this submittal packet).*

Sewer service will be provided by Washoe County with treatment at the South Truckee Meadows Wastewater Treatment Facility (STMWRF).

NV Energy will provide gas and electrical service to the project. Telephone service will be provided by AT&T while cable service will be from Charter Communications.

Schools

Students residing in the subdivision will attend Brown Elementary School; Depoali Middle School and Damonte Ranch High School.

Police and Fire Service

Police and fire service will be provided by Truckee Meadows Fire Department. The closest Truckee Meadows Fire Station is Station 14 located at 12300 Old Virginia Road, approximately 3 miles from the intersection of Shadow Hills Drive and Geiger Grade.

Parks

The proposed project is less than 1 mile from Virginia Foothills Park, which is maintained by Washoe County. The park offers 15 acres of recreational opportunities including tennis courts, covered group picnic areas, children's playground areas, exercise cluster, a fitness trail, and a baseball/soccer field.

Phasing

The subdivision is anticipated to be developed in one phase.

Development Statistics Summary

The following is a summary of the development statistics of the site:

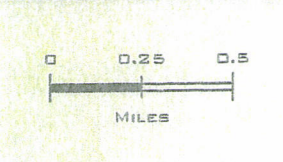
Total Site Area:	28.76± acres
Total Dwelling Units:	56 single family residences
Gross Density:	1.95± d.u./acre
Total Lot Area:	23.17± acres
Total Right of Way Area:	4.84± acres
Total Common Area/Open Space	0.75± acres (2.6%±)

Section 3



 Project Area

Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community



Vicinity Map
Bailey Creek Estates
Washoe County
December, 2016

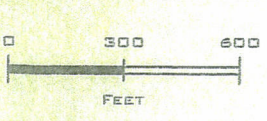


WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
1861 Corporate Boulevard Tel: 775.823.4088
Reno, NV 89502 Fax: 775.823.4086



 Project Area

Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community



Site Aerial
 Bailey Creek Estates
 Washoe County
 December, 2016


WOOD RODGERS
 BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
 1361 Corporate Boulevard Tel: 775.823.4066
 Reno, NV 89502 Fax: 775.823.4066

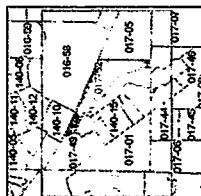
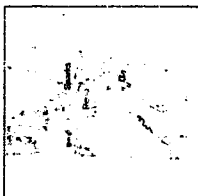
Assessor's Map Number
017-52

STATE OF NEVADA
WASHOE COUNTY
ASSESSOR'S OFFICE
Joshua G. Wilson, Assessor

1001 East Main Street
Building D
Reno, Nevada 89512
(775) 332-4221



0 75 150 225 300
Foot
1 inch = 300 feet



created by CFB 10/24/2012
list updater KSB 7/01/14

area previously shown on map(s)

NOTE: This map was prepared for the use of the Washoe County Assessor for assessment and mapping purposes only. It is not intended as a survey of the premises. No liability is assumed as to the sufficiency or accuracy of the data delineated herein.

A POR. OF THE SW 1/4 OF SEC. 27
T18N - R20E

140-10

SANDON HILLS DR

STATE

PAR 38-1
REV TO ACREAGE
TMI 5003

140-13

ROUTE

017-520-03
23.53 ac.

140-14

CHALKY DRIVE

KING

LANE

KIVETT

LANE

27
34

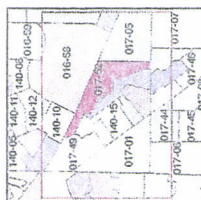
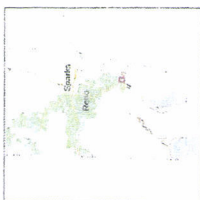
017-48

Assessor's Map Number
017-52

STATE OF NEVADA
WASHOE COUNTY
ASSESSOR'S OFFICE
Joshua G. Wilson, Assessor
1001 East Main Street
Reno, Nevada 89512
(775) 382-2231



0 75 150 225 300
1 inch = 300 feet



created by CFB 10/24/2012
last updated: KSB 7/01/14
area previously shown on map(s)

NOTE: This map was prepared for the use of the Washoe County Assessor for assessment and is not intended to be used as a legal document. A survey of the premises is necessary to determine the sufficiency or propriety of the data delineated herein.

**A POR. OF THE SW 1/4 OF SEC. 27
T18N - R20E**

140-10

SHADOW HILLS DR

STATE

PAR 3B-1
REV. TO ACREAGE
TM 50033

140-13

ROUTE

017-520-03
23.53 AC

A

140-14

341

41MG

KIVETT

LANE

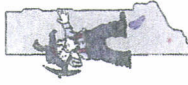
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34

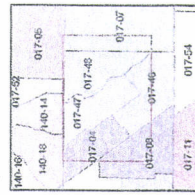
017-48

Assessor's Map Number
017-48

STATE OF NEVADA
WASHOE COUNTY
ASSESSOR'S OFFICE
Joshua G. Wilson, Assessor
1001 East Ninth Street
Reno, Nevada, 89512
1775/338-2251



0 25 50 75 100
Feet
1 inch = 100 feet



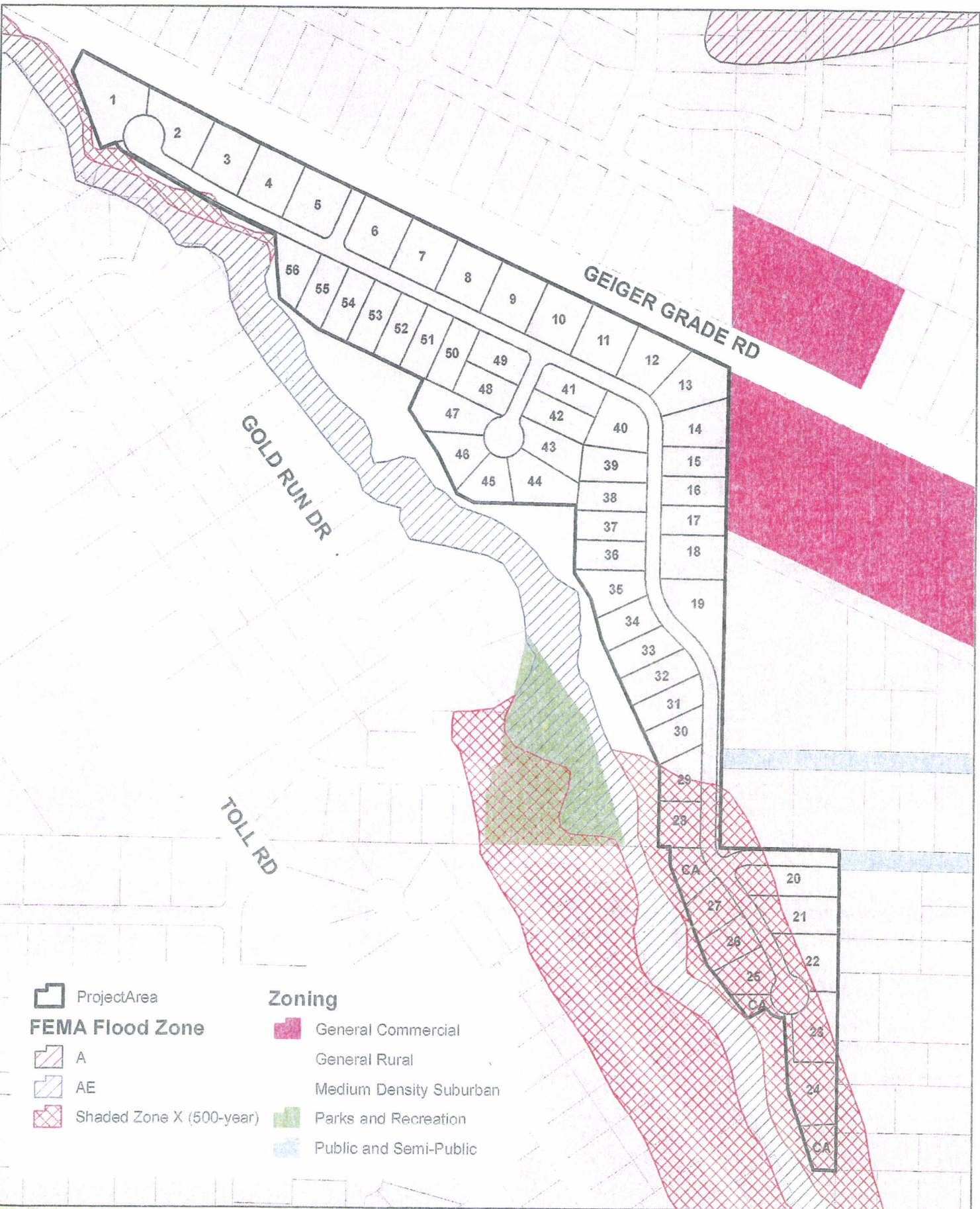
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last updated:





area previously shown on map(s)

NOTE: This map was prepared for the use of the Washoe County Assessor for assessment and illustrative purposes only. It is not to be construed as a warranty of accuracy. It is not intended as to the sufficiency or accuracy of the data obtained hereon.

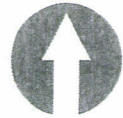
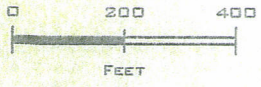


(#3072)
COMSTOCK ESTATES - UNIT 3
COMMON AREA ONLY
PORTION OF THE N 1/2 OF SECTION 34
T18N - R20E



-  Project Area
- FEMA Flood Zone**
-  A
 -  AE
 -  Shaded Zone X (500-year)

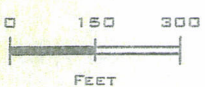
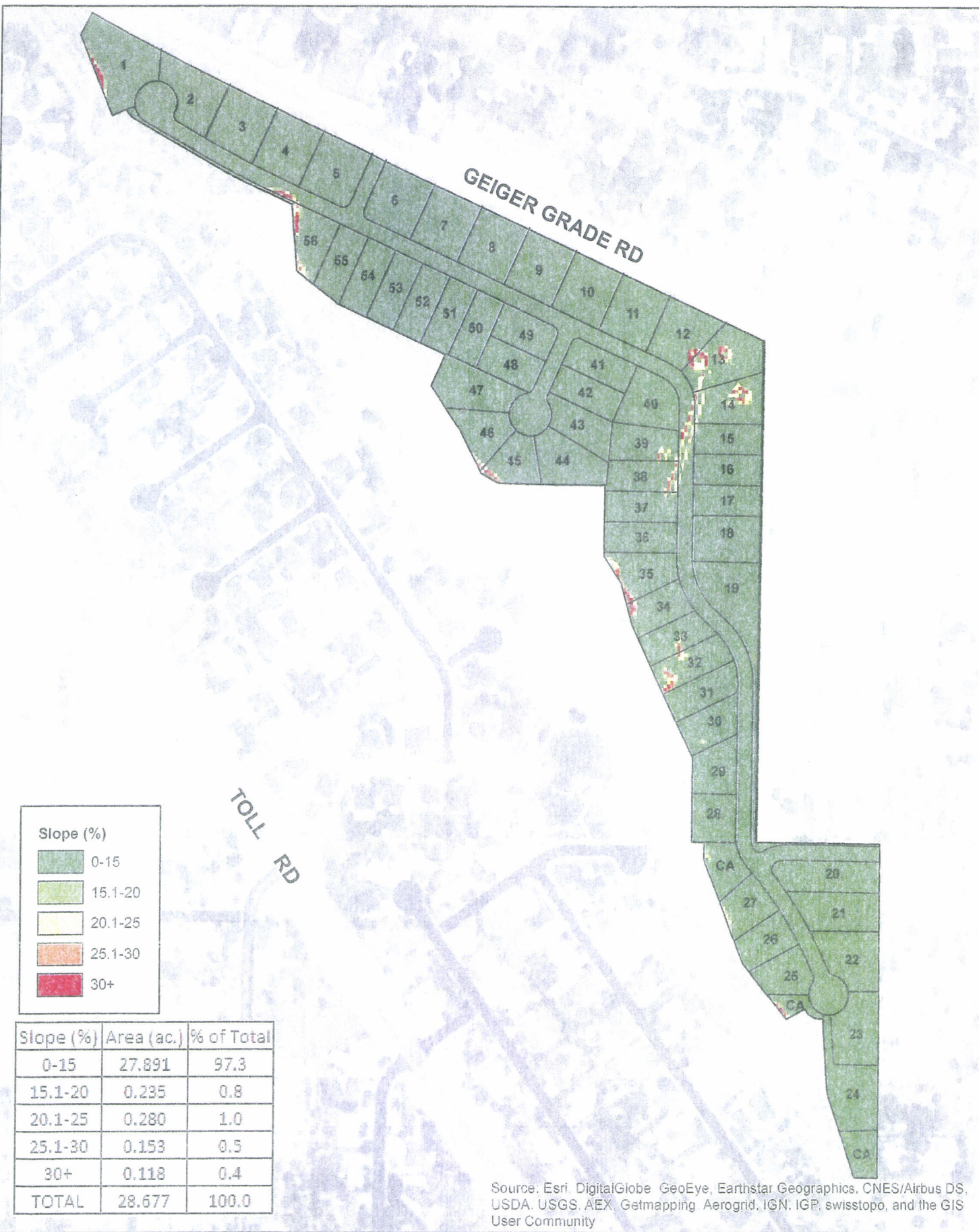
- Zoning**
-  General Commercial
 -  General Rural
 -  Medium Density Suburban
 -  Parks and Recreation
 -  Public and Semi-Public



Existing Washoe County Zoning
Bailey Creek Estates
 Washoe County, NV
 December, 2016



WOOD RODGERS
 BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
 1361 Corporate Boulevard Reno, NV 89502
 Tel: 775.823.4068 Fax: 775.823.4096



Slope Map
Bailey Creek Estates
Washoe County, NV
December, 2016



WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
1361 Corporate Boulevard
Reno, NV 89502
Tel: 775.823.4068
Fax: 775.823.4068

SOLAEGUI

ENGINEERS

December 22, 2016

Ms. Kelly Mullin
Washoe County Community Services Department
1001 East Ninth Street
Reno, Nevada 89512

Re: Cottonwood Creek Estates, Trip Generation Letter

Dear Kelly:

This letter contains the findings of our trip generation review of the proposed single family subdivision located on Gieger Grade Road in the Virginia City Foothills region of unincorporated Washoe County, Nevada. The project site plan is attached. Fifty six lots are proposed in the subdivision.

Trip generation calculations for the proposed use are based on the Ninth Edition of *ITE Trip Generation* (2012). The calculation sheet is attached for ITE land use #210: Single Family Detached Housing. Table 1 shows the trip generation summary for the proposed future use.

TABLE 1
TRIP GENERATION

<u>LAND USE</u>	<u>ADT</u>	<u>AM PEAK HOUR TOTAL</u>	<u>PM PEAK HOUR TOTAL</u>
Single Family Housing 56 Dwelling Units	533	42	56

As indicated in Table 1, the average daily trip total for the fifty six lots is 533 trips with 42 AM peak hour trips and 56 PM peak hour trips. These totals are below the 80 peak hour trip threshold that triggers the need for a full traffic study. Consequently a traffic study is not required. However, the project developer has offered to prepare a traffic study as a courtesy to the county.

We trust that this information will be adequate for your immediate project review. Please contact us if you have any questions or comments.

Very truly yours,
SOLAEGUI ENGINEERS, LTD

Paul W. Solaegui, P.E.

12-22-16
EXP 6-30-18

Enclosures

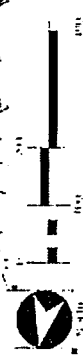
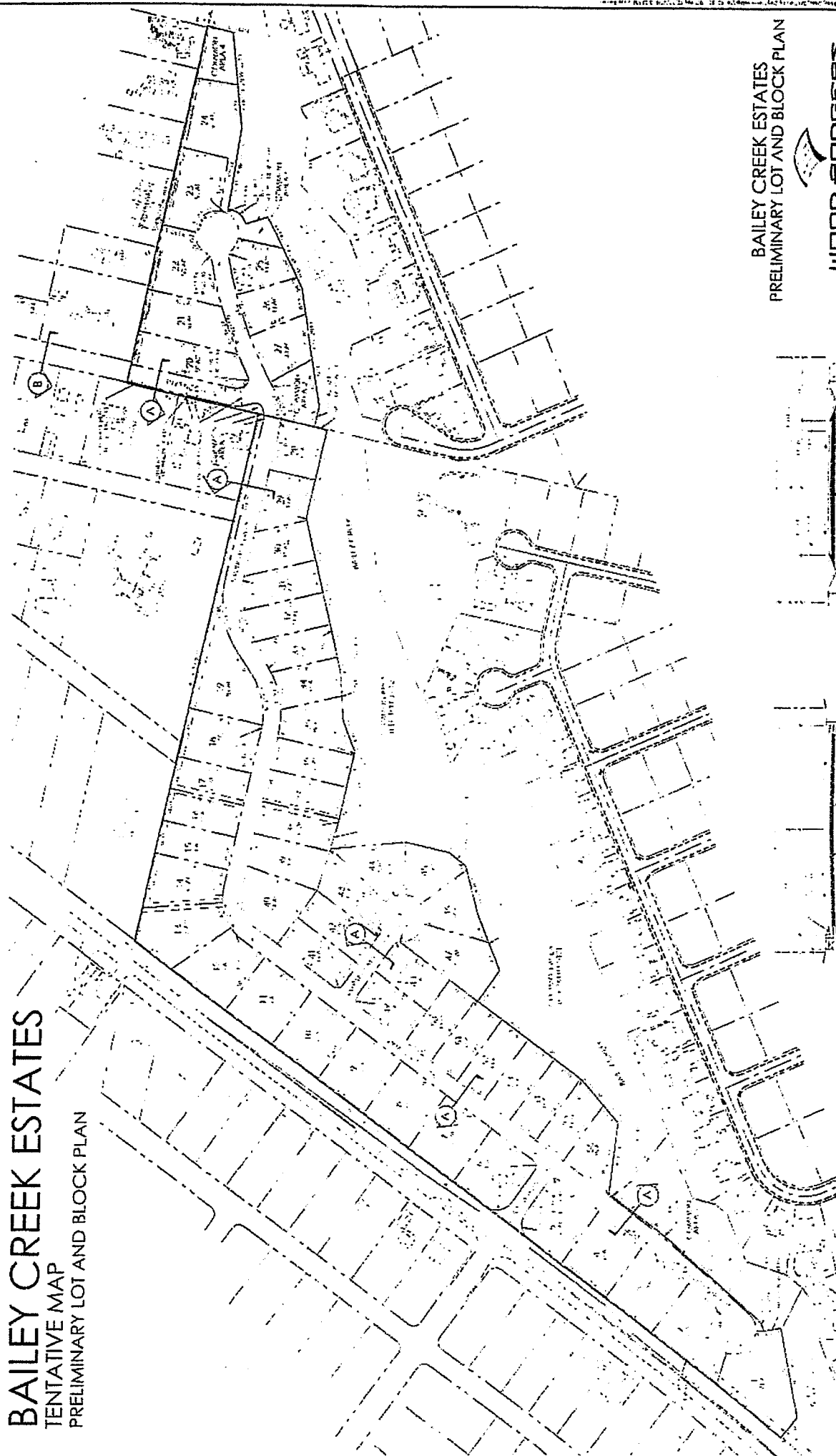
Letters/Cottonwood Creek Estates Trip Letter

Solaegui Engineers Ltd. • 715 H Street • Sparks, Nevada 89431 • 775/358-1004 • FAX 775/358-1098

Civil & Traffic Engineers
e-mail: psolaegui@aol.com

WTM16-003 - EXHIBIT E

BAILEY CREEK ESTATES
 TENTATIVE MAP
 PRELIMINARY LOT AND BLOCK PLAN



47 STREET

MOON LANE

BAILEY CREEK ESTATES
 PRELIMINARY LOT AND BLOCK PLAN



WOOD RODGERS
 REALTOR RELATIONSHIP GROUP PROJECT AT A TIME
 1381 Corporate Drive
 Basking Ridge, NJ 07003
 TEL: 775.859.4088
 FAX: 775.859.4088
 52-8606
 DECEMBER 2016

SHEET LB-1 OF 5

Average Rate Trip Calculations
 For 56 Dwelling Units of Single Family Detached Housing(210) - [R]

Project:
 Phase:

Open Date:
 Analysis Date:

Description:

	Average Rate	Standard Deviation	Adjustment Factor	Driveway Volume
Avg. Weekday 2-Way Volume	9.52	3.70	1.00	533
7-9 AM Peak Hour Enter	0.19	0.00	1.00	11
7-9 AM Peak Hour Exit	0.56	0.00	1.00	31
7-9 AM Peak Hour Total	0.75	0.90	1.00	42
4-6 PM Peak Hour Enter	0.63	0.00	1.00	35
4-6 PM Peak Hour Exit	0.37	0.00	1.00	21
4-6 PM Peak Hour Total	1.00	1.05	1.00	56
Saturday 2-Way Volume	9.91	3.72	1.00	555
Saturday Peak Hour Enter	0.50	0.00	1.00	28
Saturday Peak Hour Exit	0.43	0.00	1.00	24
Saturday Peak Hour Total	0.93	0.99	1.00	52

Note: A zero indicates no data available.
 Source: Institute of Transportation Engineers
 Trip Generation Manual, 9th Edition, 2012

TRIP GENERATION 2013, TRAFFICWARE, LLC



December 20, 2016

Mr. Charles Maddox
P.O. Box 70577
Reno, NV 89570

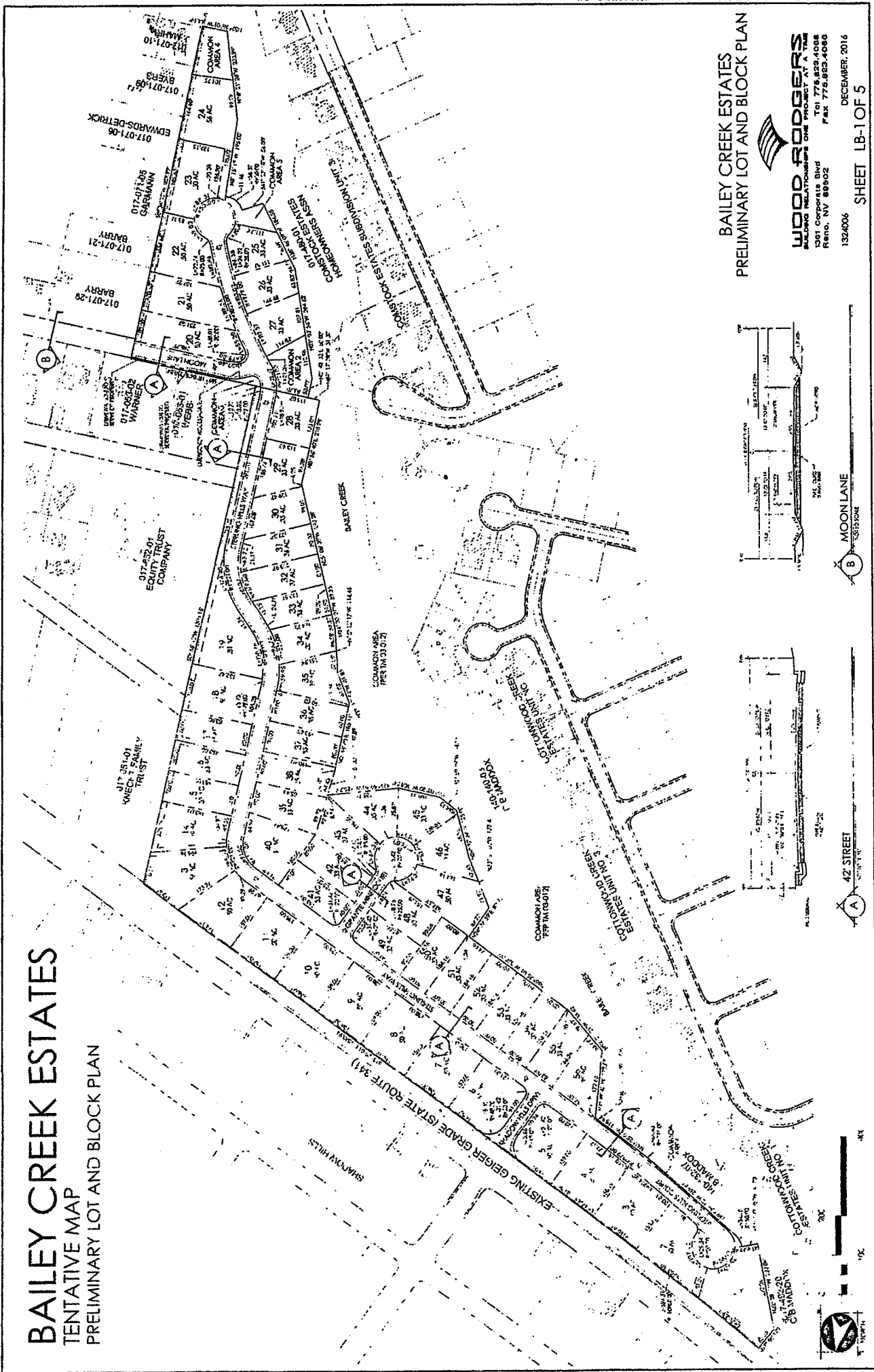
**RE: Bailey Creek Estates
Acknowledgement of Water Service
TMWA Work Order 16-5301**

Dear Mr. Maddox:

I have reviewed the plans for the above referenced development ("Project") as submitted to the Truckee Meadows Water Authority and have determined the Project is within the Truckee Meadows Water Authority's retail water service area. This letter constitutes an Acknowledgment of Water Service pursuant to NAC 445A.6666, and the Truckee Meadows Water Authority hereby acknowledges that Truckee Meadows Water Authority is agreeable to supplying water service to the Project, subject to applicant satisfying certain conditions precedent, including, without limitation, the dedication of water resources, approval of the water supply plan by the local health authority, the execution of a Water Service Agreement, payment of fees, and the construction and dedication of infrastructure in accordance with our rules and tariffs. This Acknowledgement does not constitute a legal obligation by Truckee Meadows Water Authority to supply water service to the Project, and is made subject to all applicable Truckee Meadows Water Authority Rules.

Review of conceptual site plans or tentative maps by Truckee Meadows Water Authority does not constitute an application for service, nor implies a commitment by Truckee Meadows Water Authority for planning, design or construction of the water facilities necessary for service. The extent of required off-site and on-site water infrastructure improvements will be determined by Truckee Meadows Water Authority upon receiving a specific development proposal or complete application for service and upon review and approval of a water facilities plan by the local health authority. Because the NAC 445A Water System regulations are subject to interpretation, Truckee Meadows Water Authority cannot guarantee that a subsequent water facility plan will be approved by the health authority or that a timely review and approval of the Project will be made. The Applicant should carefully consider the financial risk associated with committing resources to their project prior to receiving all required approvals. After submittal of a complete Application for Service, the required facilities, the cost of these facilities, which could be significant, and associated fees will be estimated and will be included as part of the Water Service Agreement necessary for the Project. All fees must be paid to Truckee Meadows Water Authority prior to water being delivered to the Project.

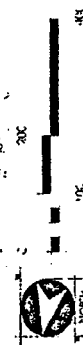
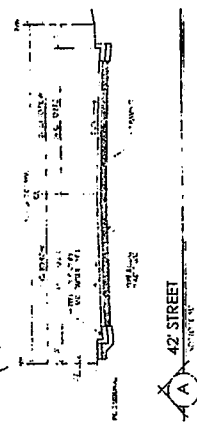
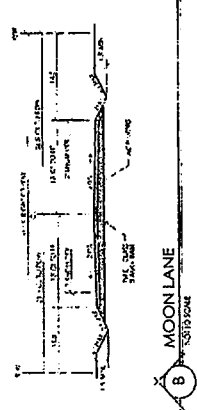
BAILEY CREEK ESTATES
 TENTATIVE MAP
 PRELIMINARY LOT AND BLOCK PLAN

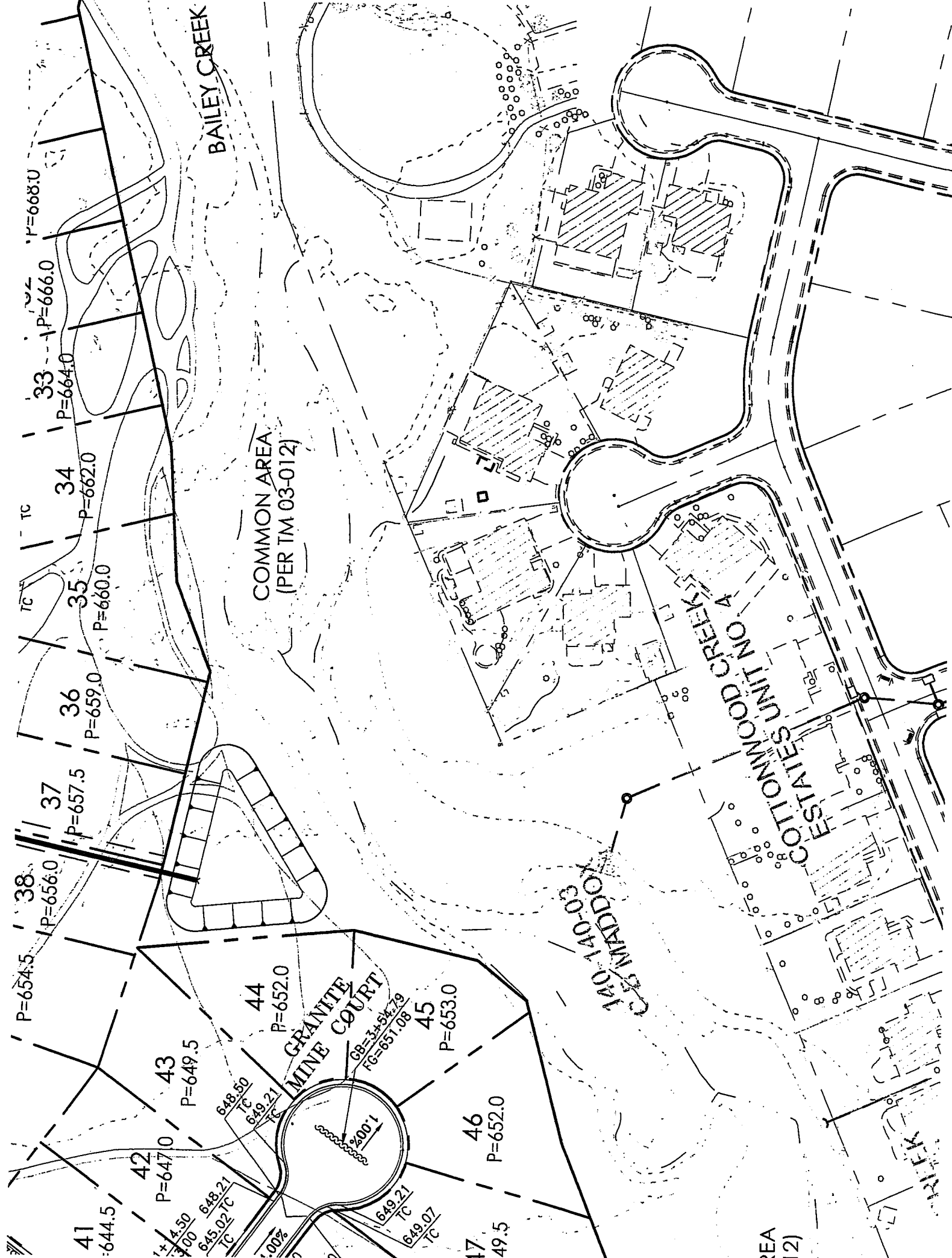


BAILEY CREEK ESTATES
 PRELIMINARY LOT AND BLOCK PLAN

WOOD RODGERS
 BUILDING RELATIONSHIP ONE PROJECT AT A TIME
 1301 Corporate Blvd
 Reno, NV 89502
 Tel 775.853.4088
 Fax 775.853.4086

1304006 SHEET LB-1 OF 5
 DECEMBER, 2016





33 P=668.0
 34 P=666.0
 35 P=664.0
 36 P=662.0
 37 P=660.0
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 46 P=647.0
 47 P=645.5

COMMON AREA
(PER TM 03-012)

BAILEY CREEK

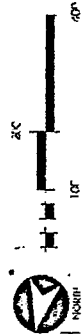
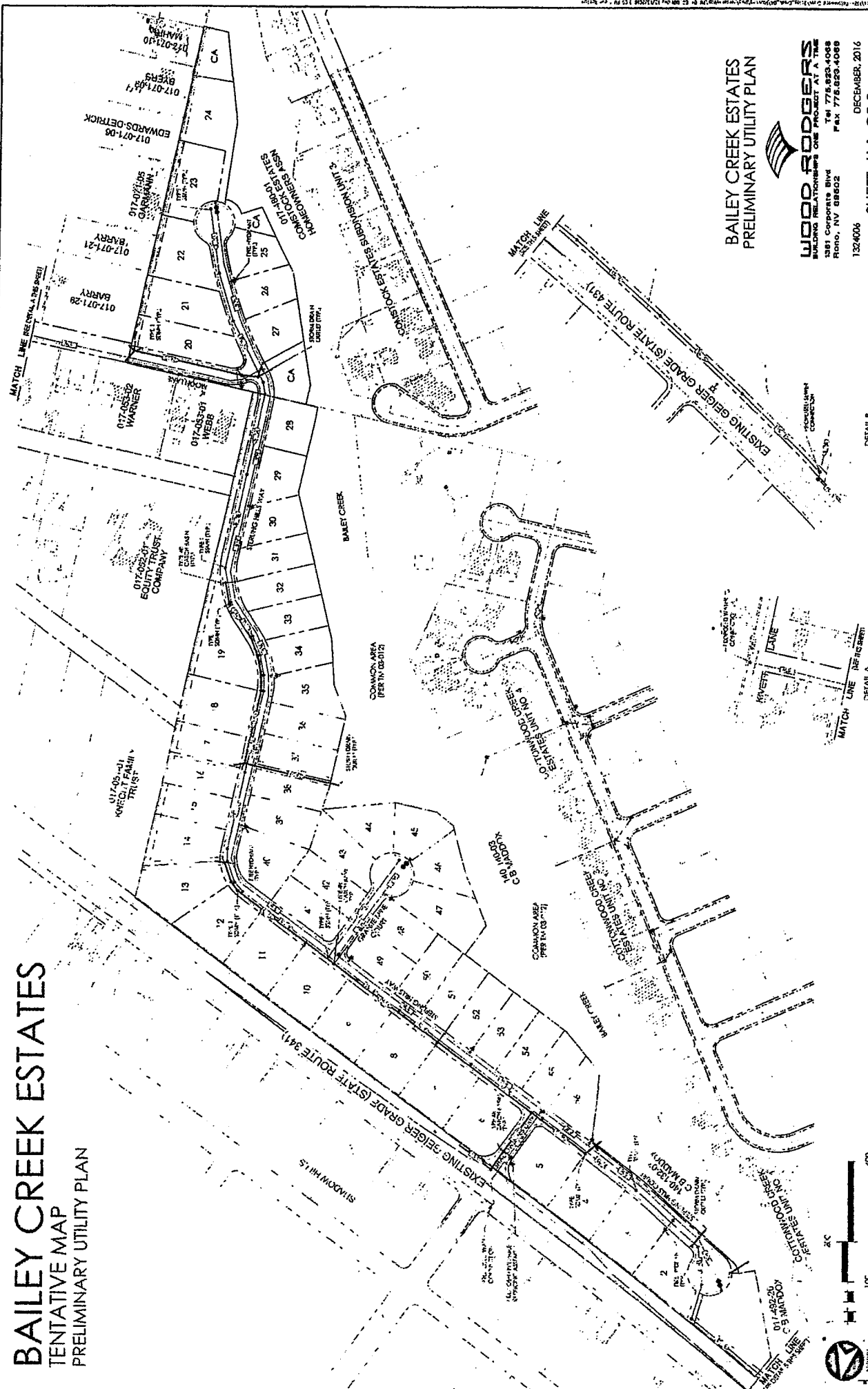
GRANITE
MINE COURT

COTTONWOOD CREEK
ESTATES UNIT NO. 4

120 140-03
C/S WATDOD

BAILEY CREEK

BAILEY CREEK ESTATES
 TENTATIVE MAP
 PRELIMINARY UTILITY PLAN



BAILEY CREEK ESTATES
 PRELIMINARY UTILITY PLAN

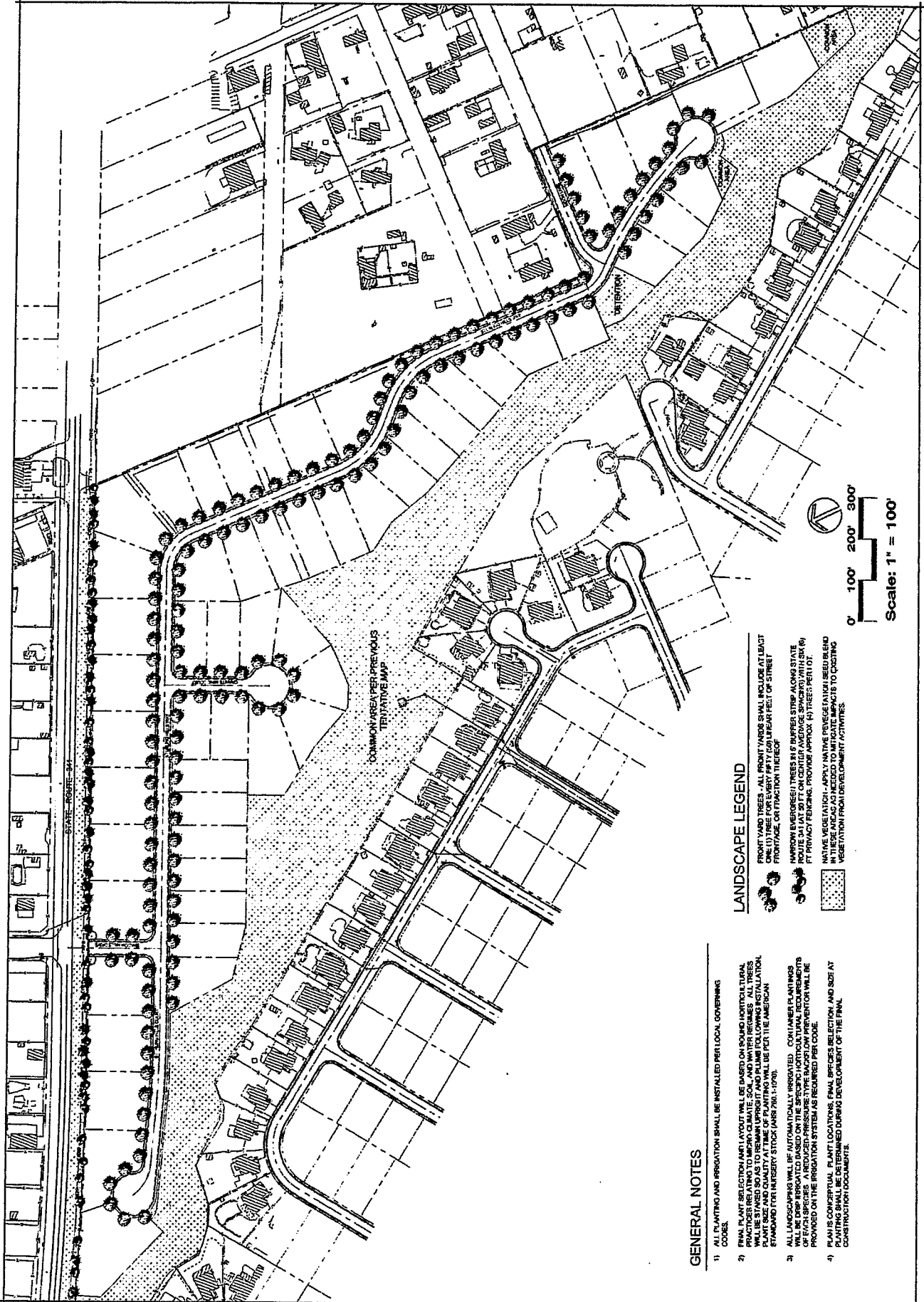


WOOD RODGERS
 BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
 1881 Corporate Blvd
 Reno, NV 89502
 TEL 775.823.4068
 FAX 775.823.4069

1324006 DECEMBER, 2016
 SHEET U-1 OF 5

DETAIL B

DETAIL A



LANDSCAPE LEGEND

- FRONT YARD TREES - ALL FRONT YARDS SHALL INCLUDE AT LEAST ONE (1) TREE FOR EVERY FIFTY (50) LINEAR FEET OF STREET FRONTAGE, OR FRACTION THEREOF
- NARROW EVERGREEN TREES IN 6' BUFFER STRIP ALONG STATE ROUTE 541 AT 30' FT ON CENTER AVERAGE SPACING WITH SIX (6) FT PRIVACY FENCING. PROVIDE APPROX. 4" TREES PER FT. OF
- NATIVE VEGETATION - APPLY NATIVE VEGETATION SEED BLEND IN THESE AREAS AS NEEDED TO MITIGATE IMPACTS TO CROSTING VEGETATION FROM DEVELOPMENT ACTIVITIES.

GENERAL NOTES

- 1) ALL PLANTING AND IRRIGATION SHALL BE INSTALLED PER LOCAL GOVERNING CODES.
- 2) FINAL PLANT SELECTION AND LAYOUT WILL BE BASED ON SOUND HORTICULTURAL PRACTICES AND SHALL BE SUBJECT TO THE APPROVAL OF THE LOCAL AGENCIES. PLANTS WILL BE STAGED SO AS TO REMAIN UPRIGHT AND PLUMB FOLLOWING INSTALLATION. PLANT SIZE AND QUALITY AT TIME OF PLANTING WILL BE PER THE AMERICAN STANDARD FOR HURDSEY STOCK (ANSI Z603.1-1990).
- 3) ALL LANDSCAPING WILL BE AUTOMATICALLY IRRIGATED. CONJUNKER PLANTINGS WILL BE Drip IRRIGATED BASED ON THE SPECIFIC HORTICULTURAL REQUIREMENTS OF THE PLANTS. IRRIGATION SYSTEMS SHALL BE DESIGNED AND SPECIFICATIONS WILL BE PROVIDED ON THE IRRIGATION SYSTEM AS REQUIRED PER CODE.
- 4) PLANT IS CONCEPTUAL. PLANT LOCATIONS, FINAL SPECIES SELECTION AND SIZE AT PLANTING SHALL BE DETERMINED DURING DEVELOPMENT OF THE FINAL CONSTRUCTION DOCUMENTS.

Map Pocket



WOOD RODGERS

December 14, 2016
Project No. 1324006

Silver Crest Homes
Mr. Rich Balestreri
3500 Douglas Blvd, Suite 270
Roseville, CA 95661

**RE: Bailey Creek Subdivision
Geotechnical Review**

REF: Updated Geotechnical Investigation – Cottonwood Creek; (Comstock Estates, Units 4-11, dated January 30, 1995); Reno, Nevada; Summit Engineering Corp.; September 6, 2005; Job No. 21545.

Geotechnical Investigation; Comstock Estates, Units 4-11, Washoe County, Nevada; Summit Engineering Corp.; January 30, 1995; File No. 21545.

2012 International Residential Code & Northern Nevada Amendments (IRC)
2012 International Building Code & Northern Nevada Amendments (IBC)

Dear Mr. Balestreri;

Wood Rodgers is pleased to present this review of prior geotechnical work performed for the referenced development and develop preliminary assessments for the development of the project. The purposes of this review are to:

1. Review prior geotechnical design conditions in consideration of contemporary building code requirements and design standards.
2. As appropriate, present recommendations for additional services or refinement of available data.

Our assessments will initially be based upon the opinions and recommendations presented in the referenced geotechnical reports. Additional assessment will then be provided based on readily available geologic and soil maps.

Prior Work

Four test pits have been excavated on the undeveloped portion of the site as part of the original investigation circa 1995. The predominant soil type shown on the logs indicated a dense layer of well-graded gravel with some cobbles and small boulders up to 12 to 18 inches to the maximum depth explored (10 feet). Early geologic mapping shows the majority of the site as a gravel pit. Laboratory testing was performed on the same classification of soils sampled from the currently developed area and indicates a coarse gravel material with a very low fines content. However, within test pit TP-13, to the far east of the

site, a 2 foot cap of clayey sand was indicated that meets the IBC's requisite definition of potentially expansive soils. Groundwater was not encountered during the field exploration.

Three short, inactive quaternary faults were mapped as trending through the southern half of the current development. The subject portion of the site is not crossed by any mapped faults. Although prior reports did not recommend siting occupied structures across any faults, the update report includes an explanation for occupied structures being built over and adjacent to inactive faults in the greater Reno area for decades without significant harm to residents. Seismic design considerations presented are framed around the now obsolete 2003 IBC maps. Liquefaction potential is described as very minimal.

No soluble sulfate data was available from the prior work. Supplemental sampling and testing of soils was required during mass grading to minimize adverse impacts to concrete improvements.

Contemporary Maps and Codes

USGS Quaternary Fault Structures

The United States' Geological Survey interactive fault hazard program indicates three faults trending toward the subject property from across the southern perimeter. These fault structures have been dated as Quaternary (i.e. < 1.6 million years) and have been assigned to the Unnamed Fault Zone East of Reno; however, no associated Holocene aged structures have been mapped or identified. These faults are indicated in Figure 1; mapping also indicates the structures are concealed or inferred through Quaternary deposits.

Natural Resource Conservation Services (NRCS) – Soil Survey Maps

The bulk of the soil profile has been mapped as silty sand with gravel and silty gravel. However, surface soils within the northeast quadrant of the site are indicated to present a sandy clay layer up to 3 feet thick of moderate plasticity which would be characterized as potentially expansive soils.

Grading

The surface clay rich soils should be removed from the building pad areas where present within two feet of footing grade established for the pad. This will assure that at least two feet of structural fill is present between the bottom of footing any remaining clay zone. These surface clay soils may be placed in deep fills or in non-structural areas. Structural areas are defined as those areas that support structures or

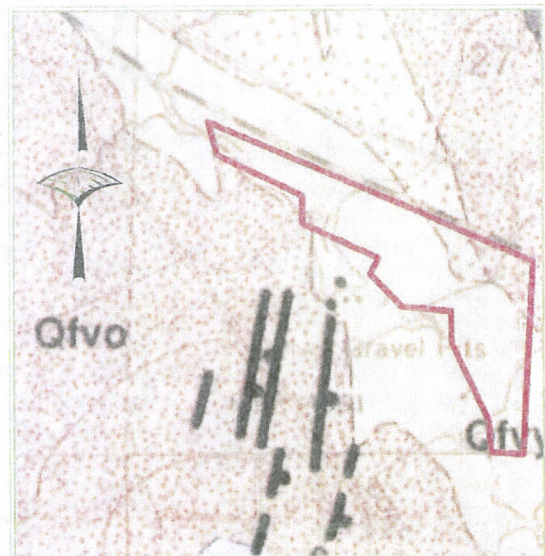


FIGURE 1 – Geologic Map of Project Area
(Nevada Bureau of Mines and Geology, Mt. Rose – NE
Bonham & Rogers, 1993)

Mr. Rich Balestreri
Silver Crest Homes
December 14, 2016
Page 3 of 3

planned improvements, including surcharge and active zones associated with retaining structures. Additional grading recommendations would be developed during performance of a design level geotechnical report.

Public Improvements


Most public improvements will be founded in soils presenting an R-Value greatly exceeding 30; we therefore anticipate that Washoe County's minimum structural pavement sections will be satisfactory. If lower R-Values are determined during performance of a design level geotechnical report, the base course thickness should be modified as required by the Public Works Design Manual.

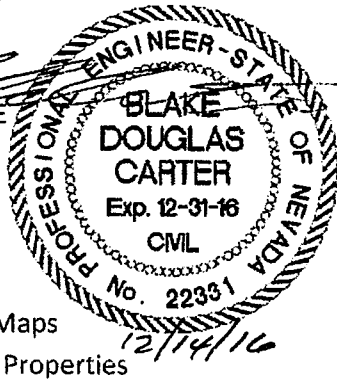
Summary

Overall our preliminary studies indicate the site is well suited for the proposed development. A design level geotechnical report should be prepared for the project that can address specific design and construction considerations based on the current development plan and in consideration of contemporary codes and design standards.

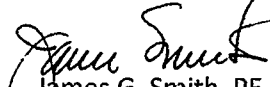
Sincerely,

WOOD RODGERS, INCORPORATED

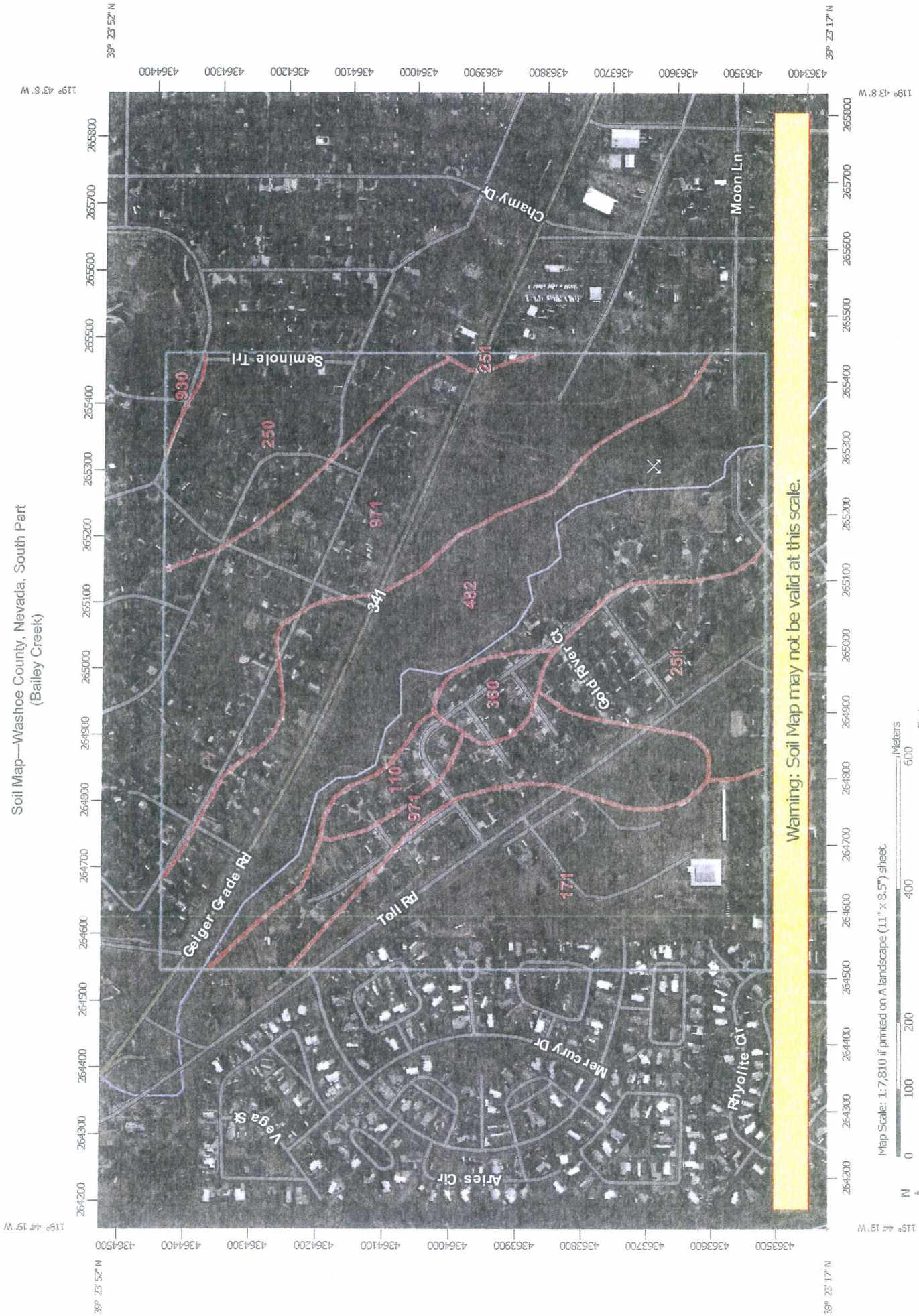

Blake D. Carter, PE
Associate
RE No. 22331
Expires 12/31/16



NRCS Soil Survey Maps
NRCS Engineering Properties


James G. Smith, PE
Principal

Soil Map—Washoe County, Nevada, South Part
(Bailey Creek)



Map Scale: 1:7,810 if printed on A landscapes (11" x 8.5") sheet.



Map projection: Web Mercator Corner coordinates: WGS84 Edge tics: UTM Zone 11N WGS84

MAP LEGEND

- Area of Interest (AOI)
 - Area of Interest (AOI)
- Soils
 - Soil Map Unit Polygons
 - Soil Map Unit Lines
 - Soil Map Unit Points
- Special Point Features
 - Blowout
 - Borrow Pit
 - Clay Spot
 - Closed Depression
 - Gravel Pit
 - Gravelly Spot
 - Landfill
 - Lava Flow
 - Marsh or swamp
 - Mine or Quarry
 - Miscellaneous Water
 - Perennial Water
 - Rock Outcrop
 - Saline Spot
 - Sandy Spot
 - Severely Eroded Spot
 - Sinkhole
 - Slide or Slip
 - Sodic Spot
- Water Features
 - Streams and Canals
- Transportation
 - Rails
 - Interstate Highways
 - US Routes
 - Major Roads
 - Local Roads
- Background
 - Aerial Photography
- Special Line Features
 - Spoil Area
 - Stony Spot
 - Very Stony Spot
 - Wet Spot
 - Other

MAP INFORMATION

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

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

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

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

Source of Map: Natural Resources Conservation Service
 Web Soil Survey URL: <http://websoilsurvey.nrcs.usda.gov>
 Coordinate System: Web Mercator (EPSG:3857)

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

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

Soil Survey Area: Washoe County, Nevada, South Part
 Survey Area Data: Version 12, Sep 12, 2016

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

Date(s) aerial images were photographed: Apr 2, 2012—Apr 29, 2012

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

Map Unit Legend

Washoe County, Nevada, South Part (NV628)			
Map Unit Symbol	Map Unit Name	Acres in AOI	Percent of AOI
110	Jowec variant sandy loam, 4 to 8 percent slopes	4.1	1.9%
171	Indian Creek gravelly sandy loam, 0 to 4 percent slopes	40.2	18.9%
250	Cassiro gravelly sandy loam, 2 to 4 percent slopes	18.5	8.7%
251	Cassiro gravelly sandy loam, 4 to 8 percent slopes	19.2	9.0%
360	Pits	4.1	1.9%
482	Holbrook cobbly loamy sand, 2 to 8 percent slopes	60.5	28.5%
930	Old Camp stony sandy loam, 15 to 30 percent slopes	1.3	0.6%
971	Aladshi sandy loam, 2 to 4 percent slopes	64.7	30.5%
Totals for Area of Interest		212.5	100.0%

Engineering Properties

This table gives the engineering classifications and the range of engineering properties for the layers of each soil in the survey area.

Hydrologic soil group is a group of soils having similar runoff potential under similar storm and cover conditions. The criteria for determining Hydrologic soil group is found in the National Engineering Handbook, Chapter 7 issued May 2007(<http://directives.sc.egov.usda.gov/OpenNonWebContent.aspx?content=17757.wba>). Listing HSGs by soil map unit component and not by soil series is a new concept for the engineers. Past engineering references contained lists of HSGs by soil series. Soil series are continually being defined and redefined, and the list of soil series names changes so frequently as to make the task of maintaining a single national list virtually impossible. Therefore, the criteria is now used to calculate the HSG using the component soil properties and no such national series lists will be maintained. All such references are obsolete and their use should be discontinued. Soil properties that influence runoff potential are those that influence the minimum rate of infiltration for a bare soil after prolonged wetting and when not frozen. These properties are depth to a seasonal high water table, saturated hydraulic conductivity after prolonged wetting, and depth to a layer with a very slow water transmission rate. Changes in soil properties caused by land management or climate changes also cause the hydrologic soil group to change. The influence of ground cover is treated independently. There are four hydrologic soil groups, A, B, C, and D, and three dual groups, A/D, B/D, and C/D. In the dual groups, the first letter is for drained areas and the second letter is for undrained areas.

The four hydrologic soil groups are described in the following paragraphs:

Group A. Soils having a high infiltration rate (low runoff potential) when thoroughly wet. These consist mainly of deep, well drained to excessively drained sands or gravelly sands. These soils have a high rate of water transmission.

Group B. Soils having a moderate infiltration rate when thoroughly wet. These consist chiefly of moderately deep or deep, moderately well drained or well drained soils that have moderately fine texture to moderately coarse texture. These soils have a moderate rate of water transmission.

Group C. Soils having a slow infiltration rate when thoroughly wet. These consist chiefly of soils having a layer that impedes the downward movement of water or soils of moderately fine texture or fine texture. These soils have a slow rate of water transmission.

Group D. Soils having a very slow infiltration rate (high runoff potential) when thoroughly wet. These consist chiefly of clays that have a high shrink-swell potential, soils that have a high water table, soils that have a claypan or clay layer at or near the surface, and soils that are shallow over nearly impervious material. These soils have a very slow rate of water transmission.

Depth to the upper and lower boundaries of each layer is indicated.

Texture is given in the standard terms used by the U.S. Department of Agriculture. These terms are defined according to percentages of sand, silt, and clay in the fraction of the soil that is less than 2 millimeters in diameter. "Loam," for example, is soil that is 7 to 27 percent clay, 28 to 50 percent silt, and less than 52 percent sand. If the content of particles coarser than sand is 15 percent or more, an appropriate modifier is added, for example, "gravelly."

Classification of the soils is determined according to the Unified soil classification system (ASTM, 2005) and the system adopted by the American Association of State Highway and Transportation Officials (AASHTO, 2004).

The Unified system classifies soils according to properties that affect their use as construction material. Soils are classified according to particle-size distribution of the fraction less than 3 inches in diameter and according to plasticity index, liquid limit, and organic matter content. Sandy and gravelly soils are identified as GW, GP, GM, GC, SW, SP, SM, and SC; silty and clayey soils as ML, CL, OL, MH, CH, and OH; and highly organic soils as PT. Soils exhibiting engineering properties of two groups can have a dual classification, for example, CL-ML.

The AASHTO system classifies soils according to those properties that affect roadway construction and maintenance. In this system, the fraction of a mineral soil that is less than 3 inches in diameter is classified in one of seven groups from A-1 through A-7 on the basis of particle-size distribution, liquid limit, and plasticity index. Soils in group A-1 are coarse grained and low in content of fines (silt and clay). At the other extreme, soils in group A-7 are fine grained. Highly organic soils are classified in group A-8 on the basis of visual inspection.

If laboratory data are available, the A-1, A-2, and A-7 groups are further classified as A-1-a, A-1-b, A-2-4, A-2-5, A-2-6, A-2-7, A-7-5, or A-7-6. As an additional refinement, the suitability of a soil as subgrade material can be indicated by a group index number. Group index numbers range from 0 for the best subgrade material to 20 or higher for the poorest.

Percentage of rock fragments larger than 10 inches in diameter and 3 to 10 inches in diameter are indicated as a percentage of the total soil on a dry-weight basis. The percentages are estimates determined mainly by converting volume percentage in the field to weight percentage. Three values are provided to identify the expected Low (L), Representative Value (R), and High (H).

Percentage (of soil particles) passing designated sieves is the percentage of the soil fraction less than 3 inches in diameter based on an oven-dry weight. The sieves, numbers 4, 10, 40, and 200 (USA Standard Series), have openings of 4.76, 2.00, 0.420, and 0.074 millimeters, respectively. Estimates are based on laboratory tests of soils sampled in the survey area and in nearby areas and on estimates made in the field. Three values are provided to identify the expected Low (L), Representative Value (R), and High (H).

Liquid limit and plasticity index (Atterberg limits) indicate the plasticity characteristics of a soil. The estimates are based on test data from the survey area or from nearby areas and on field examination. Three values are provided to identify the expected Low (L), Representative Value (R), and High (H).

References:

American Association of State Highway and Transportation Officials (AASHTO). 2004. Standard specifications for transportation materials and methods of sampling and testing. 24th edition.

American Society for Testing and Materials (ASTM). 2005. Standard classification of soils for engineering purposes. ASTM Standard D2487-00.

Report---Engineering Properties

Absence of an entry indicates that the data were not estimated. The asterisk (*) denotes the representative texture; other possible textures follow the dash. The criteria for determining the hydrologic soil group for individual soil components is found in the National Engineering Handbook, Chapter 7 issued May 2007 (<http://directives.sc.egov.usda.gov/OpenNonWebContent.aspx?content=17757.wba>). Three values are provided to identify the expected Low (L), Representative Value (R), and High (H).

Engineering Properties---Washoe County, Nevada, South Part														
Map unit symbol and soil name	Pct. of map unit	Hydrologic group	Depth	USDA texture	Classification		Pct Fragments			Percentage passing sieve number---			Liquid limit	Plasticity index
					Unified	AASHTO	>10 inches	3-10 inches	4	10	40	200		
110---Jowec variant sandy loam, 4 to 8 percent slopes			in				L-R-H	L-R-H	L-R-H	L-R-H	L-R-H	L-R-H		
Jowec variant	85 D *		0-10	Sandy loam	SM	A-2	0-0-0	0-3-5	90-95-1 00	90-95-1 00	50-55- 60	15-25- 35	20-25 -31	NP
			10-20	Clay, sandy clay	CH, CL, SC	A-6, A-7	0-0-0	0-0-0	90-95-1 00	90-95-1 00	80-90-1 00	40-58- 75	35-45 -55	20-25-3 0
			20-66	Stratified sandy loam to clay loam	SC	A-2, A-6	0-0-0	0-0-0	90-95-1 00	90-95-1 00	55-68- 80	30-40- 50	20-28 -35	10-15-2 0
171---Indian Creek gravely sandy loam, 0 to 4 percent slopes														
Indian creek	85 D		0-3	Gravelly sandy loam	SC-SM, SC	A-1, A-2	0-0-0	0-3-5	60-70- 80	50-60- 70	35-45- 55	15-25- 35	20-23 -25	5-8-10
			3-20	Gravelly clay, clay, sandy clay	CH	A-7	0-0-0	0-3-5	80-90-1 00	60-75- 90	55-68- 80	50-65- 80	55-63 -70	30-38-4 5
			20-25	Cemented material	---	---	---	---	---	---	---	---	---	---
			25-60	Stratified extremely gravelly loamy coarse sand to gravelly sandy clay loam	GC-GM, GM, GW- GM, GP-GC	A-1, A-2	0-0-0	5-18-30	35-45- 55	30-43- 55	15-20- 25	5-10-15	20-25 -30	NP-5 -10

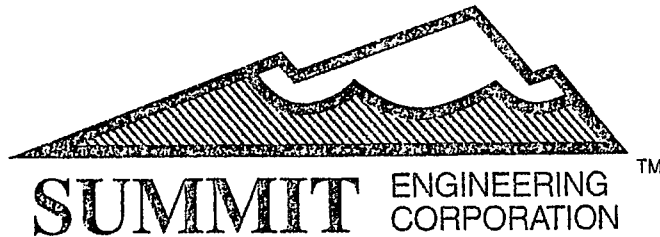
Engineering Properties—Washoe County, Nevada, South Part															
Map unit symbol and soil name	Pct. of map unit	Hydrologic group	Depth	USDA texture	Classification		Pct Fragments			Percentage passing sieve number—				Liquid limit	Plasticity index
					Unified	AASHTO	>10 inches	3-10 inches	4	10	40	200			
250—Cassiro gravelly sandy loam, 2 to 4 percent slopes	85	D	0-15	Gravelly sandy loam	SM	A-1, A-2	0-0-0	0-3-5	65-73-80	55-63-70	30-40-50	15-23-30	21-28-35	NP	L-R-H
			15-45	Very gravelly sandy clay, very gravelly clay	GC, SC	A-2	0-0-0	5-10-15	50-63-75	40-45-50	25-35-45	15-25-35	25-38-50	10-18-25	L-R-H
			45-60	Bedrock	—	—	—	—	—	—	—	—	—	—	L-R-H
251—Cassiro gravelly sandy loam, 4 to 8 percent slopes	85	D	0-15	Gravelly sandy loam	SM	A-1, A-2	0-0-0	0-3-5	65-73-80	55-63-70	30-40-50	15-23-30	21-28-35	NP	L-R-H
			15-45	Very gravelly sandy clay, very gravelly clay	GC, SC	A-2	0-0-0	5-10-15	50-63-75	40-45-50	25-35-45	15-25-35	25-38-50	10-18-25	L-R-H
			45-60	Bedrock	—	—	—	—	—	—	—	—	—	—	L-R-H
360—Pits	100		0-60	Variable	GP	A-1	—	—	—	—	—	—	0-7-14	—	L-R-H
482—Holbrook cobbly loamy sand, 2 to 8 percent slopes	85	A	0-10	Cobbly loamy sand	SM	A-1	0-0-0	15-25-30	75-85-90	50-70-70	25-33-40	10-15-20	18-24-30	NP	L-R-H
			10-60	Stratified stony sand to extremely gravelly loam	GM, SM	A-1, A-2	0-5-10	10-25-40	45-58-70	40-53-65	30-40-50	15-23-30	17-23-29	NP	L-R-H

Engineering Properties—Washoe County, Nevada, South Part															
Map unit symbol and soil name	Pct. of map unit	Hydrologic group	Depth	USDA texture	Classification		Pct Fragments		Percentage passing sieve number—				Liquid limit	Plasticity index	
					Unified	AASHTO	>10 inches	3-10 inches	4	10	40	200			
930—Old Camp stony sandy loam, 15 to 30 percent slopes			<i>In</i>												
Old camp	85	D	0-2	Stony sandy loam	SM	A-1	1-3-5	5-10-15	60-65-70	55-60-65	35-40-45	15-20-25	15-20-25	NP-3-5	L-R-H
			2-14	Very cobbly clay loam, extremely stony sandy clay loam, very stony clay loam	GC	A-2, A-6	15-15-25	20-25-30	40-48-55	35-43-50	30-38-45	25-33-40	30-35-40	15-20-25	L-R-H
971—Aladshi sandy loam, 2 to 4 percent slopes			14-24	Bedrock	—	—	—	—	—	—	—	—	—	—	—
Aladshi	85	C	0-7	Sandy loam	SM	A-2	0-0-0	0-3-5	85-93-100	80-88-95	50-58-65	25-30-35	20-23-25	NP-3-5	L-R-H
			7-34	Gravelly loam, sandy clay loam, sandy loam	CL, SC	A-6	0-0-0	0-3-5	80-88-95	70-80-90	55-65-75	45-53-60	25-30-35	10-15-20	L-R-H
			34-60	Stratified extremely gravelly loamy sand to very gravelly loam	SM	A-1, A-2	0-0-0	5-8-10	60-68-75	35-43-50	25-33-40	15-23-30	20-23-25	NP-3-5	L-R-H

Data Source Information

Soil Survey Area: Washoe County, Nevada, South Part
 Survey Area Data: Version 12, Sep 12, 2016





September 6, 2005

Job No. 21545

Mr. C. B. Maddox
5894 Sheep Drive
Carson City, Nevada 89701

RE: Updated Geotechnical Investigation – Cottonwood Creek
(Comstock Estates, Units 4-11, dated January 30, 1995)
Reno, Nevada

Dear Mr. Maddox:

Summit Engineering has completed a supplementary study to augment and to update the information provided in the previous soils report of this project site (Sheets 1 and 2). The supplemental study included review of the current grading plan to assure that depths of original exploration were adequate, updating the specifications to incorporate the *Standard Specifications for Public Works Construction (2004)*, replacing the 1992 date, and assessment of seismic risks using current standards.

The original field exploration test pits were located on and compared with the current grading plan. Depths of those test pits were determined to be adequate for the cuts and fills as planned.

For flexible pavement design, previous traffic information and subgrade resistance data were used to derive a section design (Appendix A). The resultant pavement section consisting of 4 inches asphaltic concrete on 6 inches aggregate base appears to be adequate for the proposed uses. All work shall comply with the *Standard Specifications for Public Works Construction (2004)*.

No soluble sulfate data were available. In order for the soils to be characterized as “negligible” per IBC 2003 standards (IBC 2003, Table 1904.3), the soils must contain less than 0.1% soluble sulfates. Supplemental sampling during grading is required in order to minimize adverse impacts to concrete improvements from soluble sulfate.

Three Quaternary faults have been mapped across the site by prior investigators (Sheet 3). These faults do not cut Holocene sediments, and have been classified previously as “inactive”. Additionally, a small, inactive, early Quaternary volcanic cone is situated approximately 0.5 mi north of the site. Literature reviewed included the prior geotechnical investigation by Summit Engineering and studies by the Nevada Bureau of Mines and Geology (Bell, 1984; Bonham and Bell, 1993; dePolo, 1996). The property, according to International Building Code 2003 maps (Sheets 4–6), may be subject to strong seismic acceleration, a minimum 0.65g ground acceleration, and therefore has a high probability for experiencing impact from a major seismic event. The effect of seismic shaking, therefore, is an important consideration.

There are no local codes that provide guidelines for the evaluation of seismic risk or surface rupture hazard associated with Quaternary (Holocene and Pleistocene) faults. The State of Nevada requires the use of seismic provisions set by the IBC, as well as adoptions of appropriate local standards (NRS 278.580.5). For the purposes of assessing seismic hazard and potential fault rupture hazard, standard engineering practice is to pursue the most diligent investigation of those faults deemed to be most likely to be active. Most

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1150 Lamoille Highway • Elko, Nevada 89801 • (775) 738-8058 FAX (775) 738-8267
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WTM16-003 - EXHIBIT E

geological consultants in Nevada follow the conventions established by the Nevada Earthquake Safety Council, whose guidelines are based on the Alquist-Priolo Act of 1972 in California. Per these guidelines, faults with evidence of movement in Holocene time (past 12,000 years) are considered "active". Those faults with evidence of displacement during Pleistocene time (12,000 to 1,800,000 years ago) would be considered "potentially active". Active faults are afforded a greater degree of study and analysis than those regarded as potentially active. Normally, any fault suspected of being active, as demonstrated by offset of the argillic (topsoil) horizon, poses a greater risk to development and requires a minimum setback of 50 feet for occupied structures. The mapped faults that cross the site have been previously classified as "inactive". The seismic hazard at the Comstock Estates site is probably no greater than other comparable locations in the area that are located at comparable distances to similarly identified faults.

Occupied structures have been built over and adjacent to inactive faults in the greater Reno area for decades, without significant harm to residents from temblors affecting the area. Building codes have evolved in recent years to provide adequate structural protection to residents for the level of tremors experienced to date. Summit Engineering Corporation does not recommend siting occupied structures across any faults, regardless of age.

The site has soil profiles that range from E, soft soil, to D, stiff to dense soil. The following table summarizes seismic design parameters for the 2003 International Building Code criteria for structural design of the project:

IBC SEISMIC DESIGN

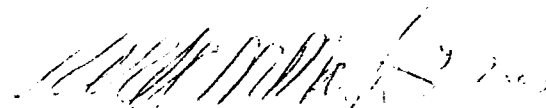
Site Class	E	D
Soil Profile Type	Soft Soil	Stiff Soil
Seismic Source Type	B	B
Soil Shear Wave Velocity (v_s)	<600 fps	600-1200
Standard penetration resistance (N)	<15 (est.)	15-50
Soil undrained shear strength (s_u)	<1000 psf	1000-2000
Site Coefficient (F_a) w/ short accel. (s_s)	0.9	1.0
Site Coefficient (F_v) w/ 1-sec. accel. (s_1)	2.4	1.5
Max. ground motion, 0.2-sec SA (S_s), %g	159.61	159.61
Max. ground motion, 1.0-sec SA (S_1), %g	64.07	64.07

Please note that the updated reference for all specifications in the initial report now are pursuant to *Standard Specifications for Public Works Construction (2004)*.

If you have any questions, please contact our office (775)-747-8550.

Sincerely,
 JOHN K. GLYNN/III
 SUMMIT ENGINEERING CORPORATION
 CIVIL
 EXP. 9-30-07

Jack Glynn, III, P.E. 8517
 Geotechnical Division Manager


 Walter Martin, P. Geo.
 Staff Geologist

LIMITATIONS

This report is prepared solely for the use of Summit Engineering's client. Any other entity wishing to utilize this report must obtain permission from them prior to doing so. Our services consist of professional opinions and recommendations made in accordance with generally accepted soil and foundation engineering principles and practices. The analyses and recommendations contained in this report are based on our site reconnaissance, the information derived from our field exploration and laboratory testing, our understanding of the proposed development, and the assumption that the soil conditions in the proposed building and grading areas do not deviate from the anticipated conditions.

Unanticipated variations in soil conditions could exist in unexplored areas on the site. If any soil or groundwater conditions are encountered at the site that are different from those discussed in this report, our firm should be immediately notified so that our recommendations can be modified to accommodate the situation. In addition, if the scope of the proposed construction, including proposed loads or structural location, changes from that described in this report, our firm should be notified.

Recommendations made in this report are based on the assumption that an adequate number of tests and inspections will be made during construction to verify compliance with these recommendations. Such tests and inspections should include, but not necessarily be limited to, the following:

- . Review of site construction plans for conformance with soils investigation.
- . Observation and testing during site preparation, grading, excavation and placement of fill.
- . Observation and testing of materials and placement of asphalt concrete and site concrete.
- . Foundation observation and review.
- . Consultation as may be required during construction.

The findings in this report are valid as of the present date; however, changes in the conditions of the property can occur with the passage of time, whether they are due to natural processes or to the works of man on this or adjacent lands. In addition, changes in applicable or appropriate standards occur, whether they result from legislation or from the broadening of knowledge. Accordingly, the findings in this report might be invalidated, wholly or partially, by changes outside of our control.

REFERENCES

Bell, John W., 1984, Quaternary Fault Map of Nevada, Reno Sheet: Nevada Bureau of Mines and Geology, Reno.

Bonham, Harold F. and Bell, John W., 1993, Steamboat Quadrangle Geologic Map, Urban Area Series Map 4Fg: Nevada Bureau of Mines and Geology, Reno, 1 sheet.

DePolo, Craig M., 1996, Local Quaternary Faults and Associated Potential Earthquakes in the Reno and Carson City Urban Areas, Nevada, Final Technical Report: National Earthquake Hazards Reduction Program, Nevada Bureau of Mines and Geology, Reno.

Federal Emergency Management Agency, Flood Insurance Rate Map Washoe County, Nevada and Incorporated Areas: Map #32031C3011E.

<http://eqhazmaps.usgs.gov>

International Conference of Building Officials, 2003, International Building Code, Volume 2.

Naval Facilities Engineering Command, 1986, Soil Mechanics – Design Manual 7.01.

Naval Facilities Engineering Command, 1986, Foundations and Earth Structures – Design Manual 7.02.

Regional Transportation Commission of Washoe County, 2004, Standard Specifications for Public Works Construction: Regional Transportation Commission of Washoe County, Washoe County, City of Sparks, City of Reno, Carson City, City of Yerington; Reno, Nevada.

SUPPLEMENTAL APPENDIX

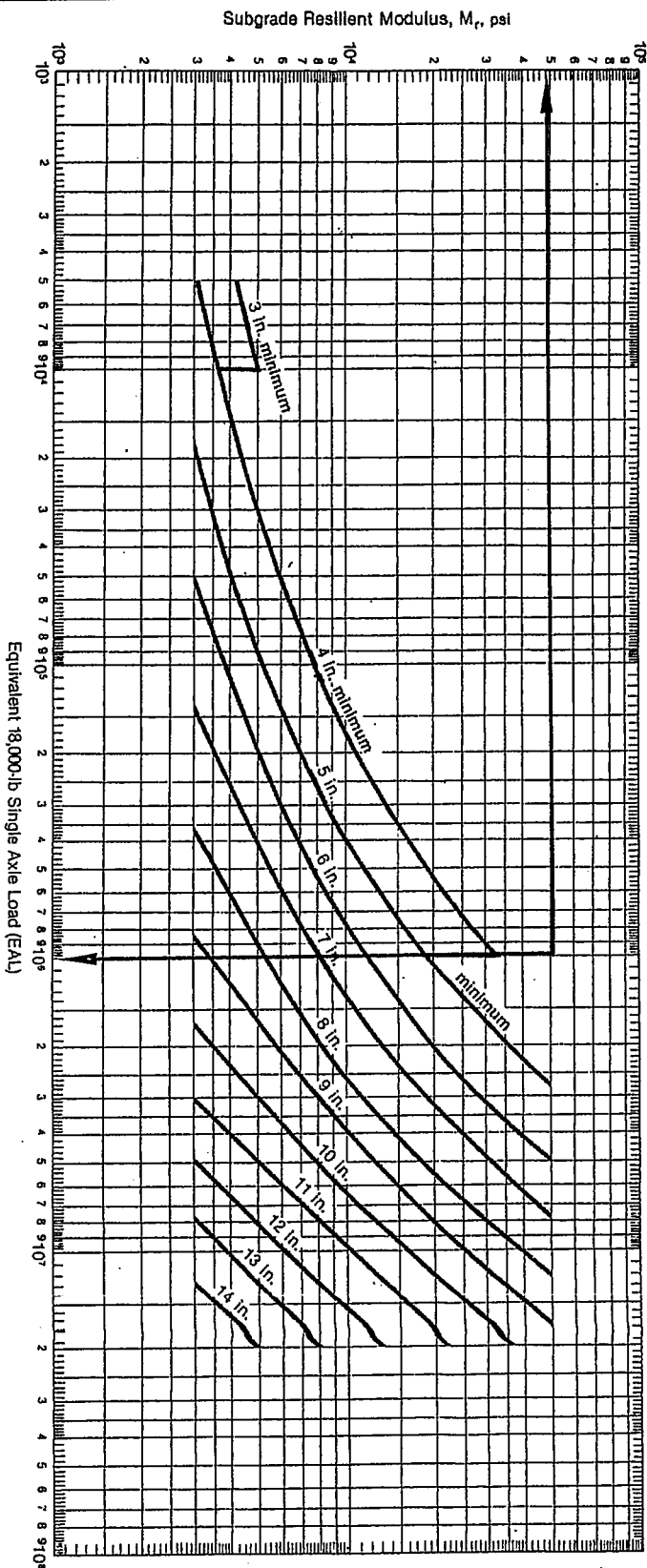
APPENDIX A

FLEXIBLE PAVEMENT DESIGN

Subgrade "R"-value = 87
 $M_R = 4.94 \times 10^4$

Untreated Aggregate Base 6.0 in. Thickness

MAAT 45°F

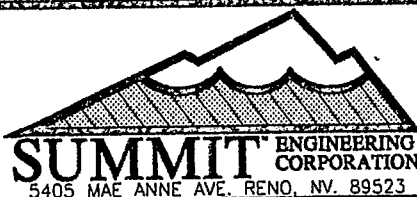


Design Chart A-23

Allowable ESALs = 10^6 for 4"AC on 6" Base per MS-1
 These amounts of ESALs are greater than
 expected for a local residential street.

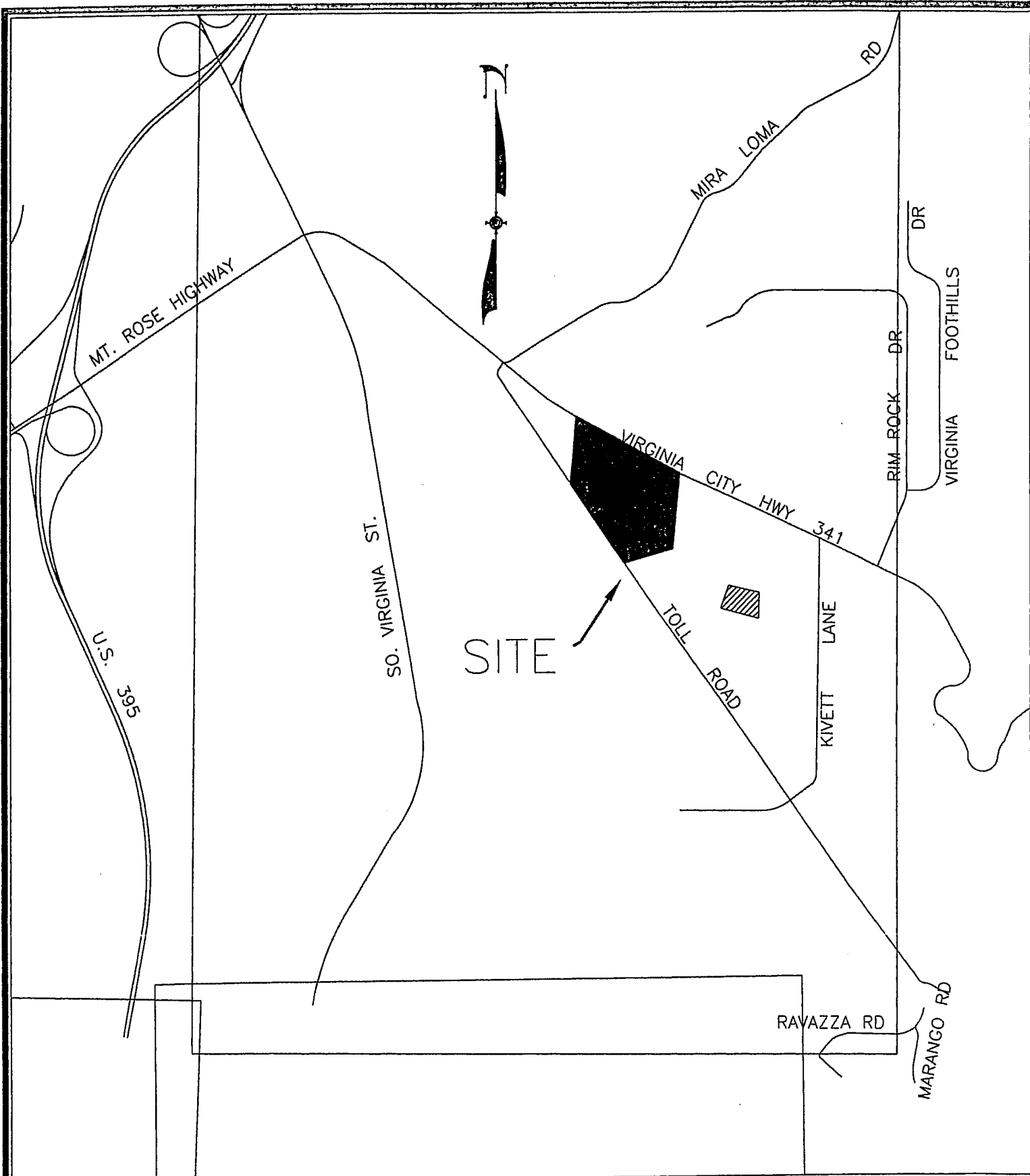
FLEXIBLE PAVEMENT
 COMSTOCK ESTATES
 RENO, NEVADA

JOB NO.: 21545
 APPR.: JKG
 BY: WMM
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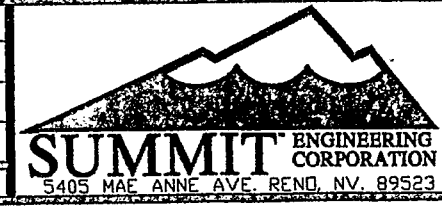
SHEET -
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 APP.A

SHEETS



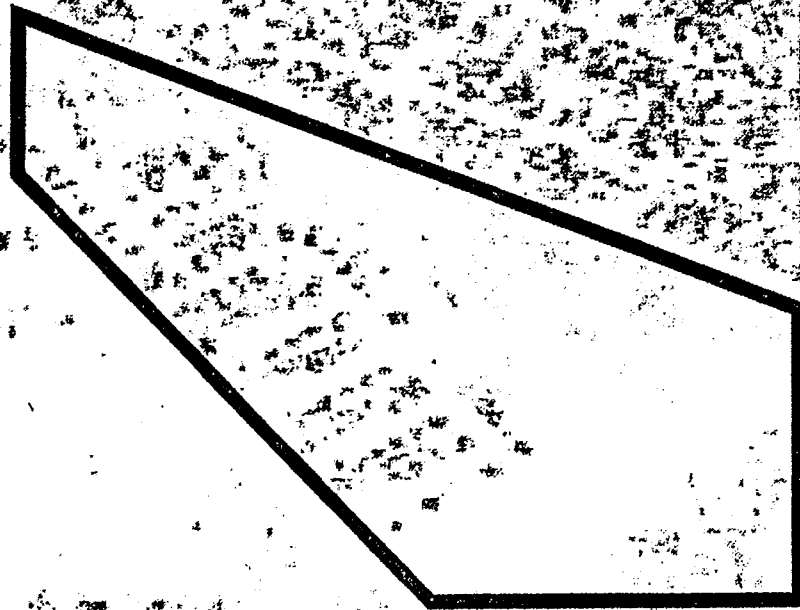
VICINITY MAP
 COMSTOCK ESTATES
 RENO, NEVADA

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 6

SITE



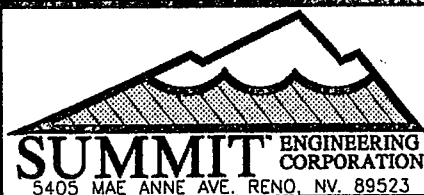
SITE MAP
COMSTOCK ESTATES
RENO, NEVADA

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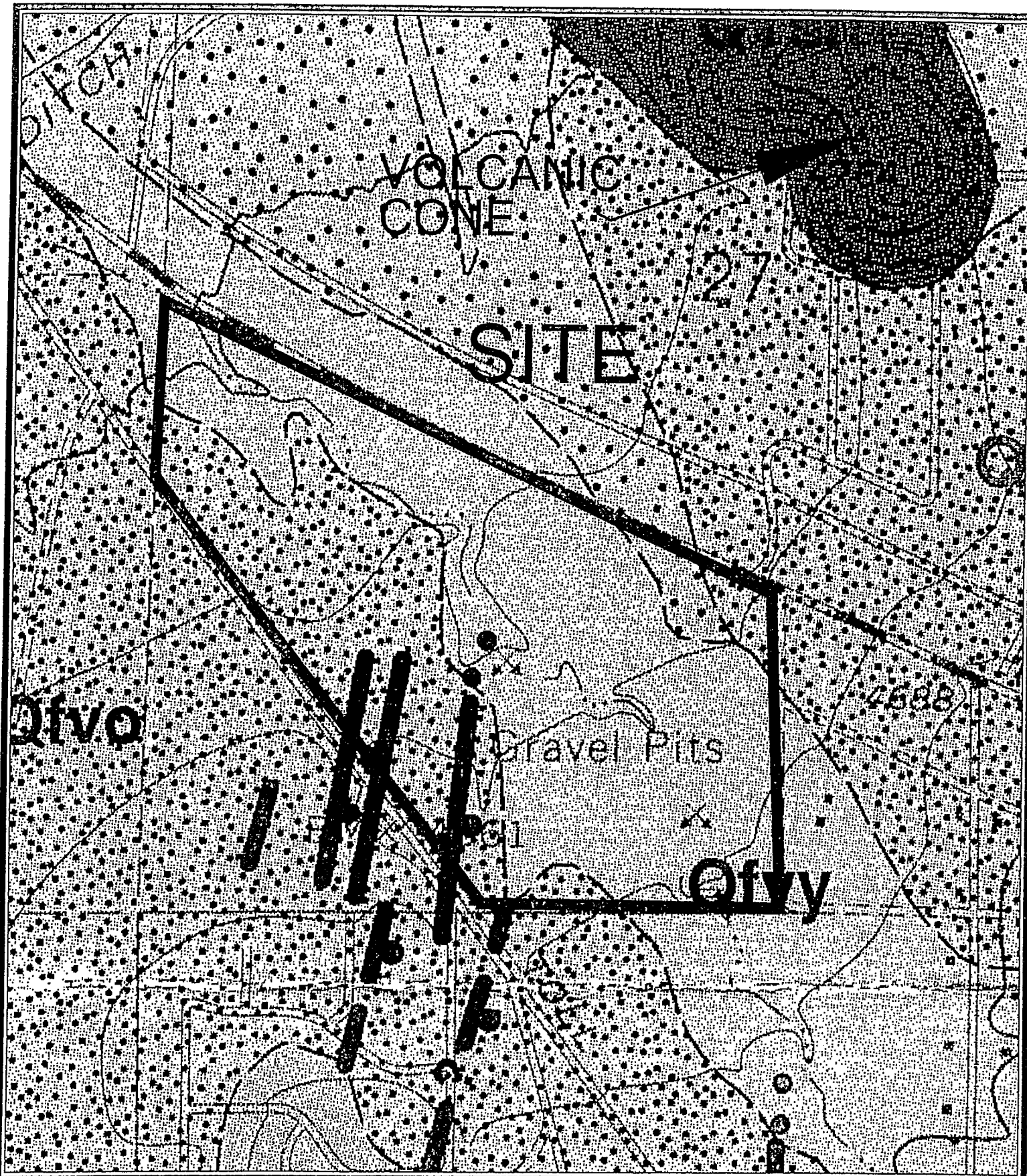
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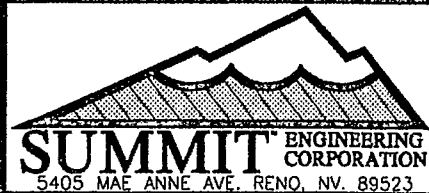
GEOLOGY MAP
 COMSTOCK ESTATES
 RENO, NEVADA

JOB NO.: 21545

APPR.: JKG

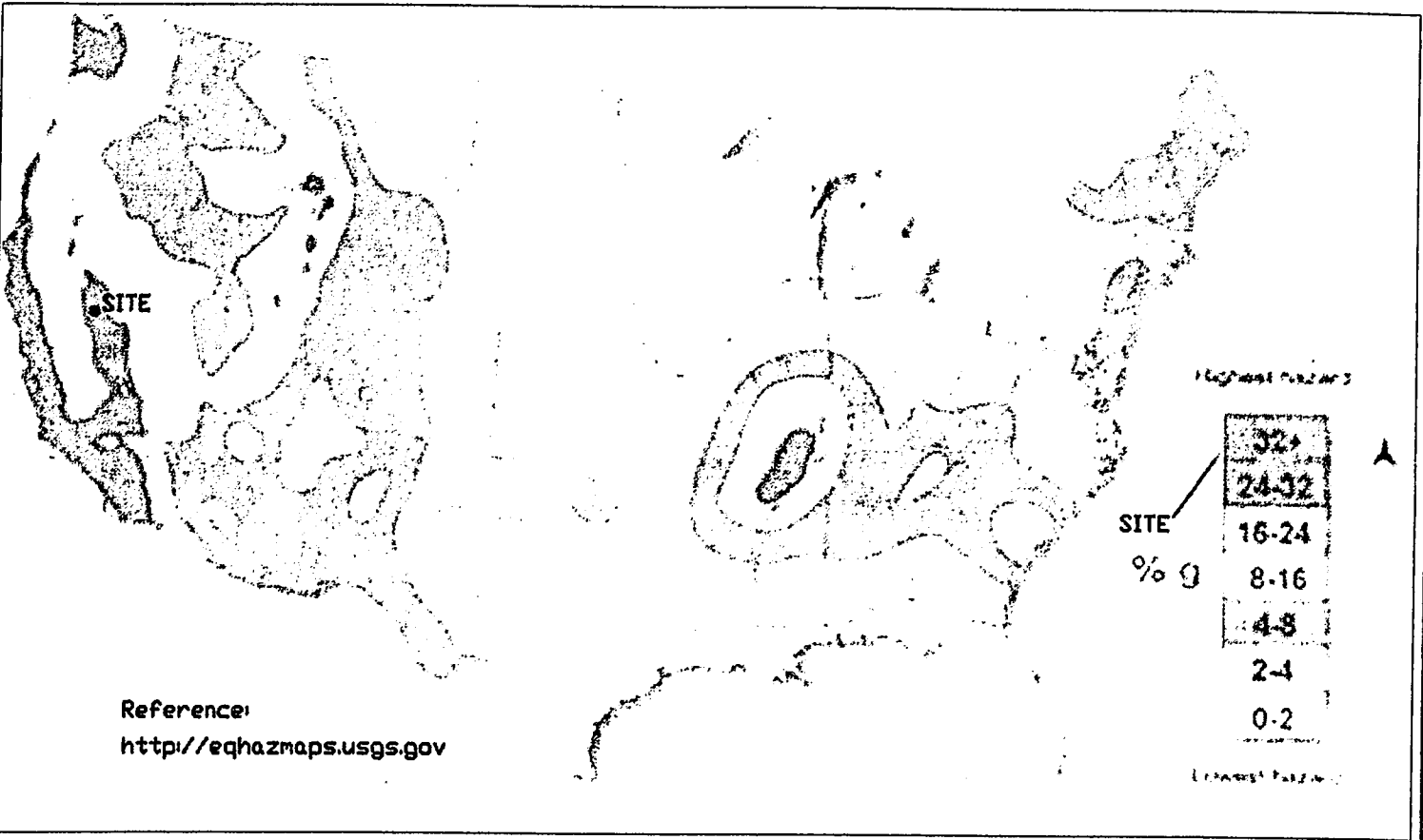
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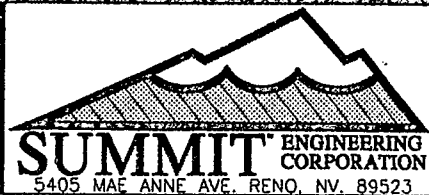
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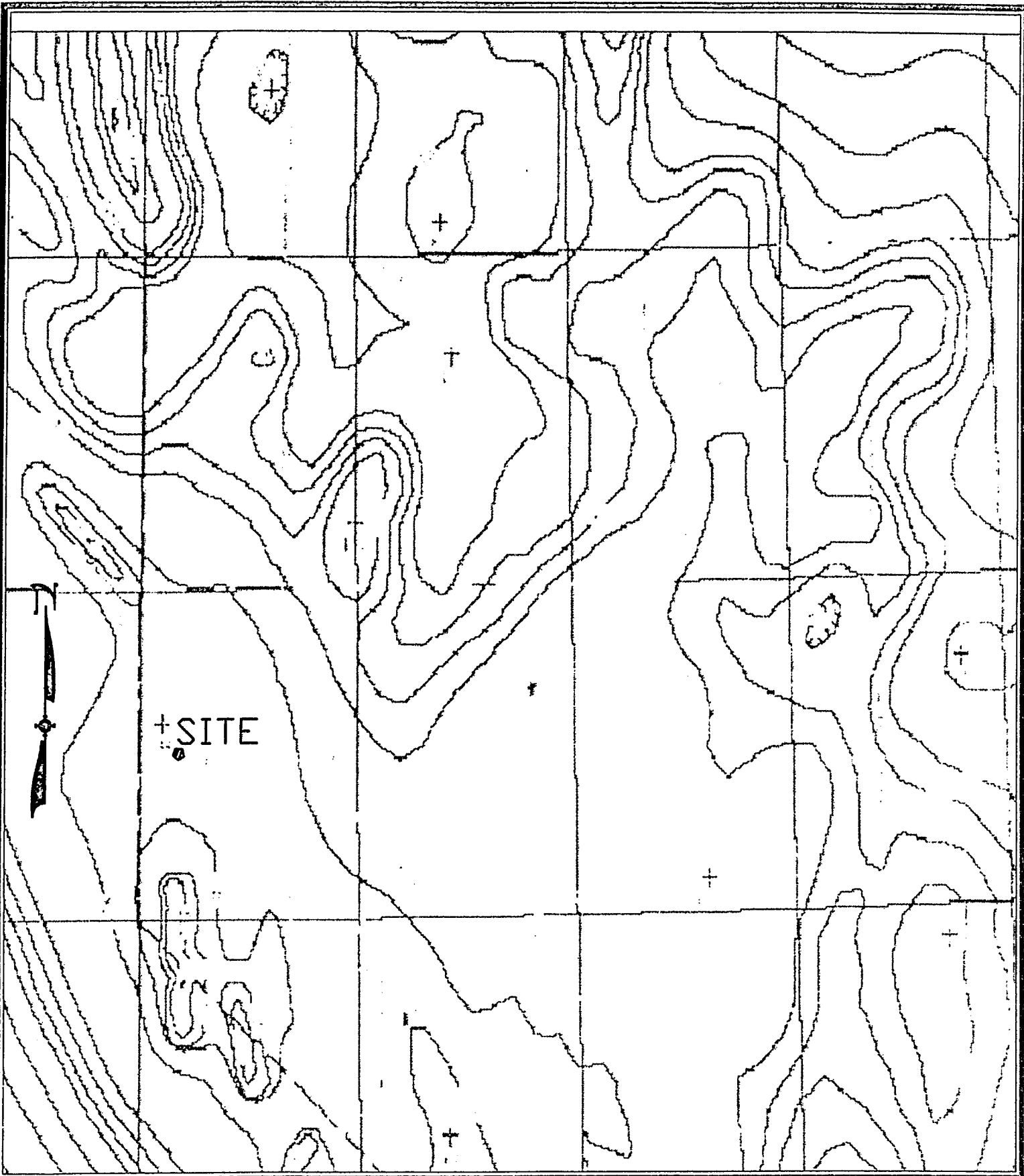


**SEISMIC HAZARD MAP
 COMSTOCK ESTATES
 RENO, NEVADA**

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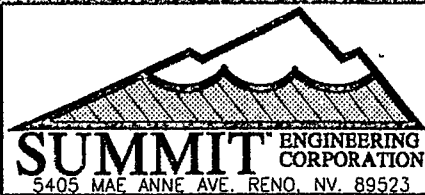


SHEET 4
 OF 6

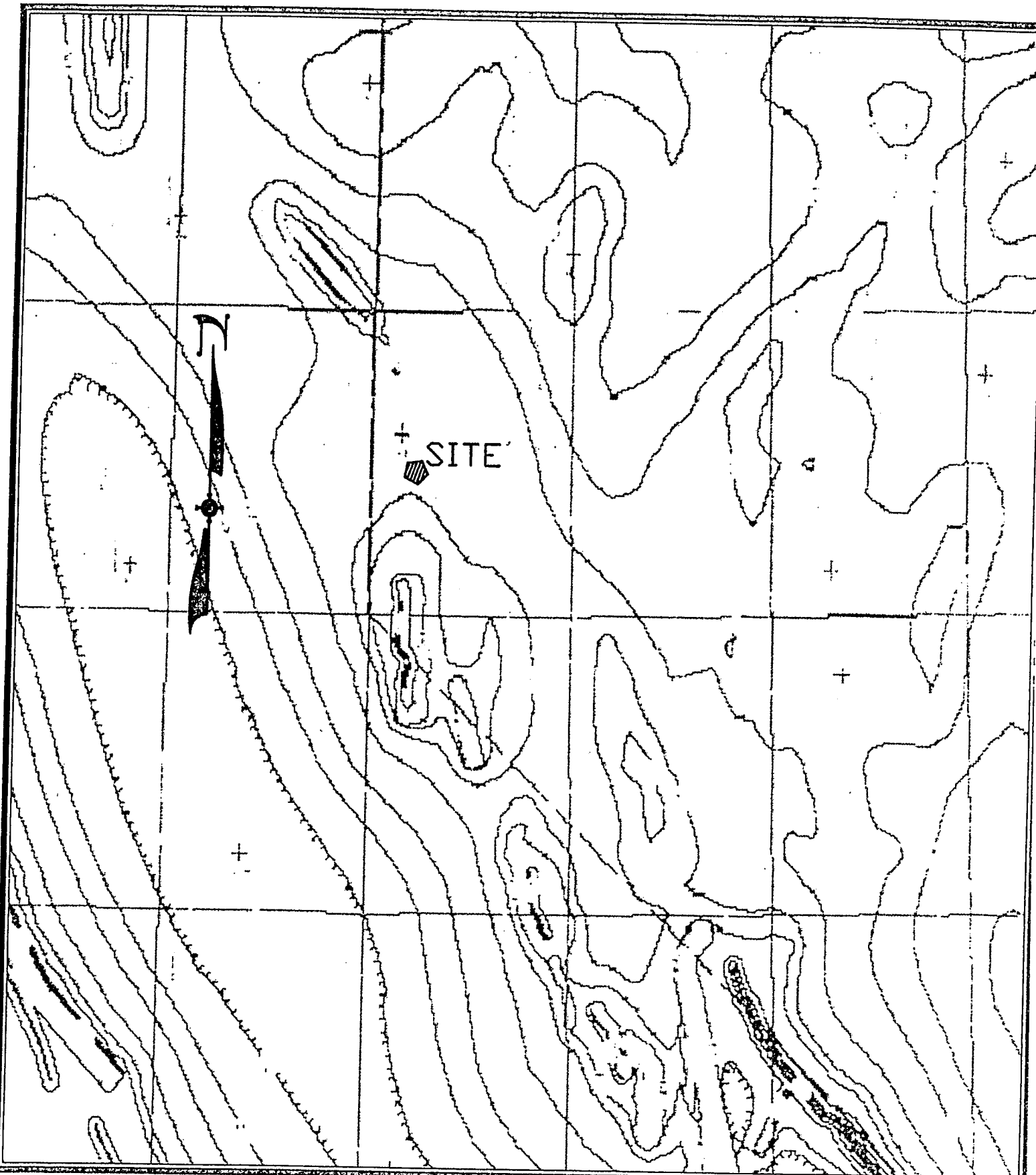


0.2 SEC a SEISMIC MAP
 COMSTOCK ESTATES
 RENO, NEVADA

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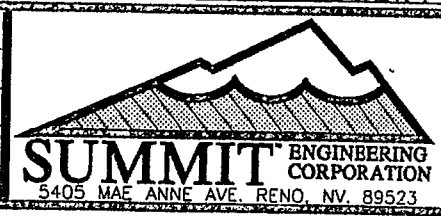


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1-SEC a SEISMIC MAP
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 RENO, NEVADA

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**GEOTECHNICAL INVESTIGATION
COMSTOCK ESTATES, UNITS 4 - 11
WASHOE COUNTY, NEVADA**

**File No. 21545
January 30, 1995**

Prepared For:

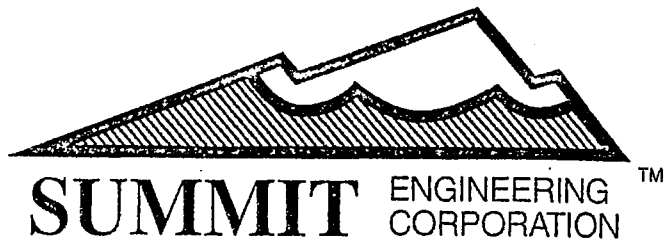
**C. B. Maddox
5894 Sheep Drive
Carson City, Nevada 89701**

Prepared By:

**Summit Engineering Corporation
5405 Mae Anne Avenue
Reno, Nevada 89523**

**Linda A. Hansen
Staff Geotechnical Designer
Geotechnical Division**

**Jack K. Glynn, III, P.E.
Project Manager
Geotechnical Division**



October 26, 2003

Job No. 21545

Mr. Ben Maddox
C.B. Maddox
5894 Sheep Drive
Carson City, Nevada 89701

RE: Geotechnical Investigation
Comstock Estates, Units 4-11

Dear Mr. Maddox:

It is our understanding that the tentative map for the above mentioned project is being submitted to the County for approval. For this purpose, the Geotechnical Investigation Report No. 21545 is applicable. However, once a final grading plan is completed and approved, this will need to be reviewed to insure the test pits were excavated to depths of the "cuts". If it is determined that the "cuts" are deeper than the test pit excavations, additional test pits will be required.

If you have any further questions, or need any additional information, please do not hesitate to contact our office.

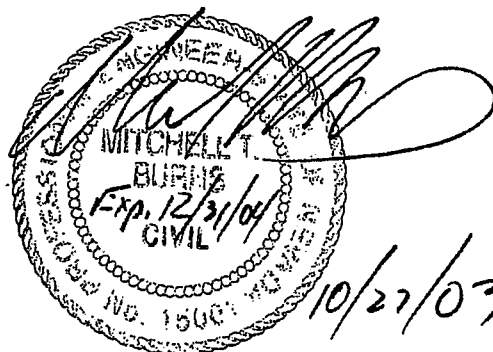
Sincerely,

SUMMIT ENGINEERING CORPORATION

Mitch Burns, P.E.
Project Engineer

MB:bjg

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WTM16-003 - EXHIBIT E

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GEOTECHNICAL INVESTIGATION
COMSTOCK ESTATES, UNITS 4-11
WASHOE COUNTY, NEVADA

I. INTRODUCTION

A. **Project Description**

This report presents the results of a geotechnical investigation for the proposed Comstock Estates Units 4-11 development in Washoe County, Nevada. This development will include 156 residential homes. The site is located in Washoe County in Section 27 of Township 18 North, Range 20 East. This area lies south of State Route 341, and north and east of Toll Road. The site encompasses a total of approximately 84.6 +/- acres, and contains a proposed 156 units. Plate 1 provides a vicinity map and a Plate 2 provides a site plan.

This investigation provides site specific soil design criteria for the proposed single family residences. The recommendations of this report are made for structures that will have building wall loads of less than 2000 pounds per lineal foot and maximum column loads of 15 Kips. If any structures are to be constructed that will have heavier loads than those described or will have special foundation considerations not addressed in this report, the soil design criteria of this report should be reviewed by a geotechnical engineer.

B. **Purpose and Scope**

The purpose of this investigation was to determine subsurface soil conditions and to provide geotechnical design criteria based upon our findings for the proposed project. The scope of this

investigation included surface reconnaissance, subsurface exploration, analysis of field and laboratory data, research of pertinent geologic literature, and report preparation. This report provides conclusions and recommendations concerning:

- . General subsurface conditions and geology
- . Site preparation and earthwork
- . Engineering properties of the soils which will influence the design of the future structures, including:
 - . Bearing Capacities
 - . Settlement potential
 - . Lateral earth pressures
- . Asphalt concrete and concrete pavement
- . Seismic design criteria

C. Field Exploration and Laboratory Testing

Summit Engineering Corporation conducted the subsurface investigation by excavating a total of 16 test pits to a maximum depth of 11 feet. Geotechnical engineers logged the soils and subsurface conditions encountered. Plate 1 shows the vicinity map and Plate 2 presents the site map and the locations of the test pits. Plates 3 through 18 show the vertical profiles of the soils encountered. Plate 19 provides a key to the logs and a copy of the Unified Soil Classification System which was used to identify the site soils.

Representative bulk samples were obtained for laboratory testing. The laboratory testing program consisted of : 1) gradations, 2) moisture contents, and 3) Atterburg limits tests to confirm field soil classifications; and an 4) R-Value to evaluate the subgrade strength for pavement design. Results of the laboratory tests are shown on the test pit logs and are presented graphically on Plates 20 through 22.

II. DISCUSSION

A. Site Description

The subject property is currently undeveloped land covered with grasses and sage brush. The site is found north and east of Toll Road and south of State Route 341 (Geiger Grade). The highest elevations are found in the northeast at approximately 5152 feet above mean sea level. Single family residences are found to the south, west, and east.

B. General Geology

According to the Steamboat Quadrangle Geologic Map by Harold F. Bonham Jr. and John W. Bell (1993), the site is underlain by the alluvial-fan deposits of the Virginia Range, which is divided into Q_{fy} , Q_{fi} , and Q_{fo} . These deposits are described as "Composed dominantly of subangular to subrounded clasts of gray to dark-gray andesite with varying proportions of white to red altered andesite clasts depending upon source areal; poorly to moderately stratified; poorly to very poorly sorted. From oldest to youngest, units comprise a descending set of successively inset and nested fans and stream terraces typically having little vertical separation. Similar geomorphic characteristics make differentiation very difficult without the use of pedologic data. Q_{fy} : light-brown to brown muddy, sandy, pebble gravel; locally cobble to boulder gravel. Soils have A-C to cambic profiles. Stippled where deposit is dominantly a pebble sand derived from reworking of older Q_e deposits. Where bouldery, commonly displays bar-and-channel microtopography. Q_{fi} : light-brown to brown muddy, sandy, cobble to boulder gravel; maximum boulder diameter of 1 m. Typically contains a well-developed argillic soil about 30 cm thick. Q_{fo} : light-brown to brown muddy, sandy, cobble to boulder gravel; maximum boulder diameter 1 m. Surface clasts are strongly weathered. Soils contain a well-developed argillic horizon ranging from 0.5 to 1 meter thick, locally underlain by a carbonate- and silica-cemented duripan as much as 1 m thick. East of Steamboat Creek in the Steamboat Springs area, unit forms a predominant terrace which is stratigraphically equivalent to Q_{dm} ." From an engineering standpoint, the native site soils should provide adequate bearing support for the proposed structures and site improvements.

C. Regional Seismicity

The subject property, as well as the entirety of the Reno area, lies within the Uniform Building Code Seismic Zone 3. This zone has a high probability for a moderate seismic event. Structures in this area may be subject to damage such as that occurring during an average event equivalent to a Modified Mercalli Intensity of VII. This size event approximately correlates to a Richter Magnitude of 6.0. Plate 23 shows a 1991 UBC Seismic Zone Map for Nevada.

According to the Steamboat Quadrangle Geologic Map by Harold F. Bonham, Jr. and John W. Bell (1993), the three Quaternary faults are found on southern portion of the site, trending from approximately the north to the south. These faults are found in Pleistocene-aged deposits, and do not pass through the Holocene deposits; therefore, the age of these faults can be approximated as Pleistocene. According to the Quaternary Fault Map of Nevada - Reno Sheet, by John W. Bell (1984), these faults have been approximately dated as experiencing last movement in the Pleistocene or greater than 100,000 thousand years ago; consequently, it can be considered inactive. An active fault is one that has experienced movement during the Holocene or in the past 12,000 years. The nearest Holocene fault is located approximately 4 miles to the west along the Carson Range front.

D. Subsurface Materials and Conditions

The subsurface investigation encountered the Alluvial-fan deposits of the Virginia Range (Q_{fvy} , Q_{fvi} , and Q_{fvo}) which is consistent with the general geology of the area. Tests pits 3, 4, 5, 6, 7, and 13 encountered a surface layer (up to 2.5 feet below ground surface) of medium to high plasticity sandy clays. Test pits 8, 9, 15, and 16 encountered a surface layer of sands and silty sands. All test pits contained a sandy cobble to boulder gravel, from the surface or below the aforementioned surface layers, to the total depth of the pits. Please refer to Plates 3 through 18 for more details.

E. Ground Water and Surface Hydrology

Groundwater was not encountered in any of the test pits made on the site. The depth of the test pits extended to a maximum depth of 11 feet below ground surface. Groundwater is not expected to be a problem on the site. The portion of the site along Bailey Canyon Creek has been delineated

by the Federal Emergency Management Agency (FEMA) as being located in Flood Hazard Zone A3. This zone is described as "Areas of 100-year flood; base flood elevations and flood hazard factors determined." The portion of the site adjacent to Bailey Canyon Creek has been delineated by the FEMA as being in located in Flood Hazard Zone B. This zone is described as "areas between limits of the 100-year flood and 500-year flood; or certain areas subject to 100-year flooding with average depths less than one foot or where the contributing drainage area is less than one square mile; or areas protected by levees from the base flood".

F. Liquefaction Potential

During earthquakes the shaking of the ground may cause a loss of strength or stiffness that results in settlement of buildings, landslides, structural failures, and other hazards. The process leading to such loss of strength or stiffness is called liquefaction. It is a phenomenon associated primarily, but not exclusively, with saturated cohesionless soils.

Liquefaction is brought about by an increase in pore water pressure during dynamic loading of an earthquake. When the increased pore water pressure reaches the value of the overburden stress on the soil, the supporting strength of the soil is reduced to near zero. The liquefied soils have little or no bearing capacity, and can densify causing settlement of foundations or differential settlement of floor slabs.

Loose granular soils without cohesive fines are most susceptible to the rapid buildup of pore pressure. Other factors affecting the degree of pore pressure build up include: the amplitude of the oscillatory straining; the past history of stressing; the size, shape, and gradation of particles; the confining pressure acting on the soil; the age of the deposit; the fabric of the soil; the depth to groundwater; and the shear strength of the soil.

Very limited amounts of potentially liquefiable soils were encountered on site. These soils (clean sands) were mainly located in limited surficial deposits. Due to the medium dense to dense nature of soils, and the depth to groundwater being deep, we believe the potential for damage to any structure due to liquefaction to be very minimal.

III. CONCLUSIONS AND RECOMMENDATIONS

From a geotechnical engineering standpoint, it is our opinion that the subject site is suitable for the construction of future residential development provided that the recommendations contained in this report, and in the attached earthwork specifications, are incorporated into the project design and construction. The following sections present conclusions and recommendations concerning the proposed project.

A. Foundation Considerations

Analysis obtained from field and laboratory testing indicates unsaturated native soils can support up to 3000 pounds per square foot for dead plus long term live loads, on spread type footings with less than 1 inch of total settlement and less than 1/2 inch of differential settlement across the length of the structures. This assumes that all moderately to highly plastic clays, which were found down to 2.5 feet in depth (possibly deeper in unexplored areas), will require complete removal for all footings and flatwork and replaced with structural fill placed in accordance with Appendix A.

B. Asphaltic Concrete Design

The given asphalt pavement section assumes that the sandy clays will be removed and the native sandy gravels will be used beneath roadways and parking lot/entrances areas. It assumes that any existing fill, loose organic topsoil or near surface clayey soils are removed, and that native soil is scarified and recompacted to a depth of six inches. Any fill placed in overexcavated areas should meet the requirements for structural fill. If plastic soil is encountered, overexcavation and replacement of this soil with structural fill is recommended to a depth of 2 feet, compacted in accordance with recommendations in Appendix A of this report. The pavement section provided assumes a 20-year average design period. Subgrade material shall be compacted to 90 percent, and aggregate base material shall be compacted to 95 percent relative compaction (ASTM D-1557).

The pavement section designed was based on an average of 10 trip-ends per unit per day giving a AADT (average daily traffic) of 1560 vehicles per day. The calculated equivalent EAL (equivalent axial load) is 1.43×10^5 for the design life of 20 years. An R-value of 87 was used, which was

obtained from the laboratory analysis presented on Plate 23 . This R-value is equivalent to a resilient modulus (M_r) of 4.94×10^4 psi. The following sections are recommended (see Appendix B):

RECOMMENDED PAVEMENT SECTION THICKNESS

LOCATION	ASPHALT	TYPE II BASE
Public Streets	4"	6"

All public streets dedicated to the City of Reno have a required minimum of 4 inches of asphaltic concrete on 6 inches of base material.

* See Appendix B for calculations.

C. Native Soils

The native alluvial soils may be re-used as structural fill, after screening, provided they are tested and meet the requirements stated in Appendix A for structural fill. From a geotechnical engineering standpoint, it is our opinion that the subject site is suitable for the construction of the proposed development provided that the recommendations contained in this report, and in the attached earthwork specifications, are incorporated into the project design and construction.

LIMITATIONS

Our services consist of professional opinions and recommendations made in accordance with generally accepted soil and foundation engineering principles and practices. The analyses and recommendations contained in this report are based on our site reconnaissance, the information derived from our field exploration and laboratory testing, our understanding of the proposed development, and the assumption that the soil conditions in the proposed building and grading areas do not deviate from the anticipated conditions.

Unanticipated variations in soil conditions could exist in unexplored areas on the site. If any soil or groundwater conditions are encountered at the site which are different from those discussed in this report, our firm should be immediately notified so that our recommendations can be modified to accommodate the situation. In addition, if the scope of the proposed construction, including proposed loads or structural location, changes from that described in this report, our firm should be notified.

Recommendations made in this report are based on the assumption that an adequate number of tests and inspections will be made during construction to verify compliance with these recommendations. Such tests and inspections should include, but not necessarily be limited to, the following:

- . Review of site construction plans for conformance with soils investigation.
- . Observation and testing during site preparation, grading, excavation and placement of fill.
- . Observation and testing of materials and placement of asphalt concrete and site concrete.
- . Foundation observation and review.
- . Consultation as may be required during construction.

The findings in this report are valid as of the present date; however, changes in the conditions of the property can occur with the passage of time, whether they be due to natural processes or to the works of man on this or adjacent lands. In addition, changes in applicable or appropriate standards occur, whether they result from legislation or from the broadening of knowledge. Accordingly, the findings in this report might be invalidated, wholly or partially, by changes outside of our control.

APPENDIX A
SPECIFICATIONS FOR
SITE PREPARATION, EXCAVATION, RECOMPACTION
STRUCTURAL FILL, and SUBGRADE PREPARATION

1.0 GENERAL

- 1.1 Standard Specifications - Where referred to in these specifications, "Standard Specifications" shall meet the Standard Specifications for Public Works Construction sponsored and distributed by Washoe County, City of Reno, City of Sparks, et. al. (1992).
- 1.2 Scope - All work shall be done in accordance with the standard Specifications except as may be modified by the specifications outlined below. The work done under these specifications shall include clearing, stripping, removal of unsuitable material, excavation and preparation of natural soil, placement and compaction of on-site and/or imported fill material, or as specifically referred to in the plans or specifications.
- 1.3 Geotechnical Engineer - When used herein, Geotechnical Engineer shall mean the engineer or a representative under the engineer's supervision. The work covered by these specifications shall be inspected by a Geotechnical Engineer, who shall be retained by the Owner. The Geotechnical Engineer will be present during the site preparation and grading to inspect the work and to perform the tests necessary to evaluate material quality and compaction. The Geotechnical Engineer shall submit a report to the Owner, including a tabulation of all tests performed.
- 1.4 Soils Report - A "Soil Investigation" report, prepared by Summit Engineering Corporation, is available for review and may be used as a reference to the surface and subsurface soil and groundwater conditions on this project. The Contractor shall make his own interpretation with regards to the methods and equipment necessary to perform the excavations.

- 1.5 Percent Compaction - Where referred to herein, percent compaction shall mean the in-place dry unit weight of soil expressed as a percentage of the maximum dry unit weight of the same material, as determined by ASTM D-1557, compaction test procedure. Optimum moisture content is the moisture content corresponding to the maximum dry density determined by the ASTM test method D-1557.

2.0 SITE PREPARATION AND EARTHWORK

- 2.1 All earthwork and site preparation should be performed in accordance with the requirements of this report and attached specifications, and the "Standard Specifications For Public Works Construction" sponsored and distributed by Washoe County, City of Sparks, City of Reno, et.al. (1992).
- 2.2 Clearing - Areas to be graded shall be cleared of existing brush and debris. These materials shall be removed from the site by the Contractor.
- 2.3 Stripping - Surface soils containing roots and organic matter shall be stripped from areas to be graded and stockpiled or discarded as specified by the plans or specifications. In general, the depth of stripping of the topsoil will be approximately 6 to 8 inches. Where required, deeper stripping, to remove weak soils or accumulations of organic matter, shall be performed when determined by the Geotechnical Engineer. Strippings shall be removed from the site or stockpiled at a location specified by the plans.
- 2.4 Dust Control - The contractor shall prevent and maintain control of all dust generated during construction in compliance with all federal, state, county, and city regulations. The project specifications should include an indemnification by the contractor of the engineer and owner for all dust generated during the entire construction period.
- 2.5 Materials - All material not suitable for use as structural fill, shall be removed from the site by the Contractor, or placed in non-structural fill areas. The Geotechnical Engineer shall determine the suitability of material for reuse as structural fill.

- 2.6 Ground Surface - The ground surface exposed by stripping and/or excavation shall be scarified to a depth of 6 inches, moisture conditioned by aerating or adding water, and compacted to 90 percent relative compaction (ASTM D 1557), unless otherwise specified. Compaction of the ground surface shall be approved by the Geotechnical Engineer.
- 2.7 Backfill of test pits - Our exploration pits and previous pits were backfilled without mechanical compaction. In building and flatwork areas, backfill in the pits should be removed and replaced with approved, compacted materials.

3.0 FILL MATERIAL

- 3.1 Fill material shall be free of perishable, organic material and rocks over six inches in largest diameter. Rock used in the fill shall be placed in such a manner that no voids are present, either between or around the rock, after compacting the layer.
- 3.2 Structural Fill - Material shall consist of suitable non-expansive soils having a liquid limit less than 40, and a plasticity index less than 12. The gradation requirements shall be as follows:

<u>Sieve Sizes</u>	<u>Percentage Passing (by weight)</u>
4"	100
3/4"	70 - 100
40	15 - 70
#200	5 - 25

Materials not meeting the above requirements may be suitable for use as structural fill at the discretion of the Geotechnical Engineer. Samples of imported fill proposed for use as structural fill shall be submitted to the Geotechnical Engineer and approved before it is delivered to the site.

3.3 Rock Fill - Fill material containing over 25 percent (by volume) of rock larger than 6 inches in greatest dimension is defined as rock fill. Rock fill located three feet or more below finished grade may be constructed in loose lifts up to the maximum size of rock in the material but not exceeding two feet in thickness. The interstices around the rock in each rock fill lift shall be filled with granular material and compacted to the satisfaction of the Geotechnical Engineer. Rock larger than 12 inches in greatest dimension shall not be allowed in the rock fill without approval of the Geotechnical Engineer. Rock larger than 6 inches shall not be placed in the upper 1 foot of structural fill.

4.0 EARTHWORK AND FILL PLACEMENT

- 4.1 Placement - Fill material shall be placed in layers that shall not exceed 8 inches of compacted thickness, unless otherwise approved by the Geotechnical Engineer. Each layer shall be evenly spread and moisture conditioned as necessary. Unless otherwise specified, each layer of earth fill shall be compacted to 90 percent relative compaction. Compaction shall be approved by the Geotechnical Engineer. Rock fill shall be placed in accordance with the appropriate sections of the Standard Specifications. Rock fill placement shall be verified by the Geotechnical Engineer. Full time inspection is required unless otherwise approved.
- 4.2 Keyways - Where the fill extends onto native slopes with gradients greater than 5:1, the fill shall be keyed into the native soils. The keys will have a minimum width of 8 feet and constructed with a minimum 5% slope into the hillside.
- 4.3 Compaction Equipment - The Contractor shall provide and use equipment of a type and weight suitable for the conditions encountered in the field. The equipment shall be capable of obtaining the required percent of compaction in all areas including those that are inaccessible to ordinary rolling equipment.
- 4.4 Reworking - When, in the judgement of the Geotechnical Engineer, sufficient compaction effort has not been used, or where the field density tests indicate that the

required compaction or moisture content has not been obtained, fill materials shall be reworked and compacted as needed to obtain the required density and moisture content. This reworking shall be accomplished prior to the placement of additional fill.

- 4.5 Unstable Areas - If pumping or other indications of instability are noted, fill materials shall be evaluated by the Geotechnical Engineer and be left to dry; reworked; or removed, replaced, and compacted as needed to obtain the required density and moisture content. This work shall be accomplished prior to the placement of additional fill.

5.0 EXCAVATION AND SLOPE REQUIREMENTS

- 5.1 Finished cut and fill slopes should not exceed ratios of two horizontal to one vertical. Slopes steeper than three horizontal to one vertical or more than ten feet in height should be protected from erosion using either rip-rap, vegetation, or a similar designated and acceptable means meeting the City of Reno or Washoe County standards.
- 5.2 Temporary, unsupported construction slopes less than ten feet in height may stand at a slope as steep as 1:1 (H:V) provided that the length of the unsupported slope does not exceed twenty feet. These temporary slopes should not remain unsupported for extended periods of time.

6.0 FOUNDATIONS AND FOOTING DESIGN

- 6.1 Spread type continuous and column footings should be designed to impose a maximum net dead plus long term live load of 3000 pounds per square foot. Net bearing pressures up to one-third in excess of the given bearing value are permitted for transient live loads from wind and earthquake. Footing widths should be designed based upon these bearing pressures and design loads; however, in no case should they

be less than 1 foot wide for single story structures and 15 inches wide for two story structures. Isolated interior footings should also be a minimum of 15 inches wide.

- 6.2 Exterior footings should be embedded a minimum of 24 inches below the lowest adjacent final compacted subgrade to provide adequate frost protection and confinement. Isolated interior footings, where subject to any lateral loads, should be founded at least one foot below interior grade.
- 6.3 Passive soil resistance to lateral footing pressures may be calculated using an equivalent fluid weight of 400 pounds per cubic foot not exceeding 4000 pounds per cubic foot and a base coefficient of friction of 0.35. Active soil pressure may be calculated by using an equivalent fluid weight of 35 pounds per cubic foot.
- 6.4 Backfill placed around the footing excavations or formed footings should be compacted to at least 90 percent relative compaction.
- 6.5 All footing excavations should be clear of loose material prior to placement of concrete. All soil or fill material in the bottom of the footing excavation should be recompacted to at least 90 percent compaction.

7.0 UTILITY TRENCH BACKFILL

- 7.1 Material - Bedding material shall consist of clean, granular material having a sand equivalent of not less than 30, and 100 percent passing the 3/8 inch sieve. Backfill in the remainder of the trench shall consist of material meeting the requirements of structural fill.
- 7.2 Placement and Compaction - Bedding material shall first be placed so that the pipe is supported for the full length of the barrel with full bearing on the bottom segment of the pipe equal to a minimum of 0.4 times the outside diameter of the barrel. Bedding shall also extend to one foot above the top of the pipe. Pipe bedding within 6 inches of the pipe shall be placed in thin layers not exceeding 8 inches in loose

thickness, conditioned to the proper moisture content for compaction, and compacted to at least 90 percent compaction. All other trench backfill shall be placed in thin layers not exceeding 8 inches in loose thickness, conditioned to the proper moisture content, and compacted as required for adjacent fill, or if not specified, to at least 90 percent compaction in areas under structures, utilities, roadways, parking areas, and concrete flatwork. The top 6" under roadways and parking shall be compacted to 95%. In undeveloped areas trench backfill may be compacted to 85 percent relative compaction.

- 7.3 Drain Rock - Any necessary subsurface drainage systems shall use drain rock conforming to the following Type 2 gradation:

<u>Sieve Sizes</u>	<u>Percentage Passing (by weight)</u>
1"	100
3/4"	90-100
3/8"	20-55
No. 4	0-10

8.0 CONCRETE SLAB-ON-GRADE AND FLATWORK CONSTRUCTION

- 8.1 Slab-on-grade - When used in this report, slab-on-grade shall refer to all interior concrete flatwork including floors and garage slabs.
- 8.2 Concrete flatwork - A general term, flatwork refers to all exterior concrete site work including sidewalks, driveways, and patios.
- 8.3 Subgrade - Subgrade beneath concrete flatwork and slabs-on-grade shall be compacted to 90 percent compaction. In areas where dynamic loading (vehicular traffic) occurs, the subgrade shall be compacted to 95% relative compaction. Compaction shall be approved by the Geotechnical Engineer.

8.4 Overexcavation - Expansive soils within two feet of flatwork or slab-on-grade shall be overexcavated to a depth of two feet (unless otherwise stated) below the bottom of the base material. Overexcavations should extend at least two feet laterally beyond the edge of the flatwork/slab-on-grade section.

8.5 Base - Base material shall be a minimum of 6 inches thick and be compacted to 95 percent relative compaction. Compaction shall be approved by the Geotechnical Engineer. Type 2 Class B aggregate base or pit run gravel meeting the following requirements shall be used:

<u>Sieve Size</u>	<u>Percentage Passing (by weight)</u>
1"	100
3/4"	90-100
No. 4	35-65
No. 16	15-40
No. 200	2-10

8.6 Concrete slab thickness and compressive strength requirements shall be in accordance with design criteria provided by the Structural Engineer. Minimum slab thickness and compressive strength shall be in accordance with the requirements of the City of Reno.

8.7 Concrete work shall conform to all requirements of ACI 301-84, Specifications for Structural Concrete for Buildings, except as modified by supplemental requirements.

8.8 Type II Portland Cement shall be used for all concrete slabs and flatwork.

8.9 To facilitate curing of the slab, base materials shall be kept moist until placement of the concrete.

- 8.10 Excessive slump (high water:cement ratio) of the concrete and/or improper curing procedures used during hot or cold weather could lead to excessive shrinkage, cracking or curling of slabs and other flatwork.
- 8.11 Concrete Specifications - For concrete curbs, gutters, sidewalks, driveways, and alley returns, the following specifications are required:

Minimum 28-day compressive strength	4,000 psi
Sacks cement per cubic yard concrete	6-8
Maximum gallons water per sack cement	5
Percent air entrainment	5%-7%
Slump range, inches	1-4

Admixtures - All admixtures shall be incorporated in the mix design and approved by the Geotechnical Engineer.

Finishing - All finishing shall be done in the absence of bleed water. No water shall be added to placed concrete during finishing.

9.0 RETAINING WALLS

- 9.1 Footings for continuous strip type retaining walls should be placed at least 24 inches below the lowest adjacent finished grade to provide for confinement and to minimize settlement. The footings should be designed using an allowable soil bearing pressure of 3000 psf.
- 9.2 Retaining walls should be designed for an active lateral earth pressure of 35 pounds per cubic foot, a passive lateral earth pressure of 400 pounds per cubic foot, and a base coefficient of 0.35.
- 9.3 Concrete for the retaining walls should be poured against undisturbed soils, if possible. If forms are used for the footings, they should be backfilled with material

taken from the excavation and recompactd to at least 90 percent compaction based on the ASTM D1557-78 test method.

- 9.4 In addition to active pressure from the soil, the effects of any surcharge from existing adjacent structures or roadways should be included in calculating lateral pressures on the retaining wall.
- 9.5 The design pressures given assume that the soils retained are granular and non-expansive and free draining.
- 9.6 Backfill should be lightly compacted to 85 percent relative density as the use of heavy compaction equipment could easily cause loads exceeding the designed lateral pressures which may result in wall failure. If moisture is encountered in the excavation, weep holes or a continuous drain along the base of the wall is recommended.
- 9.7 If moisture is encountered in the excavation or it is anticipated that surface moisture will seep down and be retained behind the wall, weep holes or continuous drain along the base of the wall is recommended.
- 9.8 City of Reno Standards require a concrete interceptor swale at the top of all retaining walls.

10.0 ASPHALT CONCRETE PAVEMENT

- 10.1 Material and Procedure - The asphalt-concrete material and placement procedures shall conform to appropriate sections of the "Standard Specifications". Aggregate materials for asphalt concrete shall conform to the requirements listed for Type 2 Plantmix Aggregate in Section 200.02.02 of the "Standard Specifications, 1992". The Contractor shall submit a proposed asphalt-concrete mix design to the Geotechnical Engineer for review and approval prior to paving. The mix design shall be based on

the Rice Method. Asphalt materials should be compacted to a minimum 92 percent of its maximum density per the Rice Method.

- 10.2 Subgrade Preparation - After completion of the utility trench backfill and prior to the placement of aggregate base the upper 6 inches of finished subgrade soil or sub-base material shall be uniformly compacted to at least 95 percent compaction. This may require scarifying, moisture conditioning and compacting.
- 10.3 Aggregate Base Rock - After the subgrade is properly prepared, the aggregate base material shall be placed uniformly on the approved subgrade. Aggregate base shall be placed in such a manner as to prevent segregation of the different sizes of material and any such segregation, unless satisfactorily corrected, shall be cause for rejection at the discretion of the Geotechnical Engineer. The aggregate base material shall be spread for compaction in layers not to exceed six inches, moisture conditioned as necessary, and compacted to at least 95 percent compaction. Aggregate base materials shall meet the requirements of Section 200.01.03 of the "Standard Specifications, 1992" for Type I, Class A or Type II, Class B aggregate base. The aggregate base materials shall be approved by the Geotechnical Engineer prior to incorporation into the pavement structure. Native soils and fill in roadway areas should be scarified to a depth of 1 foot and recompactd as subgrade. Subgrade material shall be compacted to at least 90 percent, except the top 6 inches which shall be compacted to 95 percent.
- 10.4 For all private car parking areas we recommend a pavement section consisting of 3 inches of asphalt underlain by 4 inches of Type 2 aggregate base.
- 10.5 It is important that parking area grades be set to prevent ponding of water and to provide positive drainage to suitable drainage structures. A desirable slope for drainage in paved areas is two percent; however, a minimum of one percent is allowable.

11.0 SEISMIC DESIGN

- 11.1** Design of structures should include an allowance for earthquake loading. Structures should be designed in conjunction with UBC Zone III seismic design criteria.

APPENDIX B
ASPHALTIC CONCRETE DESIGN

Printout of MS-1/MS-17 Results

Datafile : COMSTOCK UNITS 4 - 11

***** TRAFFIC INFORMATION *****

ANALYSIS PERIOD (years) = 20
 INITIAL DESIGN LIFE (years) = 20
 DESIGN LANE FACTOR = 0.50

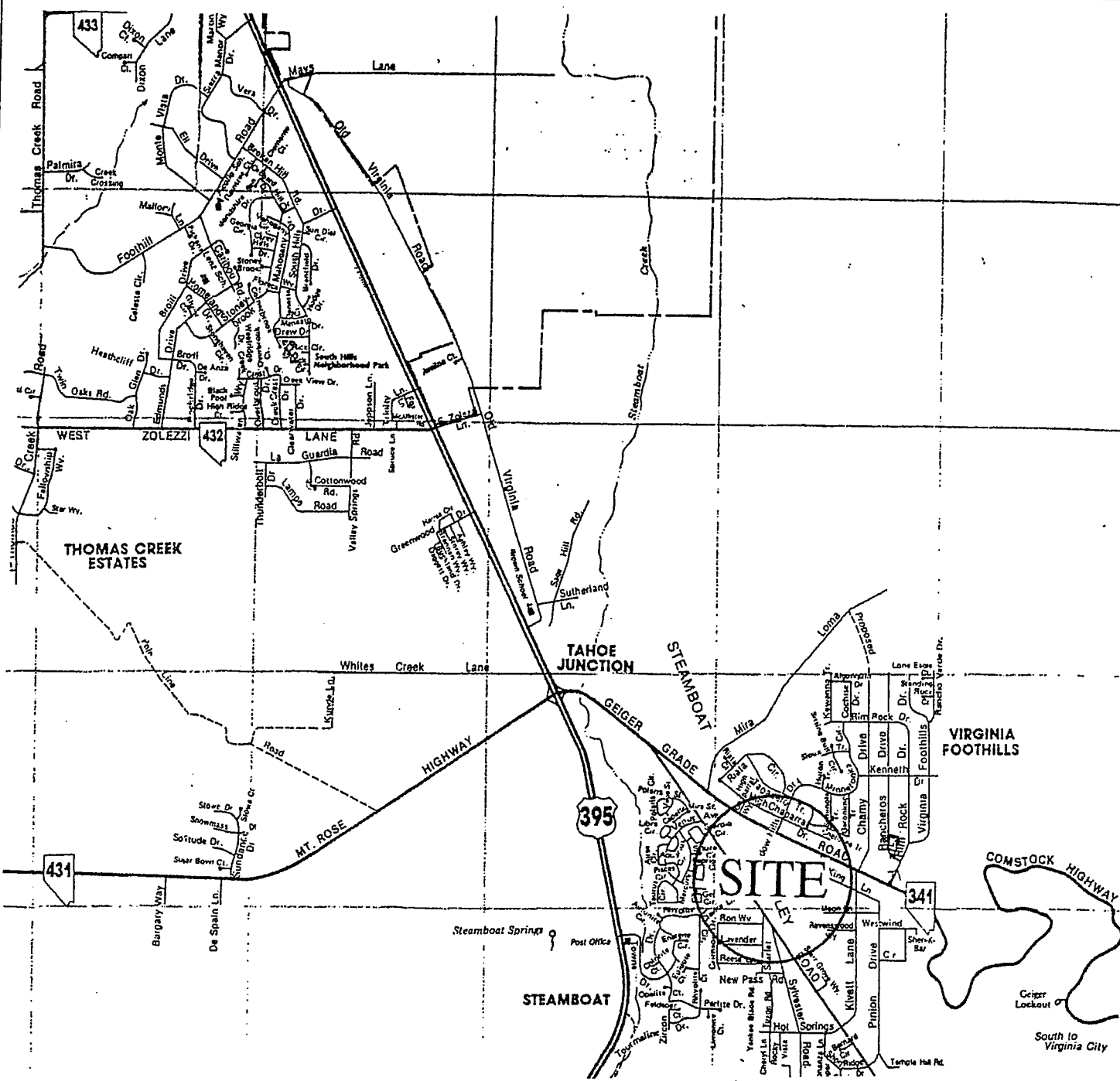
INITIAL AVERAGE ANNUAL DAILY TRAFFIC (AADT) = 1560
 % OF AADT THAT IS TRUCKS = 4
 ANNUAL COMPOUND GROWTH RATE (percent) = 4

Type of Usage is RURAL :

TRUCK CLASSIFICATION	Percent of TRUCKS	Truck Factor
TRUCK(2-AXLE,4-TIRE)	47.0	0.03
TRUCK(2-AXLE,6-TIRE)	10.0	0.20
TRUCK(3-AXLE or MORE)	2.0	0.67
MULT.TRUCK(3-AXLE)	1.0	0.48
MULT.TRUCK(4-AXLE)	4.0	0.70
MULT.TRUCK(>=5-AXLE)	36.0	0.95

>>>>>> CALCULATED EQUIVALENT AXLE LOADS OF TRAFFIC :

INITIAL YEAR (EAL) = 4,809
 DESIGN LIFE (EAL) = 143,210
 REMAINING 0 years (EAL) = 0
 TOTAL PERIOD (EAL) = 143,210



1"=3300'

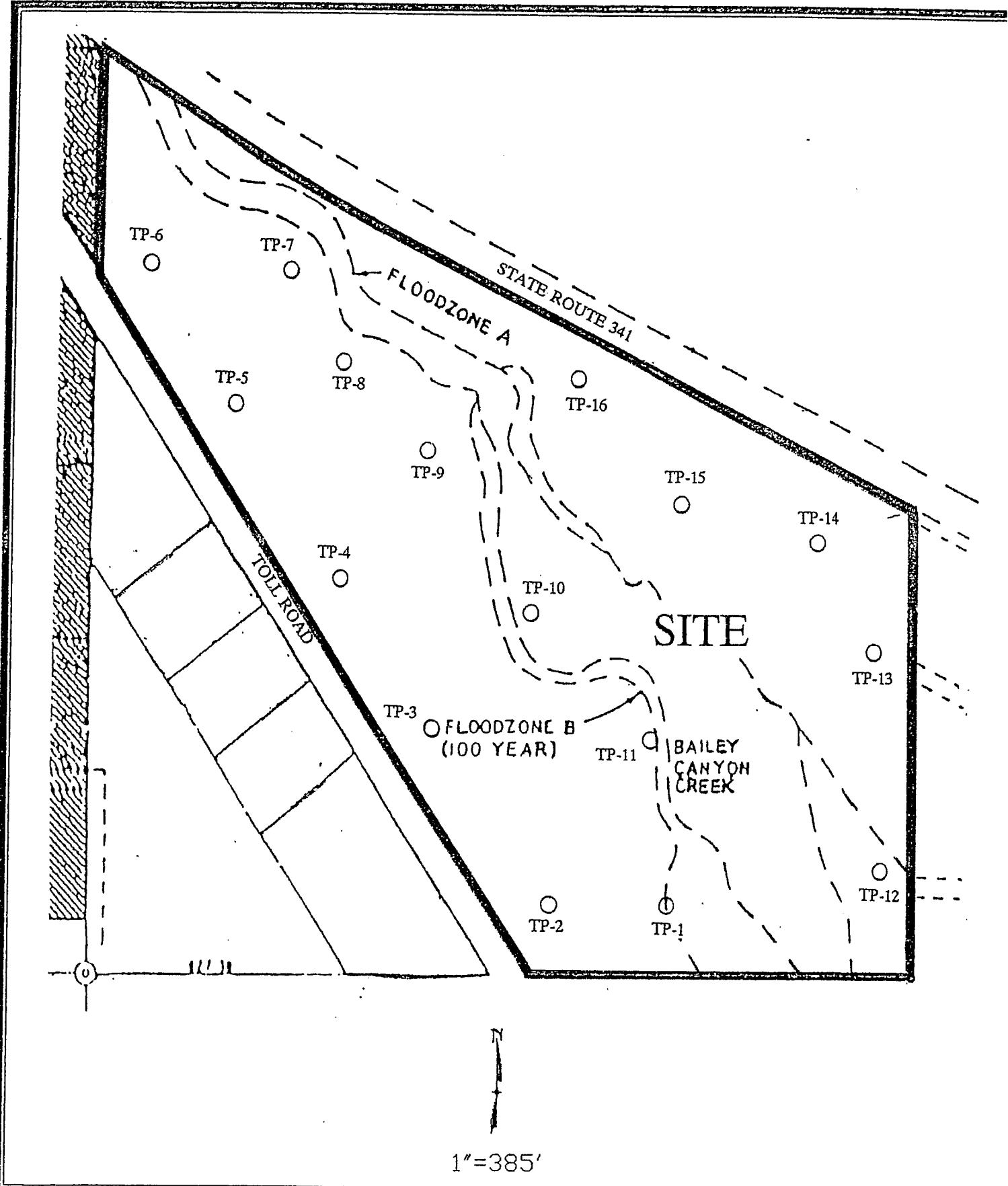
VICINITY MAP
COMSTOCK ESTATES
UNITS 4-11

PLATE 1
Job: 21545
By: LAH Appr: JKG
7:55 AM * 30-JAN-1995

SUMMIT ENGINEERING CORPORATION
CONSULTING ENGINEERS AND SURVEYORS
5405 MAE ANNE AVENUE
RENO, NEVADA (702)-747-8550

P:\DWGS\J21545\VIC.DWG

WTM16-003 - EXHIBIT F



SITE MAP
 COMSTOCK ESTATES
 UNITS 4-11

PLATE 2
 Job: 21545
 By: LAH Appr: JKG
 8:03 AM * 30-JAN-1995

SUMMIT ENGINEERING CORPORATION
 CONSULTING ENGINEERS AND SURVEYORS
 5406 MAE ANNE AVENUE
 RENO, NEVADA (702)-747-8590


P:\DWGS\J21545\SITE.DWG

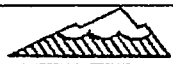
LOG OF Test Pit 1

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.


PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
				2	X		<p>GW Dark Brown Sandy Boulder to Cobble Gravel (GW), rounded boulders up to 16 inches, slightly moist to moist, medium dense to dense.</p> <p>Reddish Brown, minor silt.</p> <p>Dense to very dense, moderately cemented.</p> <p>Bottom of hole at 10 feet. No ground water encountered.</p>
				4			
				6			
				8	X		
				10			
				12			
				14			

 SUMMIT ENGINEERING CORPORATION FILE NO: 21545 DATE: 1-25-95	DRAWN BY: CRB CHKD. BY: JKG	COMSTOCK ESTATES	PLATE 3
		UNITS 4 - 11	

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
							LOG OF Test Pit 2
							EQUIPMENT: CAT 215
							DATE: 1-19-95 ELEV.
				2			GW Dark Brown Sandy Boulder to Cobble Gravel (GW), subrounded to rounded boulders up to 18 inches, slightly moist to moist, medium dense to dense. Light Brown, slightly cemented, slightly moist to dry. Bottom of hole at 9.5 feet. No ground water encountered.
				4			
				6			
				8			
				10			
				12			
				14			
 SUMMIT ENGINEERING CORPORATION							COMSTOCK ESTATES
FILE NO: 21545 DRAWN BY: CRB DATE: 1-25-95 CHKD. BY: JKG							UNITS 4 - 11
							PLATE 4


PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
					X		SC Reddish to Dark Brown Sandy Clay (SC), moderately plastic, slightly moist, loose to medium dense.
				2			GW Dark Brown Sandy Boulder to Cobble Gravel (GW), minor clay, moist, medium dense to dense.
				4			
				6			Light Brown, slightly cemented, dry to slightly moist, dense.
	3.0	5.7		8	X		
				10			Bottom of hole at 9.5 feet. No ground water encountered.
				12			
				14			

LOG OF Test Pit 3
EQUIPMENT: CAT 215
DATE: 1-19-95 ELEV.

 SUMMIT ENGINEERING CORPORATION FILE NO: 21545 DRAWN BY: CRB DATE: 1-25-95 CHKD. BY: JKG	COMSTOCK ESTATES	PLATE 5
	UNITS 4 - 11	

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	<u>LOG OF Test Pit 4</u> <u>EQUIPMENT: CAT 215</u> <u>DATE: 1-19-95 ELEV.</u>
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24	40.5	24.3		2	X		SC Reddish Brown Clayey Sand (SC), moderately plastic, moist, loose to medium dense.
				4			GW Light Brown Sandy Cobble to Boulder Gravel (GW), angular to subangular boulders up to 12 inches, slightly moist, dense.
				6			
				8	X		
				10			Bottom of hole at 10 feet. No ground water encountered.
				12			
				14			

	SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES UNITS 4 - 11	PLATE 6
FILE NO: 21545 DATE: 1-25-95	DRAWN BY: CRB CHKD. BY: JKG		

LOG Of Test Pit 5

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
					X		SC Reddish Brown Clayey Sand (SC), moderately plastic, minor cobbles, moist, medium dense.
				2			GW Dark Brown to Reddish Sandy Boulder to Cobble Gravel (GW), slightly cemented, slightly moist, medium dense to dense.
				4			
				6			
				8	X		Slightly more sand.
				10			Dry. Bottom of hole at 10.5 feet. No ground water encountered.
				12			
				14			

 SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES UNITS 4 - 11	PLATE 7
FILE NO: 21545 DRAWN BY: CRB DATE: 1-25-95 CHKD. BY: JKG		

LOG OF Test Pit 6

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV. _____

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
				2			<div style="display: flex; justify-content: space-between;"> <div style="width: 45%;"> </div> <div style="width: 50%;"> <p>SC Reddish Brown Clayey Sand (SC), minor cobbles, moist, loose to medium dense.</p> <p>GW Reddish Brown to Brown Sandy Boulder to Cobble Gravel (GW), moderately cemented, subrounded boulders up to 12 inches in size, slightly moist, dense.</p> <p>Less cemented.</p> <p>Bottom of hole at 9.5 feet. No ground water encountered.</p> </div> </div>
				4			
				6	X		
				8			
				10			
				12			
				14			


	SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES UNITS 4 - 11	PLATE 8
FILE NO: 21545 DATE: 1-25-95	DRAWN BY: CRB CHKD. BY: JKG		

LOG OF Test Pit 7

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
							CL Dark Brown Sandy Clay (CL), moist, soft.
				2			GW Reddish Brown Cobble to Boulder Gravel (GW), subrounded boulders up to 12 inches in size, slightly moist, medium dense.
				4			
				6			Light brown.
				8			
				10	X		Dark brown, minor silt, slightly moist.
				12			
				14			Bottom of hole at 10.5 feet. No ground water encountered.

 **SUMMIT** ENGINEERING CORPORATION
 FILE NO: 21545 DRAWN BY: CRB
 DATE: 1-25-95 CHKD. BY: JKG

COMSTOCK ESTATES
 UNITS 4 - 11

PLATE
 9

LOG OF Test Pit 8

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.


PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
					X		SP
				2			SC
				4			GW
				6			
				8			
				10	X		
	8.0	8.6					
				12			
				14			

Dark Brown: Fine Grained Sand (SP), organics throughout, slightly moist, loose.

Reddish Brown Clayey Sand (SC), moist, loose to medium dense.

Light Brown Sandy Cobble to Boulder Gravel (GW), subangular to angular boulders up to 18 inches in size, slightly moist to dry, dense.

Bottom of hole at 11 feet.
No ground water encountered.



SUMMIT ENGINEERING CORPORATION
 FILE NO: 21545 DRAWN BY: CRB
 DATE: 1-25-95 CHKD. BY: JKG

COMSTOCK ESTATES
 UNITS 4 - 11


PLATE
 10

LOG OF Test Pit 9

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT		
	19.0	14.2			X		SM Dark Brown Silty Sand (SM), slightly moist, loose.	
				2			GW Reddish Brown to Brown Sandy Cobble to Boulder Gravel (GW), subangular boulders up to 18 inches in size, slightly moist to dry, dense.	
				4				
				6				
				8	X			
				10				
				12				
				14				
								Bottom of hole at 11 feet. No ground water encountered.



SUMMIT ENGINEERING CORPORATION

FILE NO: 21545 DRAWN BY: CRB
 DATE: 1-25-95 CHKD. BY: JKG

COMSTOCK ESTATES

UNITS, 4 - 11

PLATE


11

LOG OF Test Pit 10

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.


PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
				2			GW Dark Brown Sandy Cobble to Boulder Gravel (GW), subangular to subrounded boulders up to 18 inches in size, slightly moist to moist, medium dense. Bottom of hole at 10 feet. No ground water encountered.
				4	X		
	3.8	7.3					
				6			
				8			
				10			
				12			
				14			

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COMSTOCK ESTATES
UNITS 4 - 11

PLATE
12

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
							LOG OF Test Pit 12
							EQUIPMENT: CAT 215
							DATE: 1-19-95 ELEV.
				2			GW Dark Brown Sandy Cobble to Boulder Gravel (GW), subangular boulders up to 18 inches in size, slightly moist, dense. Slightly moist to dry. Bottom of hole at 9 feet. No ground water encountered.
				4			
				6	X		
				8			
				10			
				12			
				14			


SUMMIT ENGINEERING CORPORATION
 FILE NO: 21545 DRAWN BY: CRB
 DATE: 1-25-95 CHKD. BY: JKG

COMSTOCK ESTATES
 UNITS 4 - 11

PLATE
 14

LOG OF Test Pit 13

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT		
18	32.3	21.8			X		SC	Reddish Brown Clayey Sand (SC), moist, medium dense.
				2			GW	Light Reddish Brown Sandy Boulder to Cobble Gravel (GW), slightly cemented, subangular boulders up to 18 inches in size, dry to slightly moist, dense.
				4				
				6				No cementing.
				8				
				10	X			Bottom of hole at 10 feet. No ground water encountered.
				12				
				14				



SUMMIT ENGINEERING CORPORATION

FILE NO: 21545 DRAWN BY: CRB
DATE: 1-25-95 CHKD. BY: JKG

COMSTOCK ESTATES
UNITS 4 - 11


PLATE
15

LOG OF Test Pit 14

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
				2			<p>GW Reddish Brown Sandy Cobble to Boulder Gravel (GW), subangular boulders up to 18 inches in size, slightly moist, dense.</p> <p style="text-align: center;">Dry.</p> <p>Bottom of hole at 8 feet. No ground water encountered.</p>
				4			
				6	X		
				8			
				10			
				12			
				14			


 SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES UNITS 4 - 11	PLATE 16
FILE NO: 21545 DRAWN BY: CRB DATE: 1-25-95 CHKD. BY: JKG		

LOG OF Test Pit 15

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
				2	X		SW Reddish Brown Gravelly Sand (SW), coarse grained, minor silt, slightly moist, loose to medium dense.
				4			GW Reddish Brown Sandy Cobble to Boulder Gravel (GW), slightly cemented, subrounded boulders up to 12 inches in size, slightly moist, dense.
				6			
				8			
				10			Bottom of hole at 10 feet. No ground water encountered.
				12			
				14			


	SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES UNITS 4 - 11	PLATE 17
FILE NO: 21545 DATE: 1-25-95	DRAWN BY: CRB CHKD. BY: JKG		

LOG OF Test Pit 16

EQUIPMENT: CAT 215

DATE: 1-19-95 ELEV.

PLASTICITY INDEX	% PASSING #200	MOISTURE CONTENT % OF DRY WT.	DRY DENSITY (PCF)	DEPTH (FT.)	SAMPLE LOCATION	BLOWS / FOOT	
					X		SW Dark Brown Sand (SW), minor gravel, fine grained, minor silt, moist, loose.
				2			GW Light Brown Sandy Cobble to Boulder Gravel (GW), subrounded boulders up to 12 inches in size, slightly moist to dry, dense.
				4			
				6			
				8	X		
				10			
				12			
				14			
							Bottom of hole at 10.5 feet. No ground water encountered.

 SUMMIT ENGINEERING CORPORATION	COMSTOCK ESTATES	PLATE
	UNITS 4 - 11	18
FILE NO: 21545 DATE: 1-25-95	DRAWN BY: CRB CHKD. BY: JKG	

MAJOR DIVISIONS		GRAPHIC SYMBOL	GROUP SYMBOL	TYPICAL NAMES
COARSE GRAINED SOILS LESS THAN 50% PASSING No. 200 SIEVE	GRAVELS LESS THAN 50% COARSE FRACTION PASSES THE No.4 SIEVE		GW	WELL GRADED GRAVELS, GRAVEL/SAND MIXTURE
			GP	POORLY GRADED GRAVELS, GRAVEL/SAND MIXTURE
		GRAVELS WITH OVER 12% FINES	GM	SILTY GRAVEL, POORLY GRADED GRAVEL/SAND/SILT MIXTURE
			GC	CLAYEY GRAVEL, POORLY GRADED GRAVEL/SAND/CLAY MIXTURE
	SANDS MORE THAN 50% COARSE FRACTION PASSES THE No.4 SIEVE		SW	WELL GRADED SANDS, GRAVELLY SANDS
			SP	POORLY GRADED SANDS, GRAVELLY SANDS
		SANDS WITH OVER 12% FINES	SM	SILTY SANDS, POORLY GRADED SAND/CLAY MIXTURES
			SC	CLAYEY SAND, POORLY GRADED SAND/CLAY MIXTURES
FINE GRAINED SOILS MORE THAN 50% PASSING No. 200 SIEVE	SILTS AND CLAYS LIQUID LIMIT LESS THAN 50		ML	INORGANIC SILTS & VERY FINE SANDS OF LOW PLASTICITY
			CL	INORGANIC CLAYS OF LOW TO MEDIUM PLASTICITY, LEAN CLAYS
			OL	ORGANIC CLAYS AND ORGANIC SILTY CLAYS OF LOW PLASTICITY
	SILTS AND CLAYS LIQUID LIMIT GREATER THAN 50		MH	INORGANIC SILTS, MICACEOUS OR DIATOMACEOUS FINE SANDY OR SILTY SOILS
			CH	INORGANIC CLAYS OF HIGH PLASTICITY, FAT CLAYS
OH	ORGANIC CLAYS OF MEDIUM TO HIGH PLASTICITY, ORGANIC SILTS			
ORGANIC RICH SOILS		PT	TOPSOIL, PEAT, ORGANIC RICH SOILS	
OTHER SOILS		F	FILL MATERIALS	

UNIFIED SOIL CLASSIFICATION SYSTEM



UNDISTURBED
SAMPLE



BULK SAMPLE



NO RECOVERY



MEASURED DEPTH
TO GROUNDWATER

COMSTOCK ESTATES
UNITS 4 - 11
WASHOE COUNTY

JOB NO: 21545

APPR: JKG BY: CRB

PLATE 19

7:42 AM * 30-JAN-1995

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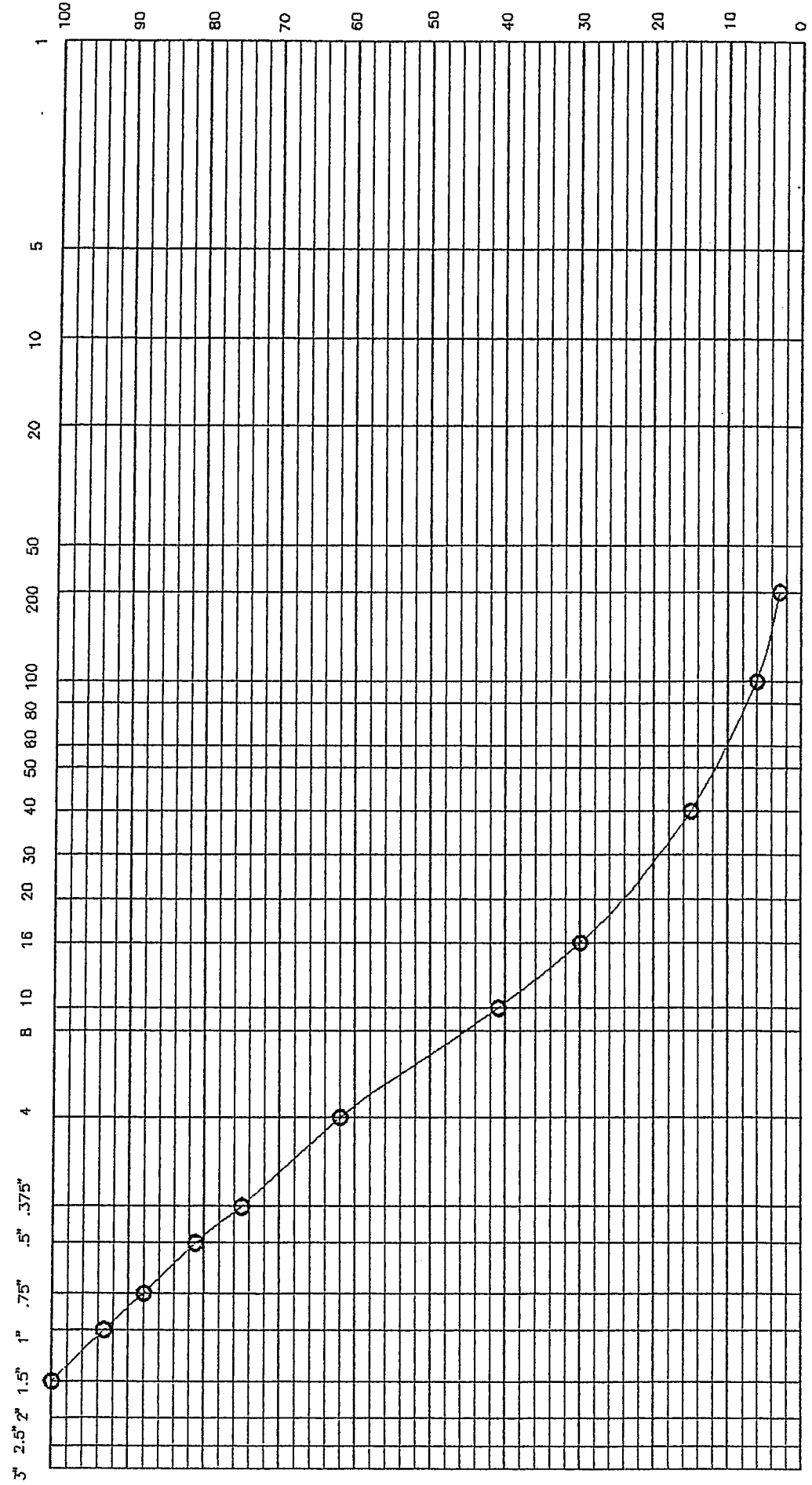
5405 MAE ANNE AVENUE
RENO, NEVADA (702)-747-8550

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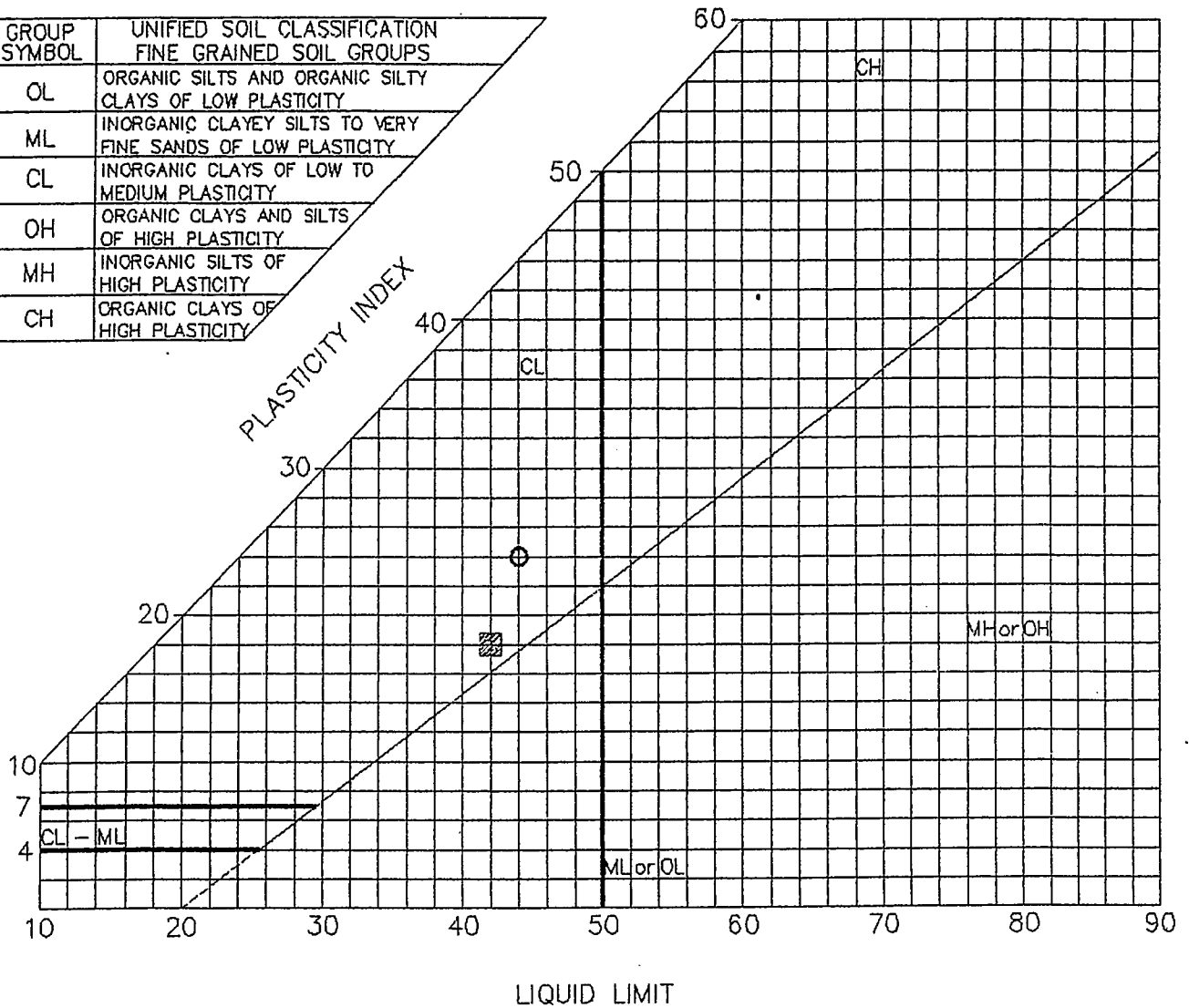
UNIFIED SOIL CLASSIFICATION SYSTEM

GRAVEL	COARSE SAND	MEDIUM SAND	FINE SAND	SILT AND CLAY
--------	-------------	-------------	-----------	---------------

U.S. Standard Sieve Sizes ———— Microns



GROUP SYMBOL	UNIFIED SOIL CLASSIFICATION FINE GRAINED SOIL GROUPS
OL	ORGANIC SILTS AND ORGANIC SILTY CLAYS OF LOW PLASTICITY
ML	INORGANIC CLAYEY SILTS TO VERY FINE SANDS OF LOW PLASTICITY
CL	INORGANIC CLAYS OF LOW TO MEDIUM PLASTICITY
OH	ORGANIC CLAYS AND SILTS OF HIGH PLASTICITY
MH	INORGANIC SILTS OF HIGH PLASTICITY
CH	ORGANIC CLAYS OF HIGH PLASTICITY

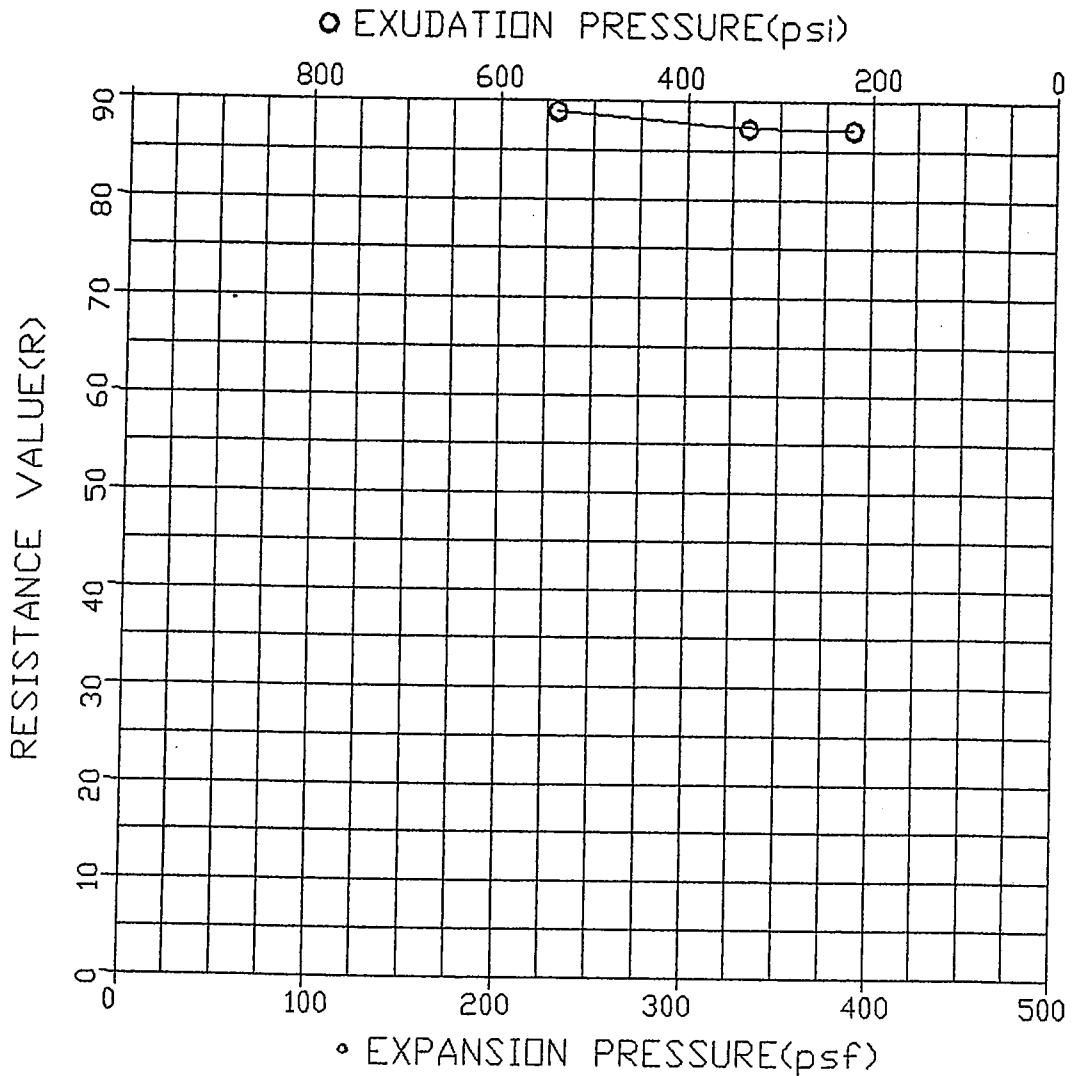


TEST SYMBOL	BORING NUMBER	SAMPLE NUMBER	% PASSING #200 SIEVE	LIQUID LIMIT	PLASTICITY INDEX	CLASSIFICATION
○	TP-4	0.5-1.5'	40.5	44	24	SC
■	TP-13	0.5-1.5'	32	42	18	SC

PLASTICITY INDEX
COMSTOCK ESTATES
UNITS 4-11, NEVADA


JOB NO: 21545
APPR: JKG BY: CRB
PLATE 22
7:29 AM * 30-JAN-1995

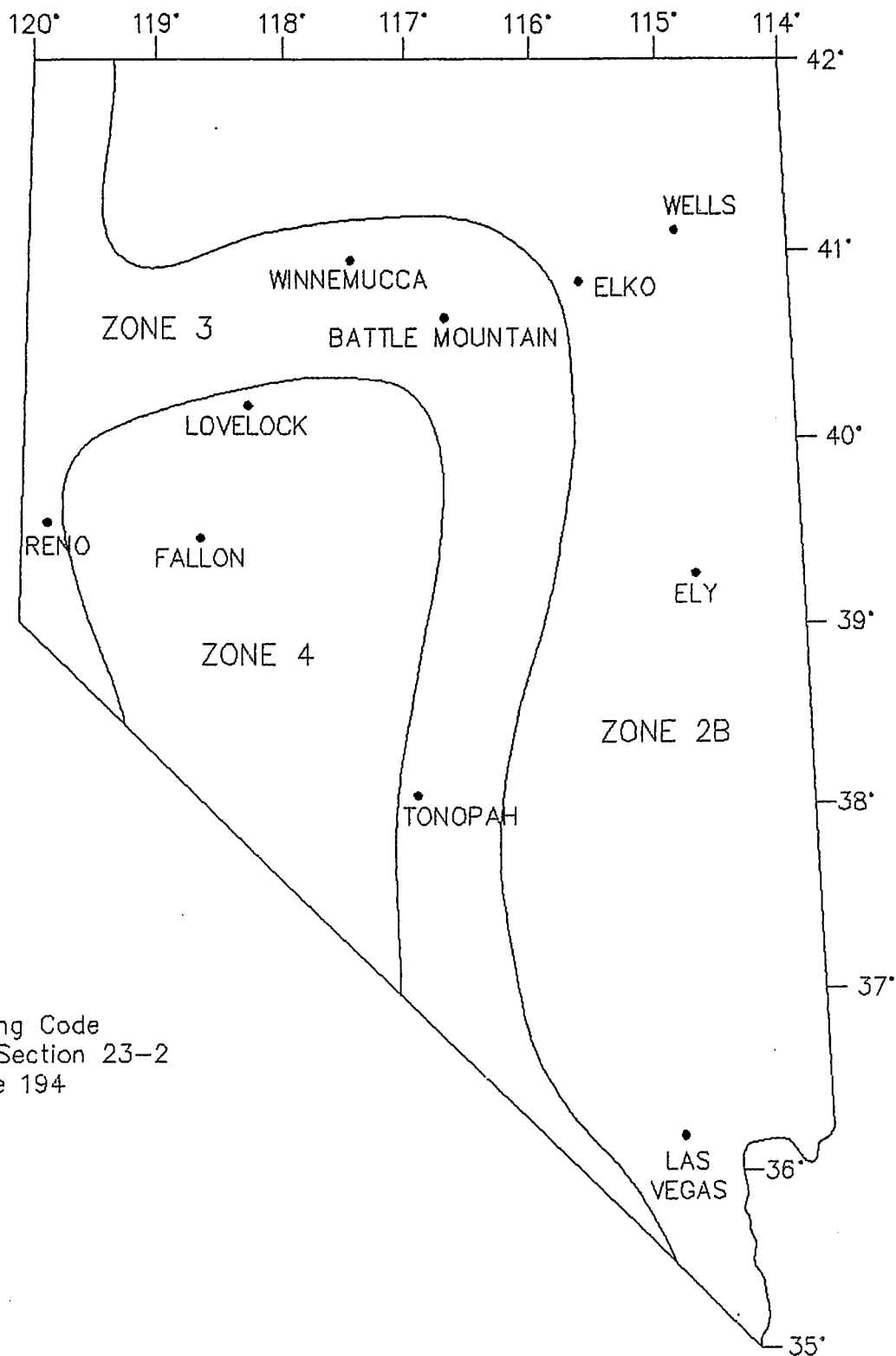
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RENO, NEVADA (702)-747-8550



Specimen No.	A	B	C
Water Content(%)	13.3	11.7	12.5
Dry Density(pcf)	118.3	112.8	120.8
Exudation Pressure(psi)	207	541	334
Expansion Pressure(psf)	-	-	-
Resistance Value(R)	87	89	87

Sample Source	Classification	Sand Equivalent	Values Interpolated at 300 psi Exudation press.	
			Expansion Pressure	R-value
TP-1 2-3 FEET	BROWN SANDY GRAVEL (GW)	----	-	87

 SUMMIT ENGINEERING CORPORATION FILE NO: 21545 DRAWN BY: LAH DATE: 1-30-95 CHKD. BY: JKG	COMSTOCK ESTATES	PLATE 23
	UNITS 4 - 11	



Reference

Uniform Building Code
 1991 Edition, Section 23-2
 Figure 2, Page 194

SEISMIC ZONE MAP
 COMSTOCK UNITS 4-11
 WASHOE COUNTY

JOB NO. 21545
 APPR.: JKG BY: CRB
 PLATE 24
 7:38 AM * 30-JAN-1995

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PRELIMINARY DRAINAGE REPORT
FOR
BAILEY CREEK ESTATES TENTATIVE MAP

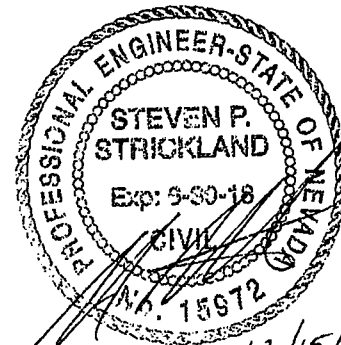
Prepared for:

STL Company, Inc
16500 Wedge Parkway, Bldg A Suite 2
Reno, NV 89511

December 15, 2016

Prepared by:

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(775) 823-4068
Steven Strickland, P.E. - Principal



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TABLE OF CONTENTS

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2 Preliminary Design 2
3 Hydrologic Analysis 2
4 Conclusions 3
5 References 3

APPENDIX

- VICINITY MAP
- FEMA FIRM Flood Zone Exhibit
- PRELIMINARY BASIN FLOW CALCULATIONS (5-YEAR)
- PRELIMINARY BASIN FLOW CALCULATIONS (100-YEAR)
- PRELIMINARY STORM DRAIN SYSTEM LAYOUT AND HYDROLOGIC BASIN MAP



1 INTRODUCTION

This report shall serve as the preliminary drainage report for the Bailey Creek Estates Tentative Map, which will consist of 56 single family lots. The purpose of this report is to address the drainage issues that result from development of the proposed project site in accordance with Truckee Meadows Regional Drainage Manual (TMRDM) and Washoe County development standards. As this report is preliminary in nature, a more detailed study will need to be conducted and a final technical drainage report will need to be submitted with the final improvement plans for the project.

1.1 PROJECT LOCATION/HISTORIC DRAINAGE

The proposed project site (APNs 017-520-03 and 017-480-02) is approximately 28.7± acres in size and is located within Section 34 of T18N, R20E, MDM, Washoe County, Nevada.

The project site is bounded by Geiger Grade to the north, Cottonwood Creek Estates and Comstock Estates to the south, and Medium Density Suburban (MDS) lots to the east. A Vicinity Map is included in the **Appendix** of this report for reference.

The parcel is currently unimproved open land. Bailey Creek runs adjacent to the southern boundary of the property. The creek flows on adjacent common area from southeast to northwest. Offsite stormwater from the MDS parcels to the east flow onto the project site and generally run parallel to and into Bailey Creek. The majority of the proposed project site will be mass graded and will be improved/disturbed.

The project site is located in FEMA Zone X, areas outside the determined to be outside the 500-year annual chance floodplain, and Shaded Zone X, areas of 0.2% annual chance of flood; areas of 1% annual chance of flood with depths less than 1 foot or with drainage areas of less than one square mile. The site can be located on FEMA FIRM Panel 3263G. An exhibit identifying the FEMA zone boundaries and the project site is included in the **Appendix**.

1.2 BACKGROUND/PREVIOUS STUDIES

Bailey Creek Estates was originally part of the Cottonwood Estates Tentative Map. Cottonwood Estates was developed on the southwest side of Bailey Creek and a portion of the Bailey Creek Estates project site had recorded lots and approved improvement plans. The Cottonwood Creek Tentative Map has since expired and the previously recorded lots were reverted back to acreage.

A LOMR on Bailey Creek was completed on Bailey Creek in 2001 and the base flood elevations were established along the Bailey Creek. The project boundaries are outside of the current FEMA AE zone on the creek, but is anticipated that the final drainage analysis would include an updated review of the flood limits based upon current topographic information.

1.3 REGULATORY PERSPECTIVE

The Project site is located within the Washoe County jurisdiction. The onsite pipes and drain inlet drainage facilities will be operated and maintained by Washoe County. The Baily Creek Estates HOA will be responsible for maintenance of the detention basins and Bailey Creek.

2 PRELIMINARY DESIGN

The proposed drainage system for the project site consists of sheet flow from the lots and streets into gutters with which storm water is conveyed into drop inlets and underground storm drain pipes. Onsite flows will be directed to detention basins or directly to Bailey Creek. We have estimated five outfalls from the project into Bailey Creek. Two of those outfalls will be directed to detention basins to mitigate for flow rate increases due to development. Offsite flows from the MDS parcels to the east will be picked up in v-ditches located on the project's east boundary. The ditches will pick up the sheet flow from the east and convey it to the underground storm drain system. One detention basin is proposed in the common area with in the project boundary and one detention basin is proposed in the adjacent common area along Bailey Creek.

3 HYDROLOGIC ANALYSIS

Preliminary flows were estimated for the 5-year and 100-year design events using the rational method per the Truckee Meadows Drainage Manual. NOAA Atlas 14 was used for rainfall intensities. The basin calculations are included in the Appendix. There are five outfalls that will drain onsite and offsite flows into Bailey Creek. Q5's ranged from 0.8 cfs to 25.0 cfs, and Q100's ranged from 2.7 cfs to 75.6 cfs. These flow rates are manageable in storm drain pipes within the street Right of Way. Excluding flows coming down Bailey Creek the predevelopment flows coming through the project site have been estimated at 23.3 cfs for the Q5 and 75.5 cfs for the Q100. Total post development flows, prior to detention, have been estimated to be 40.5 cfs for the Q5 and 127.1 cfs for the Q100. These are cumulative rational method summaries and are therefore conservative. It's likely the flows will be slightly smaller when routed through the drainage system in greater detail with a final design analysis. The detention basins will be sized to reduce the total post development flows to the maximum of the total predevelopment flow prior to the storm drainage leaving the site.



4 CONCLUSIONS

The drainage facilities for the Bailey Creek Estates subdivision will be designed to capture and perpetuate the design storm event flows to an underground storm drain system and detention basins. The conveyance of flows is in conformance with the Washoe County Development Code and the TMRDM. There will be no negative impacts to any adjacent or downstream properties as a result of development during the 5-year and 100-year storms due to the implementation of the proposed storm water management system. As previously stated, this report is preliminary in nature and a more detailed study will need to be conducted and a final technical drainage report will need to be submitted with the final improvement plans for the project.

5 REFERENCES

Truckee Meadows Regional Drainage Manual, April 30, 2009.

Washoe County Development Code, Latest Version.



APPENDIX

VICINITY MAP

FEMA FIRM Flood Zone Exhibit


PRELIMINARY BASIN FLOW CALCULATIONS (5-YEAR)

PRELIMINARY BASIN FLOW CALCULATIONS (100-YEAR)

PRELIMINARY STORM DRAIN SYSTEM LAYOUT AND HYDROLOGIC BASIN MAP



Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community

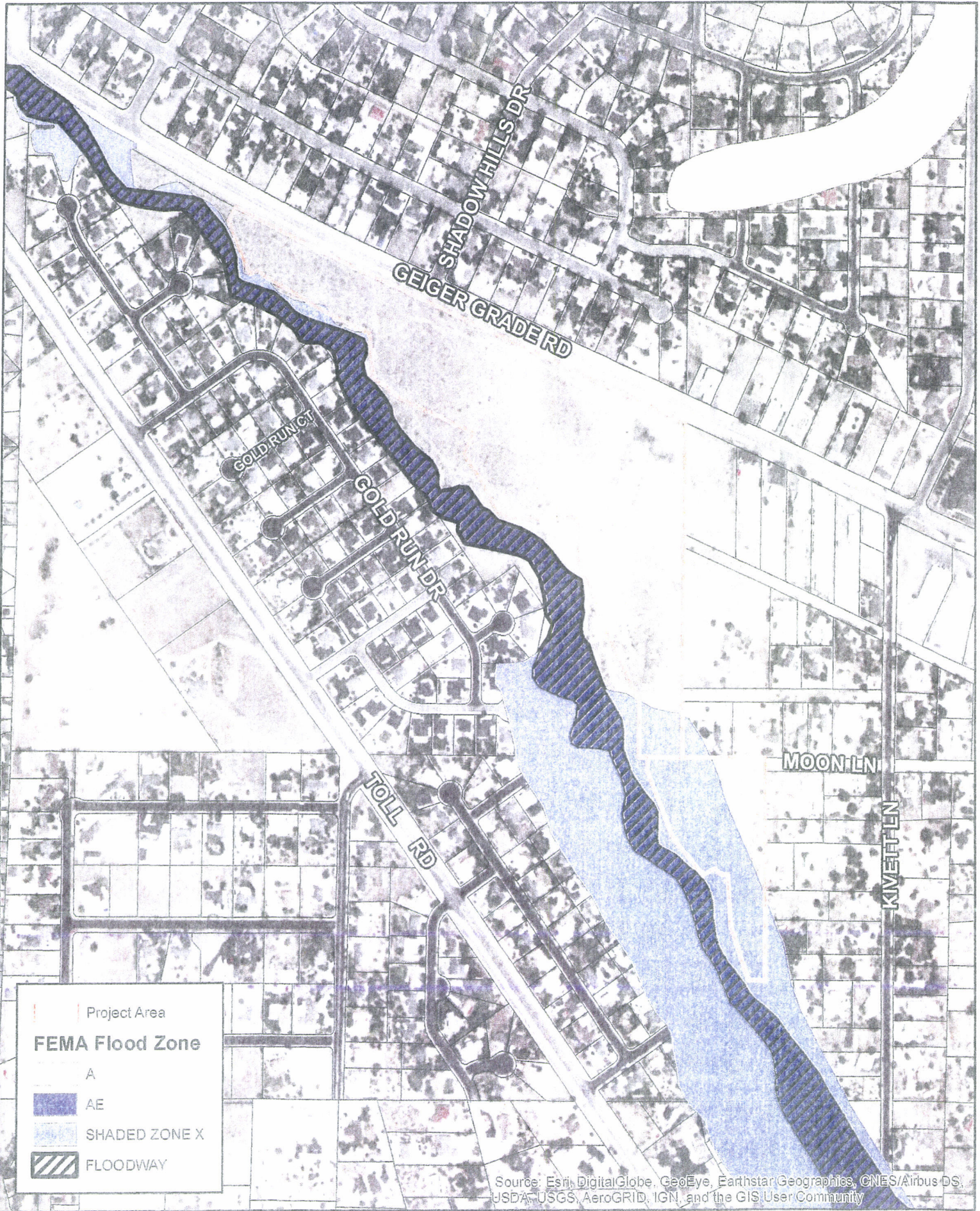
 Project Area



Vicinity Map
 Bailey Creek Estates
 Washoe County
 December, 2016



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FEMA Flood Zone
Bailey Creek Estates
Washoe County
December, 2016

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Factor 5-Year	Overland Flow					Unchanneled Flow					Channel Flow				
	L ₁ (ft)	S (ft/ft)	T ₁ (min)	L _s (ft)	S (ft/ft)	V (ft/s)	T ₁₁ (min)	L _t (ft)	S (ft/ft)	V (ft/s)	T ₁₂ (min)	T _c (min)	T _c * (min)	T _c (min)	
0.41	204	0.0200	14.0	144	0.0200	2.3	1.1					14.0	11.9	11.9	
0.42	153	0.0200	12.1					346	0.0200	2.9	2.0	14.1	12.8	12.8	
0.40	90	0.0200	9.5	91	0.0200	2.3	0.7					10.1	11.0	10.1	
0.50	164	0.0200	11.0					408	0.0200	2.9	2.4	13.4	13.2	13.2	
0.41	167	0.0200	12.7					267	0.0200	2.9	1.6	14.3	12.4	12.4	
0.41	173	0.0200	13.0					396	0.0200	2.9	2.3	15.3	13.2	13.2	
0.50	174	0.0200	11.3					134	0.0200	2.9	0.8	12.1	11.7	11.7	
0.50	116	0.0200	9.3					301	0.0200	2.9	1.7	11.0	12.3	11.0	
0.50	142	0.0200	10.2					309	0.0200	2.9	1.8	12.0	12.5	12.0	
0.40	213	0.0200	14.7					278	0.0200	2.9	1.6	16.3	12.7	12.7	
0.50	187	0.0200	11.8					236	0.0200	2.9	1.4	13.1	12.4	12.4	
0.39	178	0.0234	12.8					216	0.0137	2.4	1.5	14.3	12.2	12.2	
0.49	152	0.0200	10.8					407	0.0200	2.9	2.4	13.1	13.1	13.1	
0.40	152	0.0137	14.0					194	0.0137	2.4	1.4	15.4	11.9	11.9	
0.50	84	0.0013	19.7					394	0.0179	2.7	2.4	22.1	12.7	12.7	
0.45								529	0.0183	2.8	3.2	5.0	12.9	5.0	
0.41	260	0.0200	16.0	555	0.0200	2.3	4.1					20.0	14.5	14.5	
0.50								351	0.0188	2.8	2.1	5.0	12.0	5.0	
0.61	171	0.0234	8.6					392	0.0254	3.2	2.0	10.7	13.1	10.7	
0.36	36	0.0178	6.6					264	0.0178	2.7	1.6	8.2	11.7	8.2	
0.35	29	0.0320	5.0					195	0.0320	3.6	0.9	5.9	11.2	5.9	
0.35	64	0.0492	6.4					193	0.0492	4.5	0.7	7.1	11.4	7.1	
0.50	118	0.0200	9.3	387	0.0200	2.3	2.8					12.1	12.8	12.1	
0.35	51	0.0200	7.7	230	0.0200	2.3	1.7					9.4	11.6	9.4	
0.36								416	0.0179	2.7	2.5	5.0	12.3	5.0	
0.35	212	0.0400	12.5					610	0.0340	3.7	2.7	15.2	14.6	14.6	
0.35	324	0.0384	15.6	587	0.0276	2.7	3.6					19.2	15.1	15.1	
0.35	217	0.0337	13.3	823	0.0202	2.3	6.0					19.3	15.8	15.8	
0.35	168	0.0576	9.8	80	0.0576	3.9	0.3					10.2	11.4	10.2	
0.35	305	0.0428	14.6	180	0.0298	2.8	1.1					15.7	12.7	12.7	
0.35	176	0.0372	11.6	391	0.0310	2.8	2.3					13.9	13.1	13.1	
0.35	133	0.0235	11.7	499	0.0187	2.2	3.8					15.5	13.5	13.5	
0.35	238	0.0245	15.5	777	0.0271	2.7	4.9					20.4	15.6	15.6	

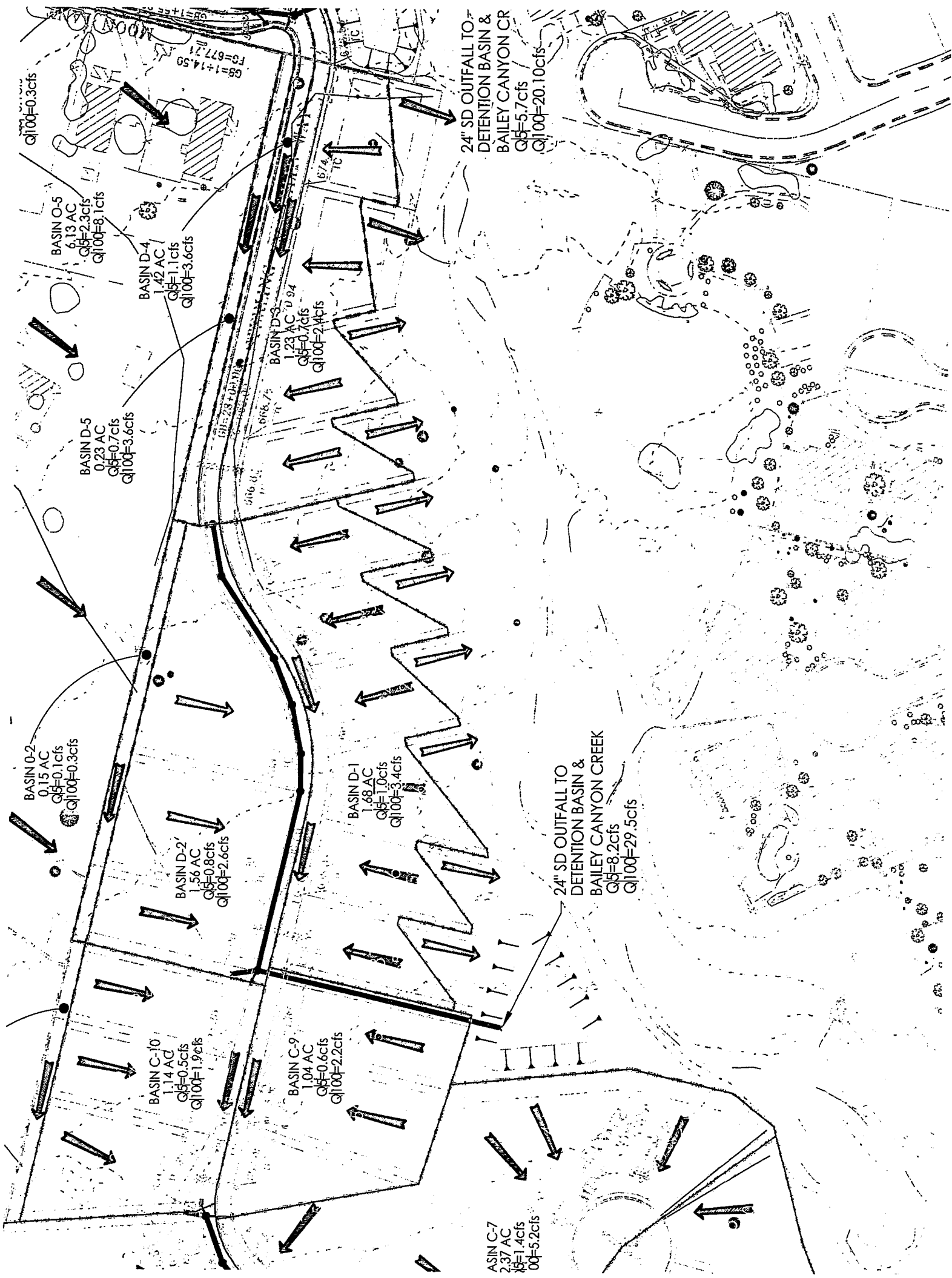
Factor 100-Year

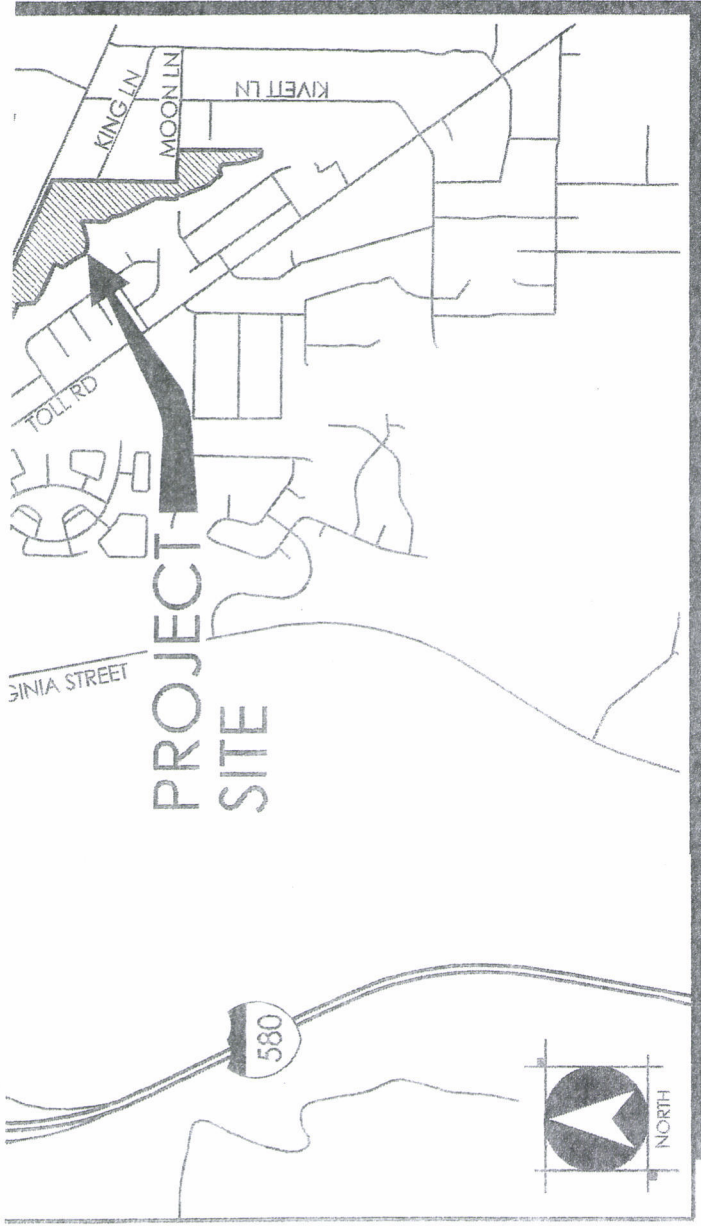
Overland Flow

Unannealed Flow

Subsidiary Flow

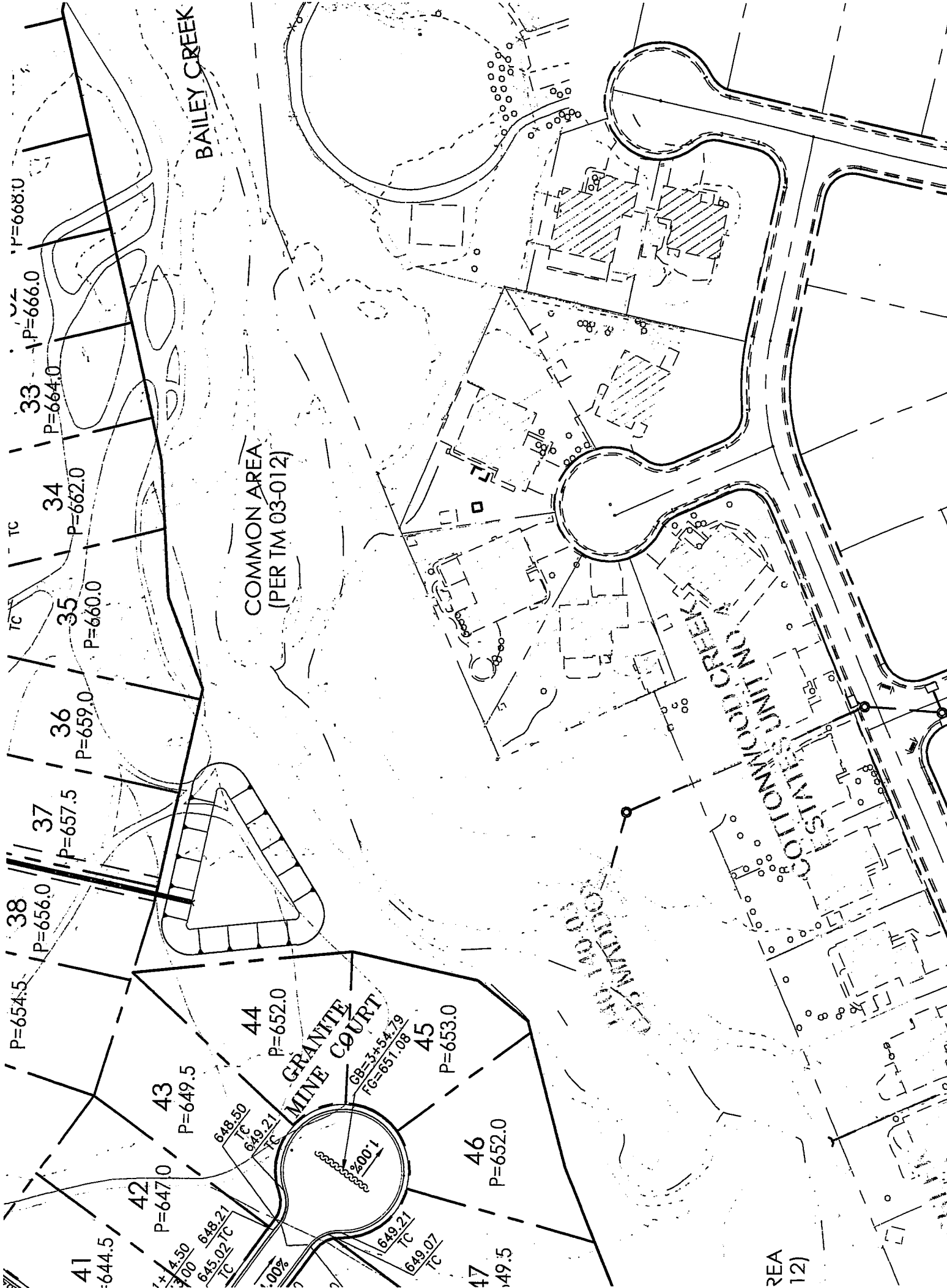
	L ₁ (ft)	S (ft/ft)	T ₁ (min)	L ₂ (ft)	S (ft/ft)	V (ft/s)	T ₁₁ (min)	L _t (ft)	S (ft/ft)	V (ft/s)	T ₁₂ (min)	T _c (min)	T _c * (min)	T _c (min)
0.56	204	0.0200	11.0	144	0.0200	2.3	1.1					11.0	11.9	11.0
0.57	153	0.0200	9.4					346	0.0200	2.9	2.0	11.4	12.8	11.4
0.55	90	0.0200	7.4	91	0.0200	2.3	0.7					8.1	11.0	8.1
0.65	164	0.0200	8.2					408	0.0200	2.9	2.4	10.6	13.2	10.6
0.56	167	0.0200	10.0					267	0.0200	2.9	1.6	11.5	12.4	11.5
0.56	173	0.0200	10.2					396	0.0200	2.9	2.3	12.5	13.2	12.5
0.65	174	0.0200	8.5					134	0.0200	2.9	0.8	9.3	11.7	9.3
0.65	116	0.0200	6.9					301	0.0200	2.9	1.7	8.7	12.3	8.7
0.65	142	0.0200	7.7					309	0.0200	2.9	1.8	9.5	12.5	9.5
0.55	213	0.0200	11.5					278	0.0200	2.9	1.6	13.2	12.7	12.7
0.65	187	0.0200	8.8					236	0.0200	2.9	1.4	10.2	12.4	10.2
0.54	178	0.0234	10.1					216	0.0137	2.4	1.5	11.6	12.2	11.6
0.64	152	0.0200	8.1					407	0.0200	2.9	2.4	10.5	13.1	10.5
0.55	152	0.0137	11.0					194	0.0137	2.4	1.4	12.4	11.9	11.9
0.65	84	0.0013	14.8					394	0.0179	2.7	2.4	17.2	12.7	12.7
0.60								529	0.0183	2.8	3.2	5.0	12.9	5.0
0.56	260	0.0200	12.5	555	0.0200	2.3	4.1					16.5	14.5	14.5
0.65								351	0.0188	2.8	2.1	5.0	12.0	5.0
0.76	171	0.0234	6.0					392	0.0254	3.2	2.0	8.0	13.1	8.0
0.51	36	0.0178	5.3					264	0.0178	2.7	1.6	6.9	11.7	6.9
0.50	29	0.0320	4.0					195	0.0320	3.6	0.9	5.0	11.2	5.0
0.50	64	0.0492	5.1					193	0.0492	4.5	0.7	5.8	11.4	5.8
0.65	118	0.0200	6.9	387	0.0200	2.3	2.8					9.8	12.8	9.8
0.50	51	0.0200	6.2	230	0.0200	2.3	1.7					7.8	11.6	7.8
0.51								416	0.0179	2.7	2.5	5.0	12.3	5.0
0.50	212	0.0400	10.0					610	0.0340	3.7	2.7	12.7	14.6	12.7
0.50	324	0.0384	12.5	587	0.0276	2.7	3.6					16.1	15.1	15.1
0.50	217	0.0337	10.7	823	0.0202	2.3	6.0					16.6	15.8	15.8
0.50	168	0.0576	7.9	80	0.0576	3.9	0.3					8.2	11.4	8.2
0.50	305	0.0428	11.7	180	0.0298	2.8	1.1					12.7	12.7	12.7
0.50	176	0.0372	9.3	391	0.0310	2.8	2.3					11.6	13.1	11.6
0.50	133	0.0235	9.4	499	0.0187	2.2	3.8					13.2	13.5	13.2
0.50	238	0.0245	12.4	777	0.0271	2.7	4.9					17.3	15.6	15.6



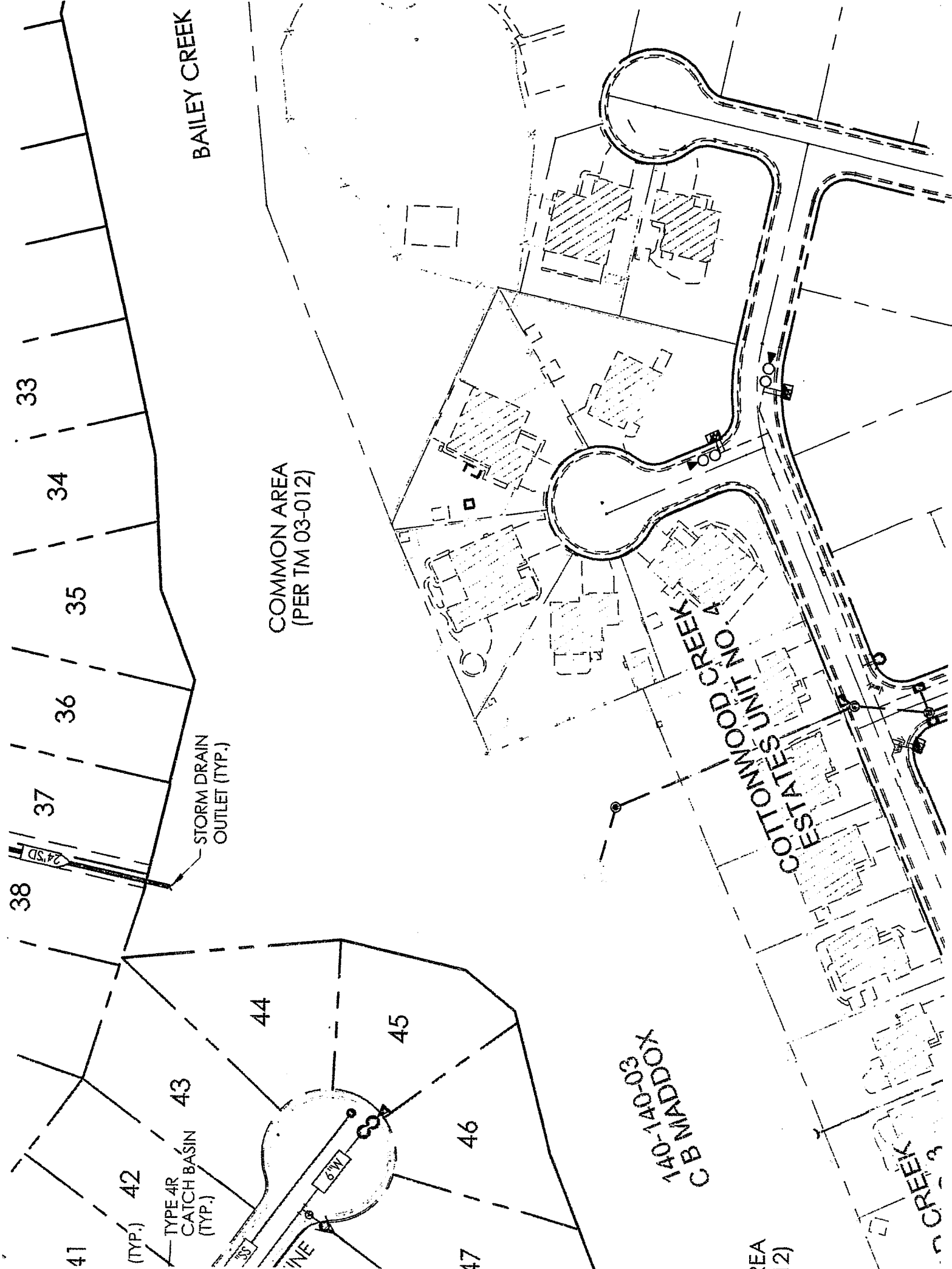


VICINITY MAP
NOT TO SCALE





REA
12)



BAILEY CREEK

COMMON AREA
(PER TM 03-012)

STORM DRAIN
OUTLET (TYP.)

TYPE 4R
CATCH BASIN
(TYP.)

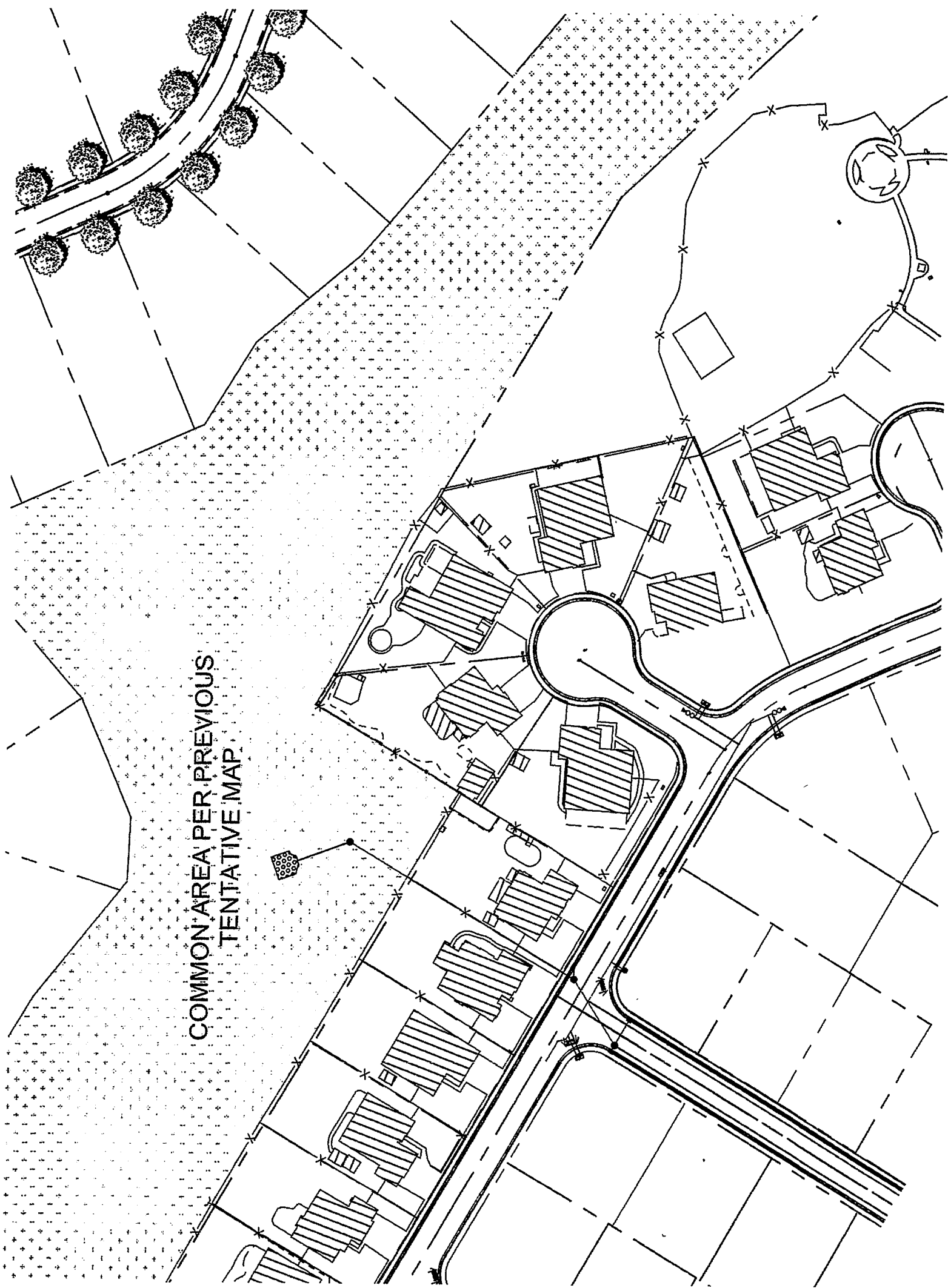
C B MANDOCK
140-140-030

COTTONWOOD CREEK
STATES UNIT NO. 4

CREEK

AREA
(12)

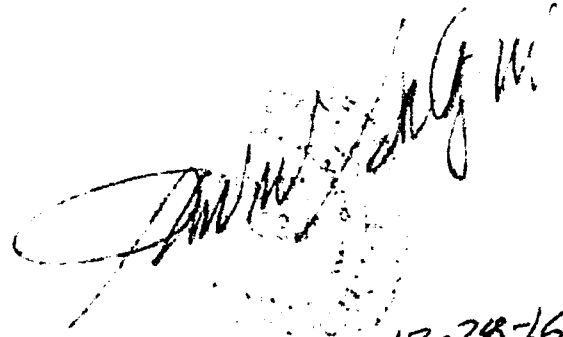
COMMON AREA PER PREVIOUS
TENTATIVE MAP



BAILEY CREEK ESTATES

TRAFFIC STUDY

DECEMBER, 2016



12-28-16
EXP 6-30-18

Prepared by:
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715 H Street
Sparks, Nevada 89431
(775) 358-1004

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BAILEY CREEK ESTATES

TRAFFIC STUDY

EXECUTIVE SUMMARY

The proposed Bailey Creek Estates development is located in Washoe County, Nevada. The project site is located south of Geiger Grade, east of Toll Road and west of Kivett Lane. The project site is currently undeveloped land. The purpose of this study is to address the project's impact upon the adjacent street network. The Geiger Grade/Shadow Hills Drive intersection has been identified for AM and PM peak hour capacity analysis for the existing, existing plus project, 2026 base, and 2026 base plus project scenarios.

The proposed Bailey Creek Estates development will include the construction of a residential subdivision containing 56 single family homes. Project access will be provided from the extension of Shadow Hills Drive south of Geiger Grade. The project is anticipated to generate 533 average daily trips with 42 trips occurring during the AM peak hour and 56 trips occurring during the PM peak hour.

Traffic generated by the proposed Bailey Creek Estates development will have some impact on the adjacent street network. The following recommendations are made to mitigate project traffic impacts.

It is recommended that any required signing, striping or traffic control improvements comply with Nevada Department of Transportation and Washoe County requirements.

It is recommended that the Geiger Grade/Shadow Hills Drive intersection be improved as a four-leg intersection with stop sign control at the north and south approaches. The west approach shall contain an exclusive right turn lane containing 220 feet of deceleration length with a 15:1 taper.

It is recommended that the on-site roadways and cul-de-sacs be designed per Washoe County standards.

INTRODUCTION

STUDY AREA

The proposed Bailey Creek Estates development is located in Washoe County, Nevada. The project site is located south of Geiger Grade, east of Toll Road and west of Kivett Lane. Figure 1 shows the approximate location of the project site. The purpose of this study is to address the project's impact upon the adjacent street network. The Geiger Grade/Shadow Hills Drive intersection has been identified for AM and PM peak hour capacity analysis for the existing, existing plus project, 2026 base, and 2026 base plus project scenarios.

EXISTING AND PROPOSED LAND USES

The project site is currently undeveloped land. Adjacent land generally includes single family dwelling units to the north, south, east and west. The proposed Bailey Creek Estates development will include the construction of a residential subdivision containing 56 single family detached homes. Project access will be provided from the extension of Shadow Hills Drive south of Geiger Grade.

EXISTING AND PROPOSED ROADWAYS AND INTERSECTIONS

Geiger Grade (State Route 341) is a two-lane roadway with one through lane in each direction in the vicinity of the site. The speed limit is posted for 45 miles per hour adjacent to the site. Roadway improvements generally include graded shoulders with solid white edgelines and a double solid yellow centerline.

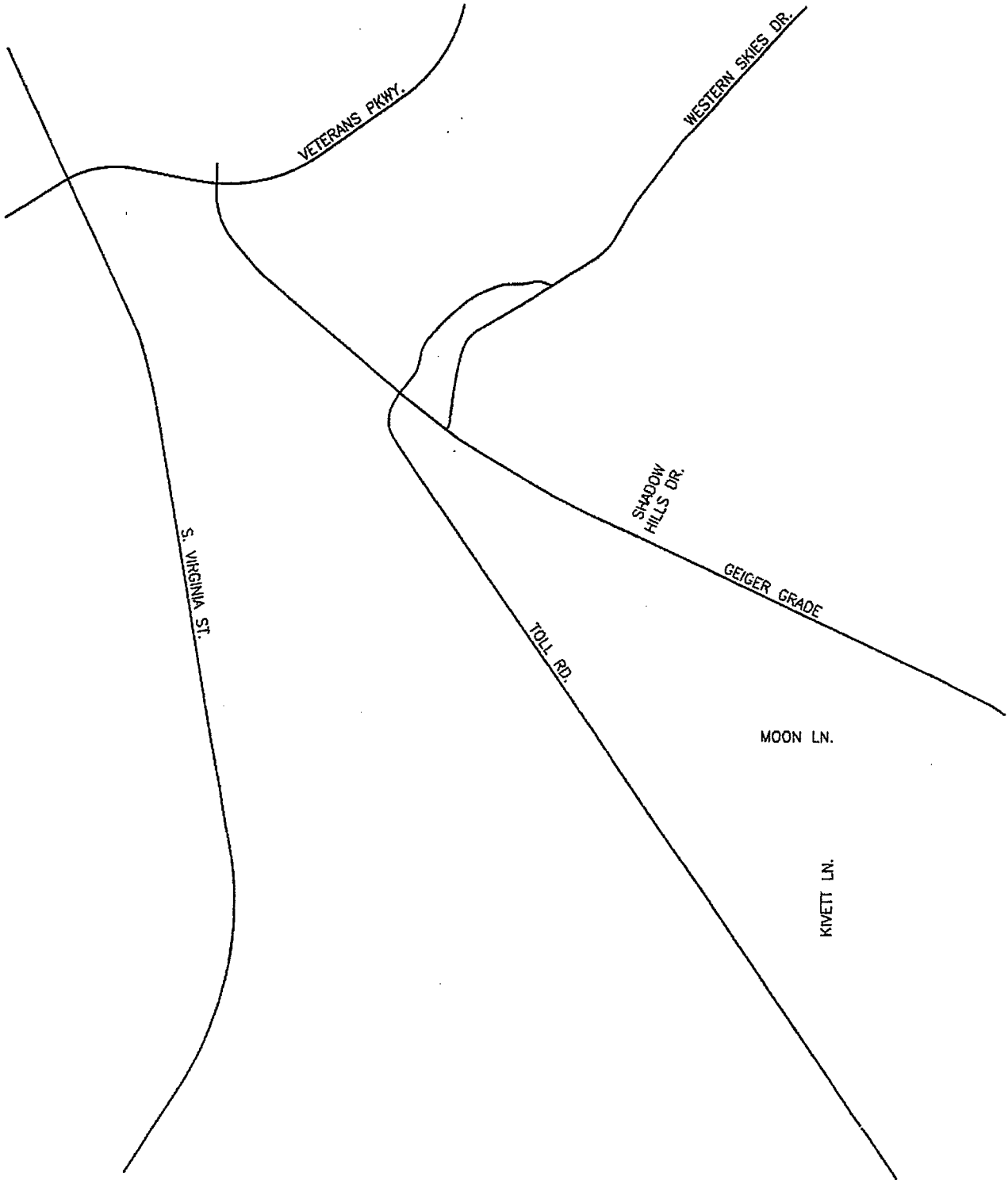
Shadow Hills Drive is a two-lane roadway with one through lane in each direction north of Geiger Grade. The speed limit is posted for 25 miles per hour. Roadway improvements generally include curb and gutter on both sides of the street. With development of the project, Shadow Hills Drive will be extended south of Geiger grade to provide access to the site.

The Geiger Grade/Shadow Hills Drive intersection is an unsignalized three-leg intersection with stop sign control at the north approach. The north approach contains one shared left turn-right turn lane. The west approach contains one shared left turn-through lane. The east approach contains one shared through-right turn lane. With development of the project, the Geiger Grade/Shadow Hills Drive intersection will be improved as a four-leg intersection with stop sign control at the north and south approaches.

LEGEND

PROJECT SITE

N.T.S.



BAILEY CREEK ESTATES
VICINITY MAP
FIGURE 1

TRIP GENERATION

In order to assess the magnitude of traffic impacts of the proposed project at the key intersection, trip generation rates and peak hours had to be determined. Trip generation rates were obtained from the Ninth Edition of *ITE Trip Generation* (2012) for Land Use 210 “Single Family Detached Housing”. The proposed Bailey Creek Estates development will include the construction of a residential subdivision containing 56 single family homes. Trips generated by the project were calculated for an average weekday and the weekday peak hours occurring between 7:00 AM and 9:00 AM and 4:00 PM and 6:00 PM, which correspond to the peak hours of adjacent street traffic. Table 1 shows a summary of the average daily traffic (ADT) and peak hour volumes generated by the proposed development.

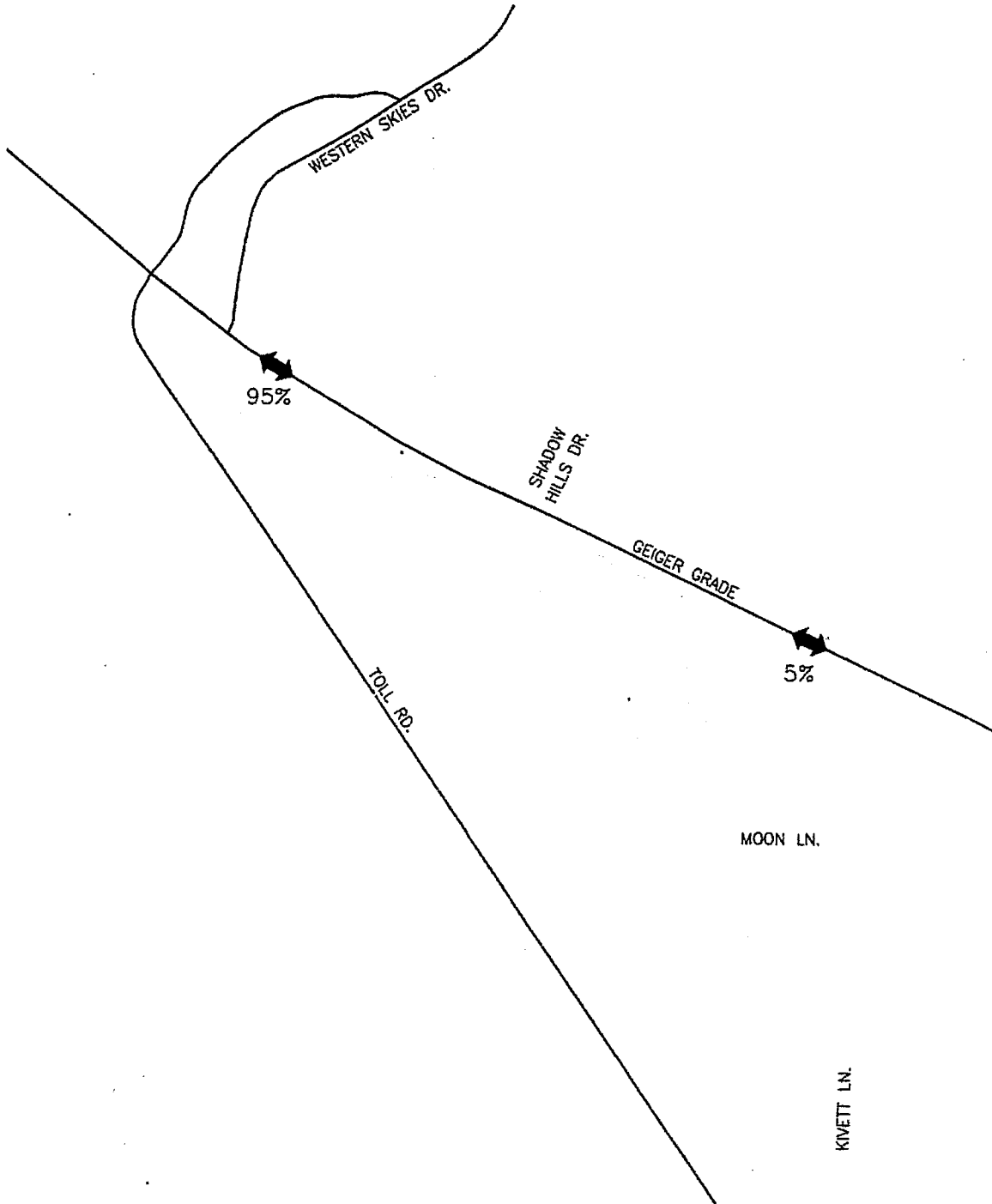
LAND USE	ADT	AM PEAK HOUR			PM PEAK HOUR		
		IN	OUT	TOTAL	IN	OUT	TOTAL
Single Family Detached Housing (56 D.U.)	533	11	31	42	35	21	56

TRIP DISTRIBUTION AND ASSIGNMENT

The distribution of the project traffic to the key intersection was based on existing peak hour traffic patterns and the locations of attractions and productions in the area. Figure 2 shows the anticipated trip distribution. The peak hour trips shown in Table 1 were subsequently assigned to the key intersection based on the trip distribution. Figure 3 shows the trip assignment at the key intersection for the AM and PM peak hours.

EXISTING AND PROJECTED TRAFFIC VOLUMES

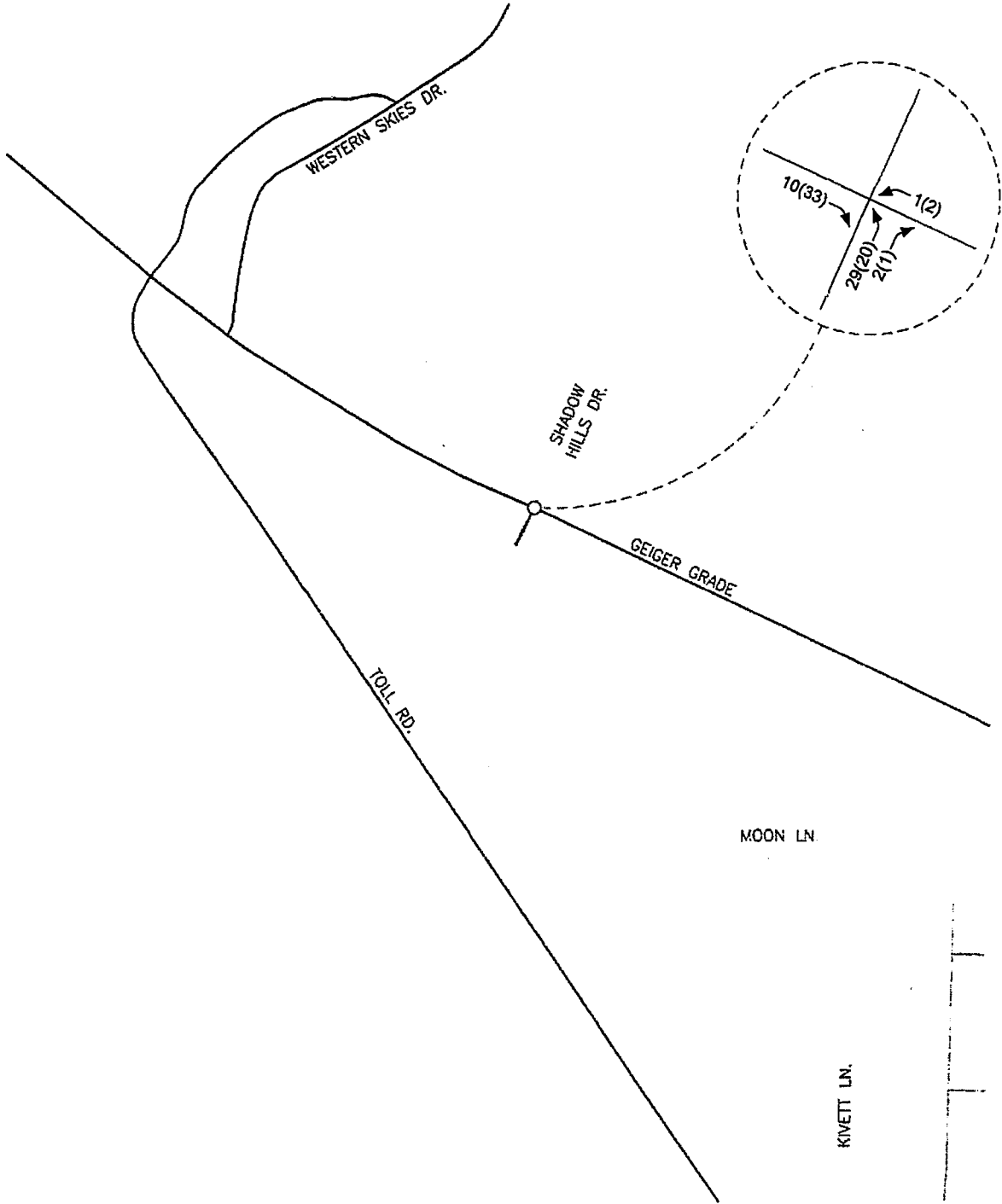
Figure 4 shows the existing traffic volumes during the AM and PM peak hours. The existing AM and PM peak hour volumes were obtained from traffic counts taken in December of 2016. Figure 5 shows the existing plus project AM and PM peak hour traffic volumes. The existing plus project traffic volumes were obtained by adding the project trips to the existing traffic volumes. Figure 6 shows the 2026 base traffic volumes during the AM and PM peak hours. The 2026 base traffic volumes were estimated by applying a 1.0% average annual growth rate to the existing traffic volumes. A negative growth rate was derived from 10-year historic traffic count data obtained from the Nevada Department of Transportation’s (NDOT) Annual Traffic Report for count station 0311031 on Geiger Grade. However, the 1.0% growth rate was used in order to ensure conservative results. Figure 7 shows the 2026 base plus project traffic volumes. These volumes were obtained by adding traffic volumes generated by the project to the 2026 base traffic volumes.



BAILEY CREEK ESTATES
TRIP DISTRIBUTION
FIGURE 2



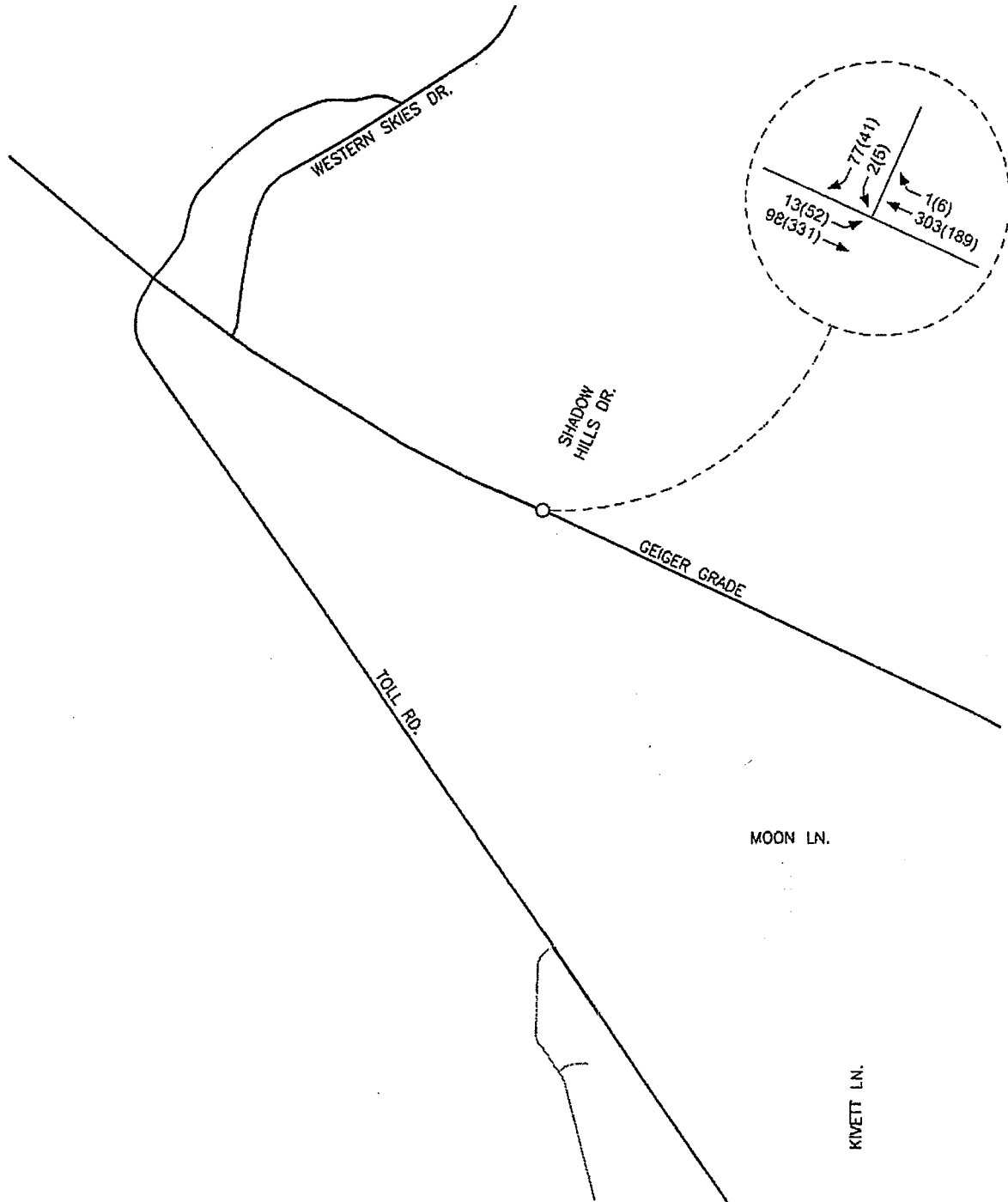
LEGEND
- AM PEAK HOUR
(-) PM PEAK HOUR



BAILEY CREEK ESTATES
TRIP ASSIGNMENT
FIGURE 3

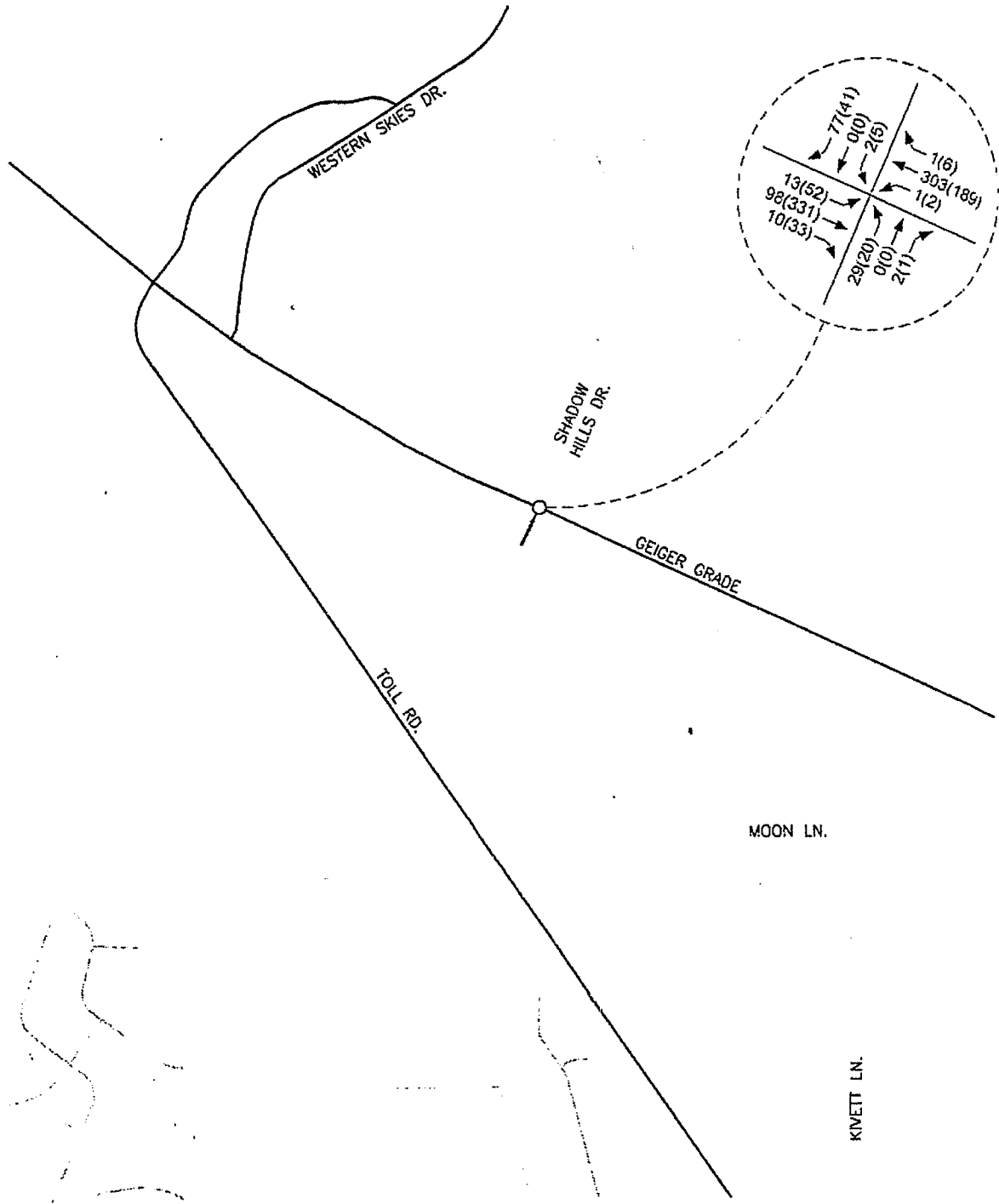


LEGEND
- AM PEAK HOUR
(-) PM PEAK HOUR



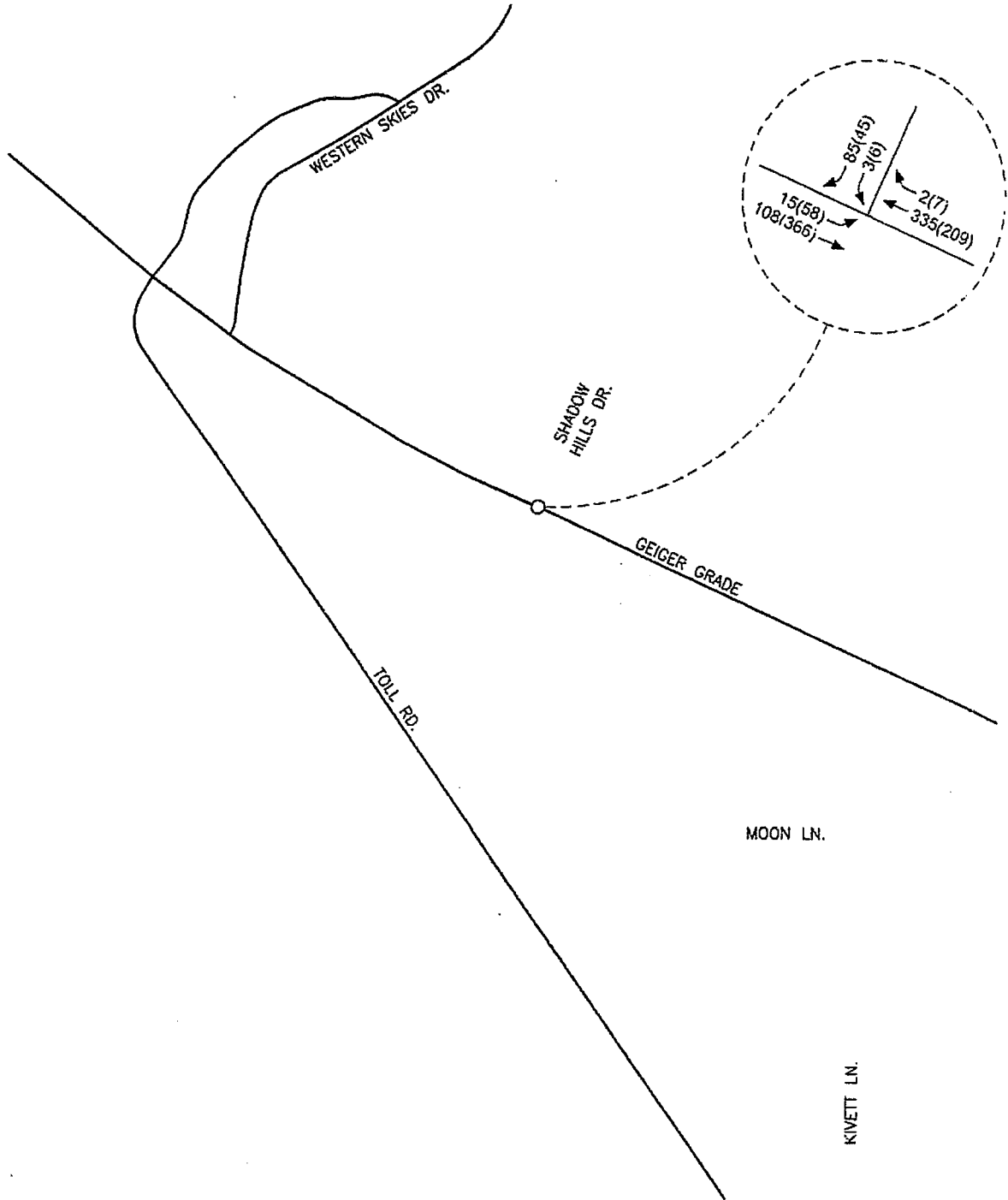
BAILEY CREEK ESTATES
EXISTING TRAFFIC VOLUMES
FIGURE 4

LEGEND
 - AM PEAK HOUR
 (-) PM PEAK HOUR



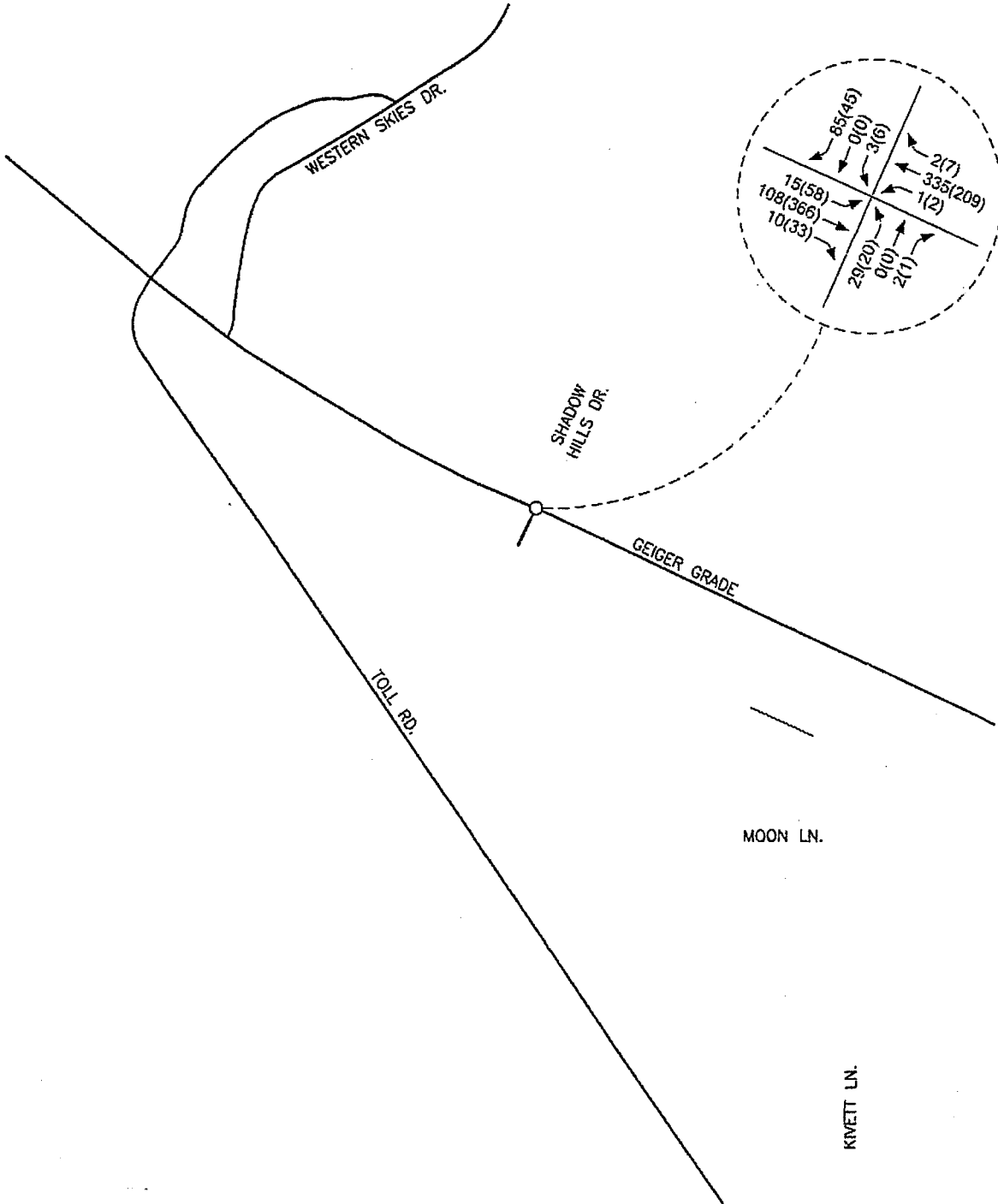
BAILEY CREEK ESTATES
EXISTING PLUS PROJECT TRAFFIC VOLUMES
FIGURE 5

LEGEND
- AM PEAK HOUR
(-) PM PEAK HOUR



BAILEY CREEK ESTATES
2026 BASE TRAFFIC VOLUMES
FIGURE 6

LEGEND
 - AM PEAK HOUR
 (-) PM PEAK HOUR



BAILEY CREEK ESTATES

**2026 BASE PLUS PROJECT TRAFFIC VOLUMES
FIGURE 7**

INTERSECTION CAPACITY ANALYSIS

The Geiger Grade/Shadow Hills Drive intersection was analyzed for capacity based on procedures presented in the 2010 *Highway Capacity Manual (HCM)*, prepared by the Transportation Research Board, for unsignalized intersections using the latest version of the Highway Capacity software. The result of capacity analysis is a level of service rating for each intersection minor movement. Level of service is a qualitative measure of traffic operating conditions where a letter grade "A" through "F", corresponding to progressively worsening traffic operation, is assigned to the minor movement.

The *Highway Capacity Manual* defines level of service for stop controlled intersections in terms of computed or measured control delay for each minor movement. Level of service is not defined for the intersection as a whole. The level of service criteria for unsignalized intersections is shown in Table 2.

LEVEL OF SERVICE	DELAY RANGE (SEC/VEH)
A	≤10
B	>10 and ≤15
C	>15 and ≤25
D	>25 and ≤35
E	>35 and ≤50
F	>50

Table 3 shows a summary of the level of service and delay results for the existing, existing plus project, 2026 base, and 2026 base plus project scenarios. The capacity worksheets are included in the Appendix.

INTERSECTION	EXISTING		EXISTING + PROJECT		2026 BASE		2026 BASE + PROJECT	
	AM	PM	AM	PM	AM	PM	AM	PM
Geiger Grade/Shadow Hills Stop at North Leg								
EB Left	A8.0	A7.8	N/A	N/A	A8.1	A7.9	N/A	N/A
SB Left-Right	B10.8	B10.2	N/A	N/A	B11.3	B10.6	N/A	N/A
Geiger Grade/Shadow Hills Stop at North and South Legs								
EB Left	N/A	N/A	A8.0	A7.8	N/A	N/A	A8.1	A7.9
WB Left	N/A	N/A	A7.5	A8.1	N/A	N/A	A7.5	A8.2
NB Left-Thru-Right	N/A	N/A	B14.2	C17.4	N/A	N/A	C15.3	C19.3
SB Left-Thru-Right	N/A	N/A	B10.8	B10.4	N/A	N/A	B11.3	B10.9

The Geiger Grade/Shadow Hills Drive intersection was analyzed as an unsignalized three-leg intersection with stop sign control at the north approach for the existing and 2026 base scenarios and an unsignalized four-leg intersection with stop sign control at the north and south approaches for the existing plus project and 2026 base plus project scenarios. The intersection minor movements currently operate at LOS B or better during the AM and PM peak hours and will continue to do so for the 2026 base traffic volumes. For the existing plus project volumes the intersection minor movements operate at LOS C or better during the AM and PM peak hours. For the 2026 base plus project volumes the intersection minor movements continue to operate at LOS C or better during the AM and PM peak hours. The intersection was analyzed with the existing approach lanes for the existing and 2026 base scenarios and with single lanes at all approaches for the existing plus project and 2026 base plus project scenarios.

The need for an exclusive westbound to southbound left turn lane was reviewed at the Geiger Grade/Shadow Hills Drive intersection based on NDOT's access management standards. The access management standards list design hour volumes and operating speeds which necessitate the installation of left turn lanes on two-lane roads at unsignalized intersections. The traffic volume movements to be considered include advancing traffic volumes, opposing traffic volumes, and the percent of advancing traffic which is turning left. An exclusive westbound to southbound left turn lane is not required at the Geiger Grade/Shadow Hills Drive intersection based on the 2026 base plus project traffic volumes.

The need for an exclusive eastbound to southbound right turn lane was reviewed at the Geiger Grade/Shadow Hills Drive intersection based on NDOT's access management standards. The access management standards indicates that right turn deceleration lanes are required at Class III accesses (access to land uses that generate 500 or more trips per day) on roadways with speeds greater than 35 miles per hour. A right turn deceleration lane is required at this location since the project is anticipated to generate 533 trips per day and the speed limit on Geiger Grade is posted for 45 miles per hour. The right turn lane should contain 220 feet of deceleration length with a 15:1 taper based on the 45 mile per hour speed limit on Geiger Grade.

It is recommended that the Geiger Grade/Shadow Hills Drive intersection be improved as a four-leg intersection with stop sign control at the north and south approaches. The west approach shall contain an exclusive right turn lane containing 220 feet of deceleration length with a 15:1 taper.

SITE PLAN REVIEW

A copy of the preliminary site plan for the Bailey Creek Estates development is included with this submittal. The site plan indicates that project access will be provided from the extension of Shadow Hills Drive south of Geiger Grade to Sterling Hills Way. Sterling Hills Way will be constructed through the center of the development and, along with Granite Mine Court, will provide access to the individual lots. The site plan also indicates that Moon Lane will be constructed from Sterling Hills Way to the project's east property line. The site plan specifies that an emergency access gate will be constructed on this segment of Moon Lane. It is recommended that the on-site roadways and cul-de-sacs be designed per Washoe County standards.

Spacing requirements were subsequently reviewed for the Geiger Grade project access based on NDOT's access management standards. The access management standards indicate that spacing for unsignalized driveways shall be a minimum of 350 feet based on the 45 mile per hour speed limit on Geiger Grade. The existing Shadow Hills Drive intersection is located approximately 1,250 feet east of High Chaparral Way and approximately 1,000 feet west of an existing driveway serving a convenience store. The 350 feet spacing requirement is met.

RECOMMENDATIONS

Traffic generated by the proposed Bailey Creek Estates development will have some impact on the adjacent street network. The following recommendations are made to mitigate project traffic impacts.

It is recommended that any required signing, striping or traffic control improvements comply with Nevada Department of Transportation and Washoe County requirements.

It is recommended that the Geiger Grade/Shadow Hills Drive intersection be improved as a four-leg intersection with stop sign control at the north and south approaches. The west approach shall contain an exclusive right turn lane containing 220 feet of deceleration length with a 15:1 taper.

It is recommended that the on-site roadways and cul-de-sacs be designed per Washoe County standards.

APPENDIX

Trip Generation Summary - Alternative 1

Project: New Project
 Alternative: Alternative 1

Open Date: 12/22/2016
 Analysis Date: 12/22/2016

ITE	Land Use	Average Daily Trips			AM Peak Hour of Adjacent Street Traffic			PM Peak Hour of Adjacent Street Traffic		
		Enter	Exit	Total	Enter	Exit	Total	Enter	Exit	Total
210	SFHOUSE 1 56 Dwelling Units	267	266	533	11	31	42	35	21	56
Unadjusted Volume		0	0	0	0	0	0	0	0	0
Internal Capture Trips		0	0	0	0	0	0	0	0	0
Pass-By Trips		0	0	0	0	0	0	0	0	0
Volume Added to Adjacent Streets		0	0	0	0	0	0	0	0	0

Total AM Peak Hour Internal Capture = 0 Percent

Total PM Peak Hour Internal Capture = 0 Percent

HCS 2010 Two-Way Stop Control Report

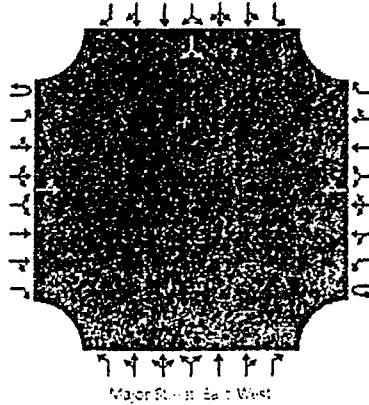
General Information

Analyst	MSH
Agency/Co.	Solaegui Engineers
Date Performed	12/22/2016
Analysis Year	2016
Time Analyzed	AM Existing
Intersection Orientation	East-West
Project Description	

Site Information

Intersection	Geiger & Shadow Hills
Jurisdiction	NDOT
East/West Street	Geiger Grade
North/South Street	Shadow Hills Drive
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound				
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	
Movement	1U	1	2	3	4U	4	5	6	7	8	9			10	11	12	
Priority																	
Number of Lanes	0	0	1	0	0	0	1	0	0	0	0			0	0	0	
Configuration		LT						TR							LR		
Volume, V (veh/h)		13	98				303	1						2		77	
Percent Heavy Vehicles (%)		3												3		3	
Proportion Time Blocked																	
Percent Grade (%)														0			
Right Turn Channelized		No				No				No				No			
Median Type/Storage	Undivided																

Critical and Follow-up Headways

Phase Critical Headway (sec)																
Critical Headway (sec)																
Phase Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

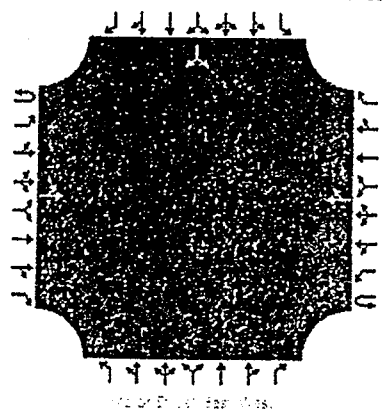
Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		14														86	
Capacity, c (veh/h)		1223														704	
v/c Ratio		0.01														0.12	
5% Queue Length, Q ₉₅ (veh)		0.0														0.4	
Control Delay (s/veh)		8.0														10.8	
Level of Service, LOS		A														B	
Approach Delay (s/veh)		1.0												10.8			
Approach LOS													B				

HCS 2010 Two-Way Stop-Control Report

General Information		Site Information	
Analyst	MSH	Intersection	Geiger & Shadow Hills
Agency/Co.	Solaegui Engineers	Jurisdiction	NDOT
Date Performed	12/22/2016	East/West Street	Geiger Grade
Analysis Year	2016	North/South Street	Shadow Hills Drive
Time Analyzed	PM Existing	Peak Hour Factor	0.92
Intersection Orientation	East-West	Analysis Time Period (hrs)	0.25
Project Description			

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound				
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	
Movement	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12	
Priority																	
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0	
Configuration		LT						TR								LR	
Volume, V (veh/h)		52	331				189	6						5		41	
Percent Heavy Vehicles (%)		3												3		3	
Proportion Time Blocked																	
Percent Grade (%)																0	
Right Turn Channelized		No			No				No				No				
Median Type/Storage		Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		57														50	
Capacity, c (veh/h)		1351														748	
v/c Ratio		0.04														0.07	
5% Queue Length, Q ₉₅ (veh)		0.1														0.2	
Control Delay (s/veh)		7.8														10.2	
Level of Service, LOS		A														B	
Approach Delay (s/veh)		1.4														10.2	
Approach LOS		B															

HCS 2010™ Two-Way Stop Control Report

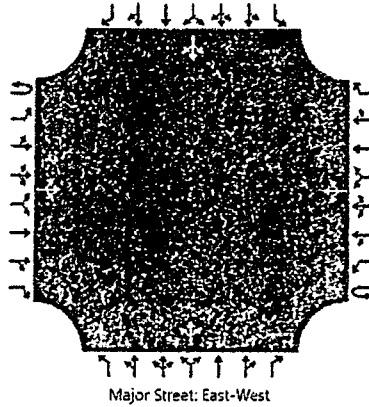
General Information

Analyst	MSH
Agency/Co.	Solaegui Engineers
Date Performed	12/22/2016
Analysis Year	2016
Time Analyzed	AM Existing + Project
Intersection Orientation	East-West
Project Description	

Site Information

Intersection	Geiger & Shadow Hills
Jurisdiction	NDOT
East/West Street	Geiger Grade
North/South Street	Shadow Hills Drive
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound				
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	
Movement	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12	
Priority																	
Number of Lanes	0	0	1	0	0	0	1	0		0	1	0		0	1	0	
Configuration			LTR				LTR				LTR				LTR		
Volume, V (veh/h)		13	98	10		1	303	1		29	0	2		2	0	77	
Percent Heavy Vehicles (%)		3				3				3	3	3		3	3	3	
Proportion Time Blocked																	
Percent Grade (%)										0				0			
Right Turn Channelized		No				No				No				No			
Median Type/Storage	Undivided																

Critical and Follow-up Headways

Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		14				1					34					86	
Capacity, c (veh/h)		1223				1462					423					702	
v/c Ratio		0.01				0.00					0.08					0.12	
5% Queue Length, Q ₉₅ (veh)		0.0				0.0					0.3					0.4	
Control Delay (s/veh)		8.0				7.5					14.2					10.8	
Level of Service, LOS		A				A					B					B	
Approach Delay (s/veh)		0.9				0.0				14.2				10.8			
Approach LOS		B				A				B				B			

HCS 2010™ Two-Way Stop-Control Report

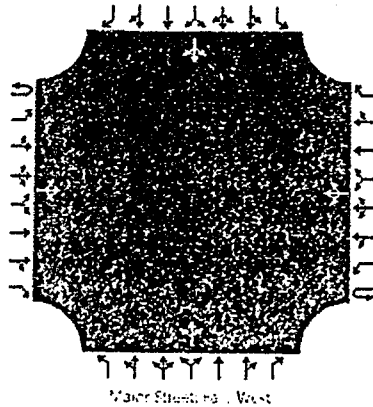
General Information

Analyst	MSH
Agency/Co.	Solaegui Engineers
Date Performed	12/22/2016
Analysis Year	2016
Time Analyzed	PM Existing + Project
Intersection Orientation	East-West
Project Description	

Site Information

Intersection	Geiger & Shadow Hills
Jurisdiction	NDOT
East/West Street	Geiger Grade
North/South Street	Shadow Hills Drive
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound				
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	
Movement	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12	
Priority																	
Number of Lanes	0	0	1	0	0	0	1	0		0	1	0		0	1	0	
Configuration			LTR				LTR				LTR				LTR		
Volume, V (veh/h)		52	331	33		2	189	6		20	0	1		5	0	41	
Percent Heavy Vehicles (%)		3				3				3	3	3		3	3	3	
Proportion Time Blocked																	
Percent Grade (%)										0				0			
Right Turn Channelized		No				No				No				No			
Median Type/Storage	Undivided																

Critical and Follow-up Headways

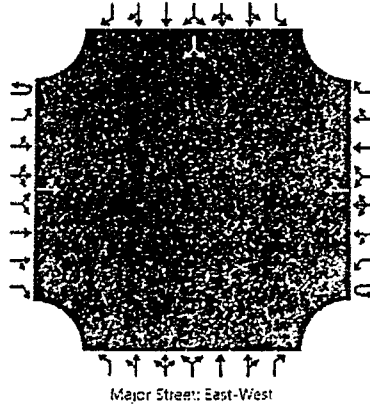
Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		57				2					23					50		
Capacity, c (veh/h)		1351				1156					313					722		
v/c Ratio		0.04				0.00					0.07					0.07		
15% Queue Length, Q ₉₅ (veh)		0.1				0.0					0.2					0.2		
Control Delay (s/veh)		7.8				8.1					17.4					10.4		
Level of Service, LOS		A				A					C					B		
Approach Delay (s/veh)		13				0.1					17.4				10.4			
Approach LOS											C				B			

General Information				Site Information			
Analyst	MSH			Intersection	Geiger & Shadow Hills		
Agency/Co.	Solaegui Engineers			Jurisdiction	NDOT		
Date Performed	12/22/2016			East/West Street	Geiger Grade		
Analysis Year	2026			North/South Street	Shadow Hills Drive		
Time Analyzed	AM Base			Peak Hour Factor	0.92		
Intersection Orientation	East-West			Analysis Time Period (hrs)	0.25		
Project Description							

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Movement	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12
Priority																
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0
Configuration		LT						TR							LR	
Volume, V (veh/h)		15	108				335	2						3		85
Percent Heavy Vehicles (%)		3												3		3
Proportion Time Blocked																
Percent Grade (%)																0
Right Turn Channelized		No			No				No			No				
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

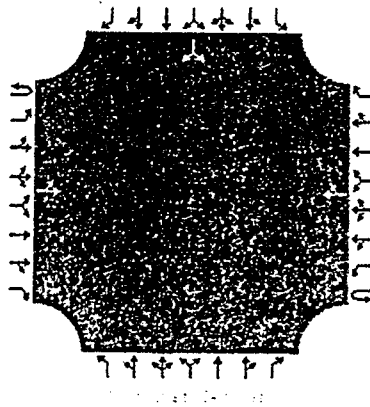
Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		16														95	
Capacity, c (veh/h)		1186														671	
v/c Ratio		0.01														0.14	
15% Queue Length, Q ₉₅ (veh)		0.0														0.5	
Control Delay (s/veh)		8.1														11.3	
Level of Service, LOS		A														B	
Approach Delay (s/veh)		1.1												11.3			
Approach LOS														B			

HCS 2010 Two-Way Stop-Control Report

General Information		Site Information	
Analyst	MSH	Intersection	Geiger & Shadow Hills
Agency/Co.	Solaegui Engineers	Jurisdiction	NDOT
Date Performed	12/22/2016	East/West Street	Geiger Grade
Analysis Year	2026	North/South Street	Shadow Hills Drive
Time Analyzed	PM Base	Peak Hour Factor	0.92
Intersection Orientation	East-West	Analysis Time Period (hrs)	0.25
Project Description			

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound				
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R	
Priority	1U	1	2	3	4U	4	5	6		7	8	9		10	11	12	
Number of Lanes	0	0	1	0	0	0	1	0		0	0	0		0	0	0	
Configuration		LT						TR							LR		
Volume, V (veh/h)		58	366				209	7						6		45	
Percent Heavy Vehicles (%)		3												3		3	
Proportion Time Blocked																	
Percent Grade (%)																0	
Right Turn Channelized		No			No				No				No				
Median Type/Storage		Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)																	
Critical Headway (sec)																	
Base Follow-Up Headway (sec)																	
Follow-Up Headway (sec)																	

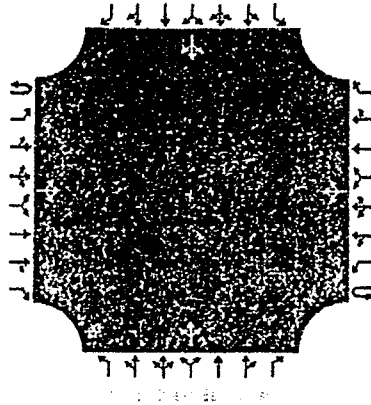
Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		63															56
Capacity, c (veh/h)		1325															696
v/c Ratio		0.05															0.08
5% Queue Length, Q ₉₅ (veh)		0.1															0.3
Control Delay (s/veh)		7.9															10.6
Level of Service, LOS		A															B
Approach Delay (s/veh)		1.5												10.6			
Approach LOS														B			

HCS 2010 Two-Way Stop-Control Report

General Information		Site Information	
Analyst	MSH	Intersection	Geiger & Shadow Hills
Agency/Co.	Solaegui Engineers	Jurisdiction	NDOT
Date Performed	12/22/2016	East/West Street	Geiger Grade
Analysis Year	2026	North/South Street	Shadow Hills Drive
Time Analyzed	AM Base + Project	Peak Hour Factor	0.92
Intersection Orientation	East-West	Analysis Time Period (hrs)	0.25
Project Description			

Plans



Vehicle Volumes and Adjustments

Approach	Eastbound				Westbound				Northbound				Southbound			
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Movement	1U	1	2	3	4U	4	5	6	7	8	9			10	11	12
Priority																
Number of Lanes	0	0	1	0	0	0	1	0	0	1	0			0	1	0
Configuration			LTR				LTR				LTR				LTR	
Volume, V (veh/h)		15	108	10		1	335	2		29	0	2		3	0	85
Percent Heavy Vehicles (%)		3				3				3	3	3		3	3	3
Proportion Time Blocked																
Percent Grade (%)										0				0		
Right Turn Channelized		No				No				No				No		
Median Type/Storage	Undivided															

Critical and Follow-up Headways

Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)		16				1					34					95	
Capacity, c (veh/h)		1186				1450					382					667	
v/c Ratio		0.01				0.00					0.09					0.14	
15% Queue Length, Q ₉₅ (veh)		0.0				0.0					0.3					0.5	
Control Delay (s/veh)		8.1				7.5					15.3					11.3	
Level of Service, LOS		A				A					C					B	
Approach Delay (s/veh)		1.0				0.0				15.3				11.3			
Approach LOS										C				B			

HCS 2010 Two-Way Stop-Control Intersect

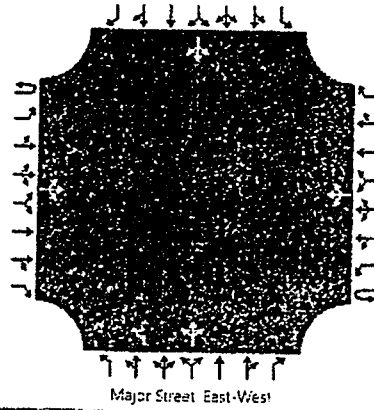
General Information

Analyst	MSH
Agency/Co	Solaegui Engineers
Date Performed	12/22/2016
Analysis Year	2026
Time Analyzed	PM Base + Project
Intersection Orientation	East-West
Project Description	

Site Information

Intersection	Geiger & Shadow Hills
Jurisdiction	NDOT
East/West Street	Geiger Grade
North/South Street	Shadow Hills Drive
Peak Hour Factor	0.92
Analysis Time Period (hrs)	0.25

Lanes



Vehicle Volumes and Adjustments

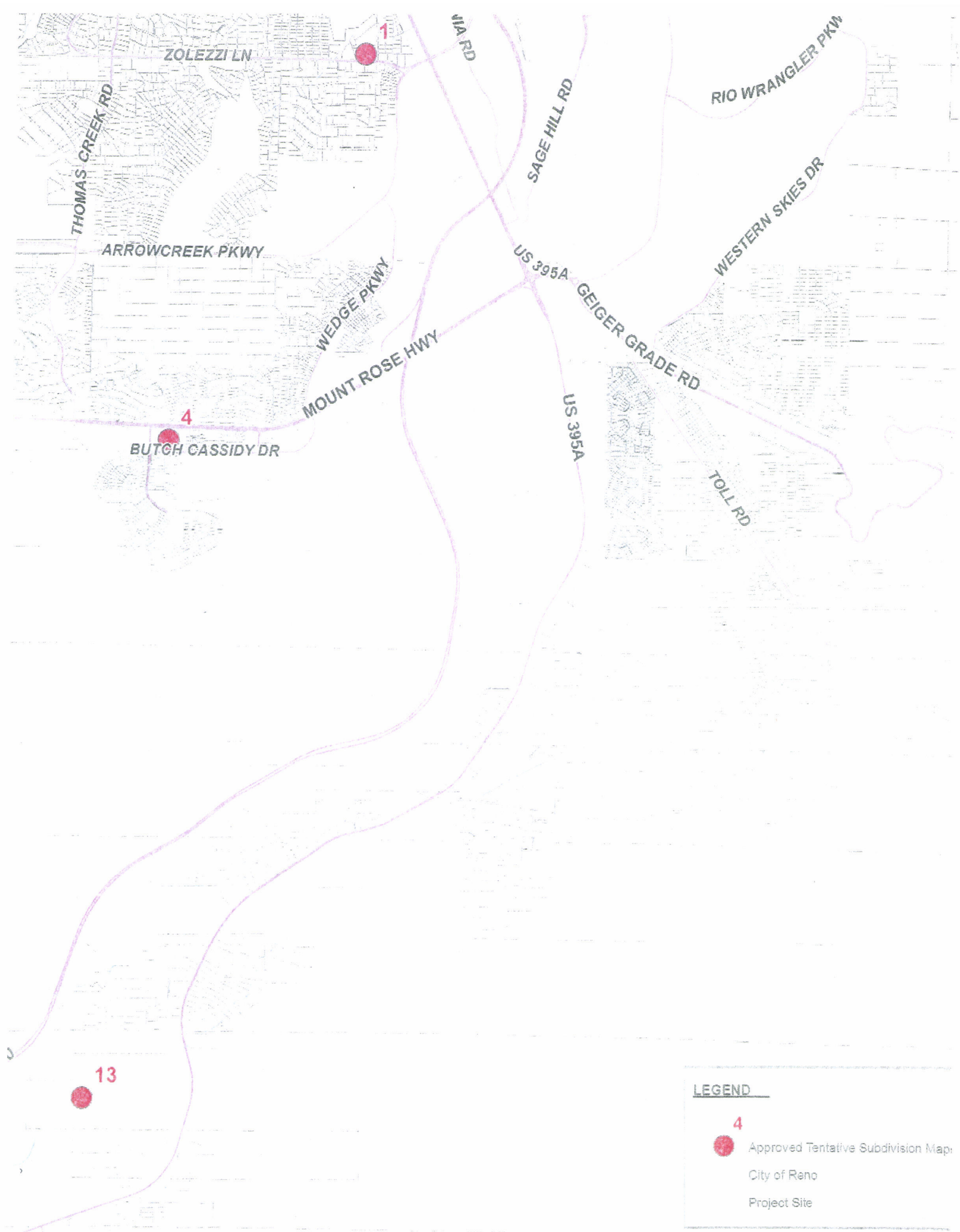
Approach	Eastbound				Westbound				Northbound				Southbound			
	U	L	T	R	U	L	T	R	U	L	T	R	U	L	T	R
Movement	1U	1	2	3	4U	4	5	6	7	8	9		10	11	12	
Priority																
Number of Lanes	0	0	1	0	0	0	1	0	0	1	0		0	1	0	
Configuration			LTR				LTR				LTR				LTR	
Volume, V (veh/h)		58	366	33		2	209	7		20	0	1		6	0	45
Percent Heavy Vehicles (%)		3				3				3	3	3		3	3	3
Proportion Time Blocked																
Percent Grade (%)										0				0		
Right Turn Channelized		No			No				No			No				
Median Type/Storage	Unchannelized															

Critical and Follow-up Headways

Base Critical Headway (sec)																
Critical Headway (sec)																
Base Follow-Up Headway (sec)																
Follow-Up Headway (sec)																

Delay, Queue Length, and Level of Service

Flow Rate, v (veh/h)	Eastbound				Westbound				Northbound				Southbound			
Capacity, c (veh/h)	1325				1119				275				663			
v/c Ratio	0.05				0.00				0.08				0.08			
5% Queue Length, Q ₉₅ (veh)	0.1				0.0				0.3				0.3			
Control Delay (s/veh)	7.9				8.2				19.3				10.9			
Level of Service, LOS	A				A				C				B			
Approach Delay (s/veh)	1.4				0.1				19.3				10.9			
Approach LOS									C				B			



LEGEND

- 4
 Approved Tentative Subdivision Map
 City of Reno
 Project Site

KEY (Label)	PROJECT NAME	CASE #	ORIGINAL APPROVAL DATE	CURRENT EXPIRATION DATE	UNITS APPROVED



WASHOE COUNTY
Planning and Development
INTEGRITY COMMUNICATION SERVICE

Community Services Dept.

ATTACHMENT E 027

ADDENDUM 1 00

To: Washoe County Planning Commission
RE: Addendum to Staff Report for Tentative Map Case No. WTM16-003
(Bailey Creek Estates)
Date: February 2, 2017
Assigned Planner: Kelly Mullin
775.328.3608
kmullin@washoecounty.us

Exhibit D, *Public Comment Letters*

Six public comment letters for Tentative Subdivision Map Case No. WTM16-003 (Bailey Creek Estates) have been submitted to Washoe County since the staff report for this case was distributed to you. The attached letters are considered an addendum to Exhibit D, *Public Comment Letters*. They will be included in the public record as Exhibit D-1 with the staff report.

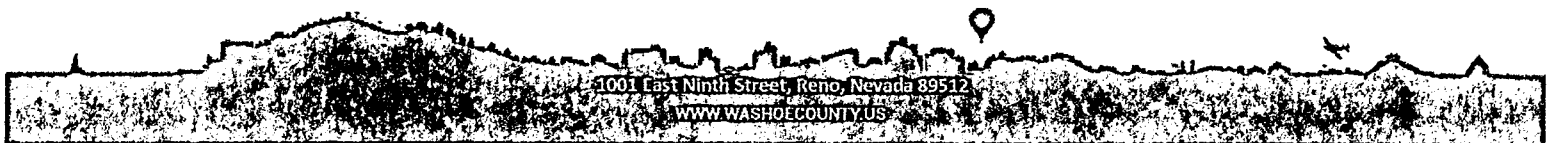
Additionally, we'd like to make you aware of an online petition submitted to Washoe County regarding the Bailey Creek Estates project. That petition is available online at www.change.org/p/kelly-mullin-stop-construction-of-bailey-creek-estates. Comments submitted via the petition website can be reviewed through the link above.

Exhibit H, *Draft CAB Meeting Minutes*

Draft minutes of the January 25, 2017 South Truckee Meadows/Washoe Valley Citizen Advisory Board (CAB) Meeting are now available and have been attached. These minutes will be included in the public record as Exhibit H with the staff report.

Exhibit I, *Applicant Response to CAB Meeting Discussion*

The Southeast Truckee Meadows Area Plan requires the applicant provide a statement responding to input received at the CAB meeting. That statement is attached and will be included in the public record as Exhibit I for the staff report.



January 30, 2017

From: Thomas & Linda Aust

4668 Gold Run Drive

Reno, Nv 89521

RECEIVED
FEB - 1 2017
WASHOE COUNTY
COMMUNITY DEVELOPMENT

To: Kelly Mullin

Washoe County Planning Department

1001 E. 9th St.

Reno, Nv 89512

Dear Ms. Mullin

We are writing you today to express our extreme concern regarding the proposed Bailey Creek Estates project. Once again it seems as though no reasonable consideration is given to what appear to be logical objections to a project like this.

The first objection is water, water, water. Too much or not enough. Just two weeks ago our neighborhood flooded and Toll Road was closed for the better part of two weeks as a result of flooding from Bailey Creek. There will no doubt be adverse effects on this drainage area from the construction of these homes, streets, sewer system, and underground utilities. Will more water be diverted from it's natural path into our neighborhood? Who knows, but it most certainly is a distinct possibility. Next and even more obvious is that with the ever present drought in the west, we are simply one day going to run out of water.

Additionally is the impact on our schools. Brown Elementary, Damonte Ranch High, and Depoali Middle School are GROSSLY overcrowded. More homes mean more students in already overcrowded classrooms. Next year Brown is switching to a year round calendar due to overcrowding. This means that families like ours have one student on year round and one on the balanced calendar. For working families this poses an incredible hardship on family life and work schedules.

Does the developer pay for increased burdens on our schools, fire and law enforcement departments? Probably not. This development is not necessary. There is rampant building taking place on Veterans Parkway that will impact many of the issues we have referred to here as is.

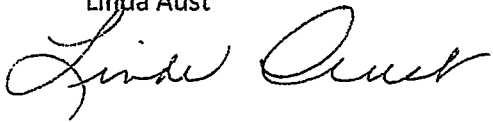
Please do not let Reno become the urban sprawl of Phoenix or even worse, Los Angeles. We need to consider the quality of life to existing residents as well as the impact on our existing precarious infrastructure. Do Not rubber stamp this project.

Thank you for your consideration in this matter.

Thomas Aust

A handwritten signature in cursive script that reads "Thomas Aust".

Linda Aust

A handwritten signature in cursive script that reads "Linda Aust".

From: Elmira
To: Mullin, Kelly
Subject: from Elmira Coker Bailey Creek Estates
Date: Thursday, January 26, 2017 2:07:55 PM

Hi Kelly, we met yesterday during Citizen Advisory Board meeting in regards to Bailey Creek development, which we definitely oppose. So, this are our thoughts why not. I am also attaching photos of the sign and photos of wild horses in the exact area of the site. Please let me know as you promised the time and place of Planning commission meeting on Feb 7th,
Thank you,

Elmira and Randy Coker

To: Planning Commission
Case# WTM-16-003 (Bailey Creek Estate)

01/26/2017

Dear Sirs,

we live in the area of planned development and we strongly object to the proposed project. There are reasons for why we feel that this is absolutely wrong and should not be proceeded with:

- 1) in paragraph 13, page 9 among others is stated that “the site does not appear to be in an area containing.....migration routes....” If it is so, then how is it possible that there is a sign placed by Washoe county right by High Chaparral street on south side of Geiger Grade announcing “Wild Horse area”? There are frequently wild horses in the whole area immediate south of Shadow hills and all the way to Bailey Creek and Toll Rd. I am attaching pictures of the sign and the horses taken some 10 days ago. It hurts me the most thinking that it ’s people from NV who will decide about whether to give this land for development to someone who comes from CA to build houses here. Why? He can care less about animals here, but NV is not CA and homebuilders from that state should stay were they belong. On the other hand wild horses belong here, not to CA and it should stay this way too. This is what makes Nevada Nevada.
- 2) on page 7 under point “i”, it says “there are no public or private trail systems.....”. That’s wrong. There is a trail going from Pizza restaurant, along Bailey creek, turning to the right along Geiger Grade and stopping approximately across gas station and people are walking there, as well as along the dirt road going along Bailey creek east bound. Seems like someone who wrote this document have never stepped his/her foot into this area.
- 3) dubious traffic count from pages 34-35. For some definite reason Solaegui Engineers decided to go out of figure 56 for pm peak hour total, based on 56 lot/houses. The only thing they forgot is that each house will have based on previous houses built by this developer not far from here (Mount Vista) 2-3 car garage, which means at least 2 to 3 cars per household, that’ s what usually families have, at least 2 cars, which means that figure 56 will be at least doubled if not more. On top of that, people coming from proposed development will have to cross incoming traffic lane to head towards freeway, which will promote accidents, since we were told yesterday by developer there will be not lights. When asked Mr. James Smith if Geiger Grade will be widened because of heavier traffic, there was no answer. But I understand the purpose of figure 56 to get under “magical” 80 to avoid traffic study. But why to assume that people are idiots and will buy anything that is attempted to be sold to them? You should also take in consideration the round about and all the traffic coming from Veterans Pkwy, Geiger grade, gas station. Not being built

wide enough, it looks pretty heavy in the morning hours, it will be worse if the development will occur.

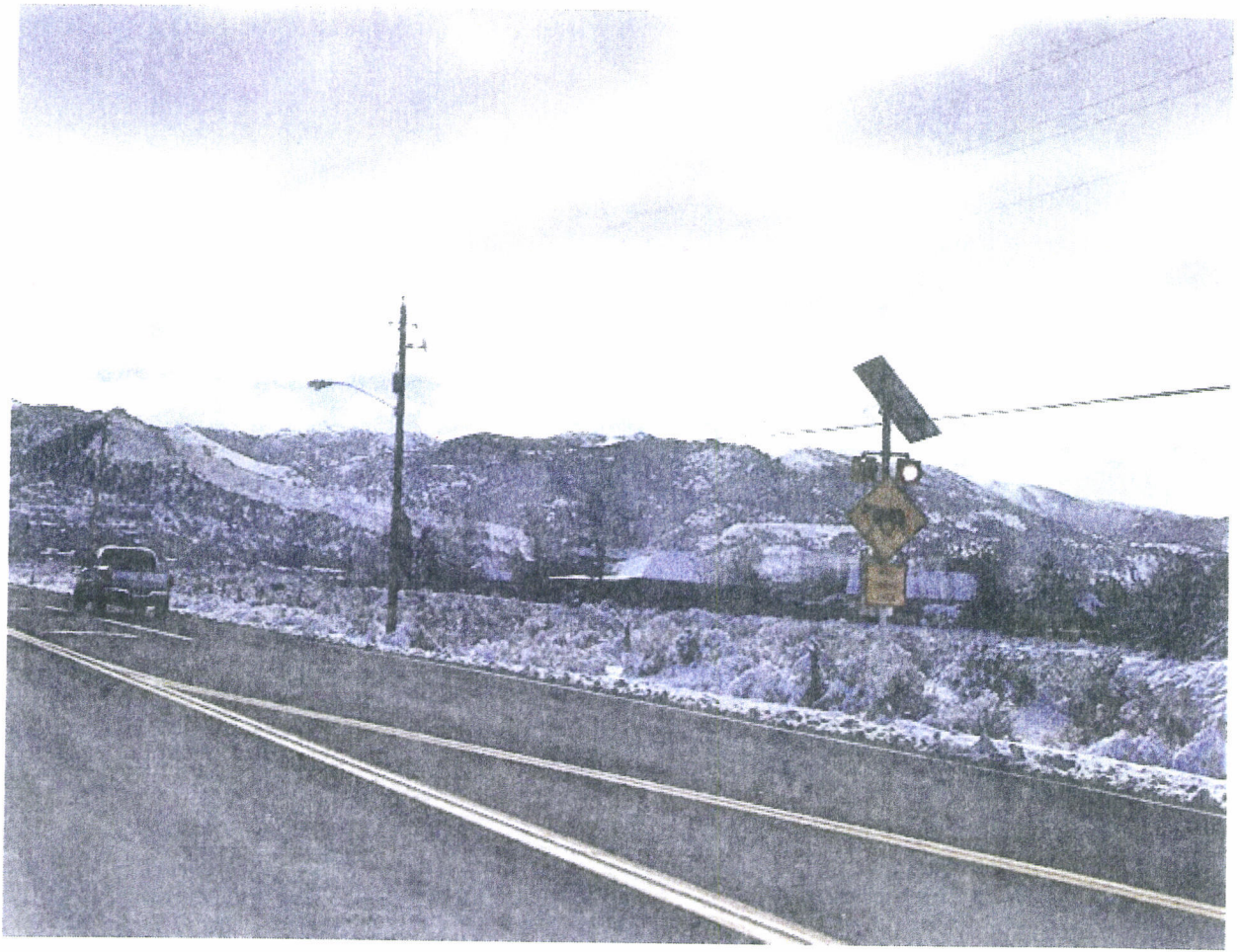
4) questions related to recent flood events. on page 12 , point 25 it is mentioned that the berms will be put in place with fencing along the Geiger Grade, which for me means that more water will be running into culvert on south side of Geiger Grade, which is not adequate to conduct the running water just the way it is now even without additional contributing factors. Toll rd was flooded and closed for a week or more not because drainage system put in place is working perfectly, but because it DOES NOT! Which means the development will contribute to more possible flooding.

Further on, the report prepared by Wood Rodgers company whose rep James Smith was present yesterday on Citizen Advisory Board, states that their "studies indicate the site is well suited for the proposed development" It is amazing, because when asked directly if can assure that the future homes built on the site will NOT BE FLOODED, said he can not state that. Additionally, Wood Rodgers company refer to among others to Summit Engineering top report produced in 2005 saying they provide "updated" geotechnical investigation. Letter is dated 12/14/2016. Let me ask you, "updated" how? It looks more like "renewal". It is not updated based on event of recent three weeks. Worth to mention that Summit Engineering Corporation conclude (page 80) "the findings in this report are valid as of the present date....changes ...can occur....due to natural processes...." Then how is Wood Roger's "investigation" can be "updated" if it does not refer to recent flood event and specifically to area in the vicinity of the site - Toll Rd? Additionally the very FEMA map from Washoe County Zoning provided by Wood Rodgers shows parts of development directly in the flood hazard zone A, zone X and close to flood zone B. And despite of all that the site "well suited" according to Mr. James Smith from Wood Rodgers???? How so?

Maybe one more point to add to that is that when South Meadow was developed, home owners later on had to install sump pumps and moisture barriers in their homes probably because there were excellent recommendations for development as in this case. Will not be surprised if it comes to the same here if this goes forward despite all the warning signs we are seeing....

Our last question is whose interest is represented here to develop this last free piece of land along the Geiger Grade frequented now by beautiful horses that gives the peaceful country feel attractive for many people causing them wanting to move and live there? Certainly not ours, not that of people from the area. We appeal to you to stop this development in the name of our people, our Nevada state and what it stands for.

Attached is the picture of "Wild Horse Area" sign and Wild horses picture on the site.







January 29, 2017

Bob Lucey, Commissioner , blucey@washoecounty.us

Kelly Mullins, Planning, kmullins@washoecounty.us

RE: Case Number WTM16-003 (Bailey Creek Estates)

Mr. Lucey and Ms. Mullins,

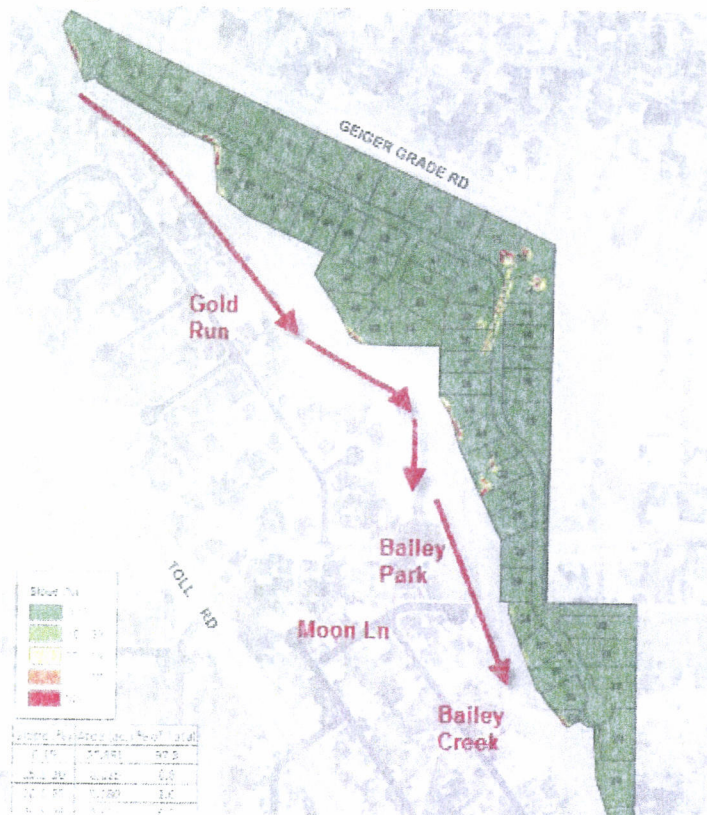
When we bought our home 4 years ago the lot in question was zoned for commercial property. We figured that storage units or potentially a strip mall would be put eventually on the property, not 56 homes. Somewhere along the line we missed where the property was changed from commercial to residential.

These two pictures below are taken from the slider outside our kitchen and from our back yard. As you can see the land behind us is significantly higher than our home. Our first preference is that this subdivision be denied. Our second preference is that there are no two story homes at least along the back part of the development blocking view and invading the privacy of our back yard not be allowed. There is some precedence for this. See this link. <http://www.swvhoa.com/new/wp-content/uploads/2016/06/SWV-HeightRestrictions-16.pdf>



Our other concerns are as follows:

- In the meeting of 1/25, the developer stated that they had completed studies to show that if they added three water retention basins that it SHOULD be all that is needed to contain any extra water caused by the new development. Although major storms only seem to come every ten or so years, SHOULD really is not good enough is it? Does the County plan to do any further improvements to Bailey Creek drainage to prevent issues in the future?
- In this picture you can see that there will no longer be a good path way for people to walk. The pathway will be very close to the drainage ditch. What will the county do to prevent erosion of the ditch from walkers, motor cyclists and kids? In the meeting of 1/25 it was stated that we would need to call Washoe County when there are issues. Why because of a new development does that become my responsibility to monitor who is in the back yard. Can Washoe County do anything to limit or reduce people traffic? Can the CC&R's restrict access to the property by the drainage ditch?



- Right now there are two ways out of our housing division, Toll Road and Kivett. While Toll road was closed the additional traffic on Kivett and higher up on Geiger was significant. Adding a minimum of 95 to 100 additional cars changes this into an everyday event. The additional traffic is bothersome, but does not concern me as much as if there is a fire or a larger storm/flood event that would cause evacuations to the area. The additional traffic/cars added by this sub division impacts escape routes for the current residents. How does the County plan to address this issue?

In conclusion, again I prefer not to have homes in my backyard. If that is inevitable, I am hopeful that the county will provide strict guidelines for the new developments CC&R's as well as not allowing any two story homes.

Please let me know if you have any questions. I can be reached at beachinit15@charter.net or via my cell phone at 775-224-5174 or home phone 775-885-8859.

Thank you for your time and consideration in this matter.

Cris and Larry Damico

From: Ron Ellis- Gmail
To: Mullin, Kelly; Horan, Phil; Donshick, Francine; Prough, Gregory; Chvilicek, Sarah; Chesney, Larry; jib2424@sbcglobal.net
Cc: Berkbigler, Marsha
Subject: Public Input regarding Baily Creek Estates/ WTM16-003
Date: Sunday, January 29, 2017 4:16:45 PM
Attachments: [image001.png](#)

Dear Hon. Commissioner Berkbigler, Planner Mullin, Members of the Planning Commission:

Thank you for the well-developed staff report regarding the aforementioned development.

I am writing to offer my input regarding Bailey Creek Estates. I object to this development based on the following reasons:

1. This area is on limited water resources based on a few local wells operated by TMWA. All of us who share these wells are resources and conservation conscious often allowing our lawns to die or go yellow to save water.
2. One elementary school where the children of these families would likely go, Brown, is already overcrowded. The additional homes would put additional stress on the other elementary school, Hunsberger as well as contribute to overcrowding at the one high-school and middle school that serves the area- DiPaoli Middle School and Damonte Ranch High School.
3. Flooding has been an issue in this area – there is a creek that runs right through these parcels. We would be concerned that building homes on this parcel would either endanger the families that would live in these homes or reroute the flood waters to other homes.
During the recent storms, Toll Road became unusable on multiple occasions forcing residents that already live in this area to use Kivett Lane. During flood times Kivett Lane may become crowded and dangerous for existing residents.
4. Geiger grade is already a dangerous highway. The existing traffic problems would be magnified. My property on High Chaparral would be immediately impacted as would all others on High Chaparral that back up to the highway. Geiger Grade (aka VA City Highway) is already a two lane highway, and very dangerous road. My property as the property of other homes back up to the highway and we would be subject to additional traffic noise and danger.
5. Additional homes would place additional environmental hazards through increased pollution.
6. The additional development, and the families that move in, tend to object to the Virginia Range Horses that roam free, often visiting our neighborhoods. To many of us that understand this was their natural territory, we don't mind. However, we see many people move into these areas and then object to any equine activity. To be sure, the wild horse issue is a complex issue, but combined with the additional traffic driven by such a dense development would cause a safety hazard for both drivers and the Horses.
7. Crime will become an issue with this many more residents. We saw, and did not object to this development when we lived in Las Vegas. We can say first hand, there will be an significant increase in crime. We do not want that and while I can't speak for my neighbors, I would suspect they would agree we do not want more crime in our peaceful neighborhood.

Without question, when this type of development was allowed in Las Vegas, we saw a marked increase in crime in the Blue Diamond Road and Decatur area.

8. In reviewing the staff report, the lots would not be consistent with the existing intent of zoning. Some lots would be as small as .33 acres while most lots are approximately .5 acres on my side of the road.
9. The development is likely to displace wildlife that lives in this area and cause the various annoying critters to seek refuge in already developed lots.
10. The additional homes will place additional demands on fire services and emergency services which already are understaffed with quality first responders and the ability to respond to additional emergencies would be questionable.
11. If approved, the construction of these homes will cause traffic issues, noise pollution and disturb overall tranquility of the otherwise peaceful neighborhood. The Condition imposed allows construction as late as 7 p.m. on weeknights and as early as 7 a.m. on Saturday. Many of the children who attend DiPaoli and Damonte Ranch must go to bed early to rise early to start classes. Very very disruptive to our quality of life. We are exhausted and we will be awakened on Saturday mornings by construction noise. We would at least ask that construction be limited to 8 a.m. to 5 p.m. weekdays only if approved.
12. Finally, while I consider myself pro-business and pro-growth, we must be careful what we allow to happen to Reno. I watched as the Las Vegas Valley suffered many growing pains where population and development outpaced the ability of the infrastructure to support the population. Of foremost concern is the increase in crime. Reno is a hidden jewel. Our area, the SE Truckee Meadows, is the pinnacle of that jewel. There are many sites that are more appropriate for growth, but this is certainly not one of them as the land is scrub land next squeezed between a drainage ditch and a highway unsuitable for building, despite what a California developer wants you to believe- as indicated by the numerous conditions placed on approval if approved.

Therefore, we adamantly oppose the approval of this development going forward. The land is unfit to build on, it would cause stress on schools, water resources, law enforcement and the traffic and sewer infrastructure.

I have identified below my home from the photo in the planning commission staff report. As you can see my property would be directly impacted.

Sincerely,

Ron Ellis
1260 High Chaparral Drive
Reno, NV 89521
775-240-1447



From: Donald Lester
To: Mullin, Kelly
Subject: bailey creek estates
Date: Sunday, January 29, 2017 7:32:23 AM

My name is Donald Lester, I live at 1380 High Chaparral Drive. I will not be able to attend meeting set for Feb. 7th so I am sending some concerns I have about this development.

1. With the recent snow and rain Bailey creek has caused some real problems with Toll Rd. so if we now focus all the runoff from housing into the creek also the situation will get worse.
2. The morning commute with cars trying to get onto Greiger from Shadow Hills can be a race to accelerate fast enough to merge with the heavy flow coming down geiger . Now you want cars from opposite side to try and do same thing without controls. There is also a school bus trying to get on Geiger from Shadow Hills at about 7 AM.
3. With all of these developments (I am also including the large one north of Brown School) the kids are being sent to the established schools that are beyond crowded. Maybe we need to add a \$1500. fee to each new house to help with school expansion.

Thank you for the opportunity to respond



Citizen Advisory Board

Comment Card and Request to Speak

Name: Kathleen Pfaff
Contact (phone, email - optional): F4224x@gmail.com
Citizen Advisory Board:
Date: 1/25/17
Agenda Item Number:

Please Circle One:

I would like to speak

I would like to provide written comment only

Comments (optional):

The development is in a flood area. I don't think it's good for a rural zone, too many houses and people for the already full roads with the flooding, traffic was routed to Kivett, which seems hazardous as the only way out for Toll Rd traffic - adding so more homes seems crazy. Toll Rd. flooding should at least be fixed first. Construction noises! We purchased our home last March because of open land behind us to enjoy a more rural way of life. How do you sell people homes in an area that will flood?



South Truckee Meadows/Washoe Valley Citizen Advisory Board

MEMORANDUM

To: Kelly Mullin, Staff Representative
From: Misty Moga, Administrative Recorder
Re: **Tentative Subdivision Map Case Number WTM16-003**
Date: January 25, 2017

The following is a portion of the draft minutes of the South Truckee Meadows/Washoe Valley Citizen Advisory Board held on January 25, 2017.

7. DEVELOPMENT PROJECTS – The project description is provided below with links to the application or you may visit the Planning and Development Division website and select the Application Submittals page: www.washoecounty.us/comdev/da/da_index.htm.

7A. Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates) – Request for community feedback, discussion and possible recommendation to approve a 56-lot, single-family residential subdivision on two parcels totaling 28.76 acres. The tentative subdivision map is proposed to include lots sizes ranging from a minimum of ± 0.33 acres ($\pm 14,520$ square feet) to a maximum of $\pm .81$ acres ($\pm 21,780$ square feet) with an average lot size of ± 0.41 acres ($\pm 17,869$). The subdivision includes .75 acres of common area for drainage facilities.

- **Applicant:** Silver Crest Homes
- **Property Owner:** Charles Maddox
- **Location:** Immediately south of the intersection of Geiger Grade Road and Shadow Hills Drive
- **Assessor's Parcel Number(s):** 017-520-03 and 017-480-02
- **Staff:** Kelly Mullin, Planner, kmullin@washoecounty.us, 775-328-3608
- **Reviewing Body:** This case is tentatively scheduled to be heard by Planning Commission on February 7, 2017

Stacy Huggins with Woodrogers introduced herself as well as Brian Newman with Silver Crest

Stacy Huggins spoke about the Bailey Creek Estates Tentative Map. She said it meets the Toll Road Character Management Plan and Truckee Meadows Area Plan as well. Additionally, it meets the Washoe County Standards.

- 28.76 acre undeveloped site.
- Located in South Reno, east of Geiger Grade (north)/Toll Road intersection (west). Kivett Drive (east). Surrounding land uses are single family, vacant, commercial.
- Zoning: 2 units to the acre. Stacy showed the zoning map; Hatching on the map show the flooding. The rest of the lots are not in the FEMA flood zone.

New project proposals:

- 56 lots proposed
- Density: 1.95 units per the acre, which is below the 2 per acre that is allowed. $\frac{1}{2}$ acre lots along Geiger, interior are $\frac{1}{3}$ acres.
- Lot matching to that area plan.
- Average lot size is .41 acres.
- Common area for detention and drainage.
- Bailey creek is a common area; not will be impacted.
- This community will be maintained by a HOA.
- Underground storm drain pipe.

- This project will accommodate the flows.
- Utilities are in Geiger Grade, all which have capacity.
- This project didn't meet the threshold for traffic study, but they conducted one anyway. 56 trips is under the 80 trips threshold.
- Primary access is Geiger Grade and secondary Moon lane, which will be gated emergency access.
- NDOT had concerns about people using Kivett, which will only be available for emergency purposes.

Comments:

Mr. Coker said he has noticed the drainage; he said he said the Bailey Creek won't be modified. He said there are parts that are still closed. He asked if this will be a hindrance. Stacy said the flood on Toll Road won't be impacted by this project. The creek won't be impacted. Mrs. Coker asked if the conditions could continue, and Stacy said it could.

Dwayne Smith, Director of Engineering for Washoe County spoke about this project. He said this project is required to mitigate their impacts. Per Washoe County codes, projects will have to mitigate any issues. This is a flood plain. It's to be expected that storm water to enter this area. He said we cannot expect the project to make enhancements above what is already required. Mr. Coker said if we have the same standards, we run into the same problems. He asked what changes will inhibit this from happening again. Dwayne Smith said cold 416 is required to be met for flood and storm water. They have to capture runoff in retention basins. He said we are talking about two separate things – mitigating storm water and the fact this is a flood plain. Dwayne brought a map of the project site. He said there are a lot of flood plains. Unfortunately, the box culvert is full of debris. There were impacts. It's unfortunate. Some impacts were averted, but there will still be impacts. He said they have done research to mitigate flooding in Bailey Valley. He said they envisioned the project to redirect the water sources, but there isn't enough money to fund those projects. Mr. Coker said people will run into the same issues as we have right now. Dwayne Smith said he is confident the engineering meets requirements. There are storm and floods; it's unfortunate how long the storm lasts and water saturates the ground. Mrs. Coker asked about being affected by flood. Dwayne said this project meets requirements. He said he can't say that it will or will not be impacted by floods. Pat Phillips said her creek expanded during the storm. She asked if this area became flooded in the last storm. The developer said the creek was flowing fast, but no flooding. It was staying within its banks.

Lonnie Detrick said she has seen floods for 47 years. She said she has wanted this project, but has concerns. Lonnie showed her property on the map. She said there have been many efforts by the County to create ditches over the years. The flood comes from the Virginia foot hills and flow through this area. She showed where the primary ditch flows. She said Toll Road was already flooded on the 8th. Both ditches down Kivett were full already on the 8th. It was a river in each ditch. The ditches get too full and cover Divett in water. The water comes down all the properties. There isn't nothing the property is going to do to remedy it. She said erosion has taken away the swell ditch that has helped with flooding. She said the hydrological report doesn't show flooding on her property.

The project developer said there are plans for detention basins, and they will be maintained. The drainage ditch will remain a common area. The intent is to create ditches to allow flow to Bailey Creek.

Matthew Mahr said he has maintained his own ditch during the storm. The ditch was full and rushing, but there was still run off onto the driveway. He said he is concerned about shared ditch maintenance. He said there are two sources of water flooding the property. This project isn't responsible for maintaining the ditch all the way up Bailey Creek, but he said he wants to know more about maintenance. The developer said the requirements will be establishment of HOA to take care of that. He said he hopes someone reaches out to the HOA or the County if they are maintaining the ditch, common area and landscaping. Matthew said he is concerned about the grading. Developer said he wants to mitigate what is already happening. The developer said they try not to touch bailey creek and they want to keep it natural.

Cris Damico said she had concerns with access to the ditch. They ditches were at their peak during the storm. If erosion happens, it will become an issue. She said her exit is Toll or Kivett, and it gets congested with additional cars. There isn't a good emergency exit with additional cars. She also asked if there will be two story

houses. Stacy said two story houses are allowed in this proposed development. The homes will be 3,600 square foot in accordance. Stacy said the pedestrian access through the ditch won't be affected by this project.

A public member said he lives on Kivett. The bridge was wiped out during the storm. The creek is a growing organism. It will be going into those properties if no mitigation happens. It wiped out so much and has changed.

Jim Rummig said there is a common theme we are hearing during this project. The development is in accordance with the requirements. The County isn't satisfying the issues with mountain drainage, flood control ditches. You could do a lot with some ditch redesign, deepening, or home elevation. Dwayne Smith said he would be happy to come back if we get this agendized.

Lynnette said there was 5 feet of water. She said Woodrogers, Army Corp of Engineers, BLM, Washoe County all conducted a study. A lot of things could be done to mitigate these issues for cheap. The culverts aren't being cleaned. She said they call the County and it's not being done. There was also a report created. She said it happened because the county reconfigured the creek.

Pat Phillips spoke about the wild horse and wildlife issue coming through the property. She asked if there will be fencing and gates during construction that will keep the wildlife out out and fences to allow them through the fence after construction. Stacy said yes, we will fence them during construction. No current path to enter this site.

Mrs. Coker handed out pictures to the board regarding the wildlife.

H. Darrah asked if the additional development impact and increase the future flooding events. Dwayne Smith said there are detention basins, and there are impacts due to development but those are required to mitigate it. Additional water will be routed to detention basins with the project and get metered out. The post development flows doesn't exceed the predevelopment flows. Mr. Darrah asked about the traffic study and the estimated 56 average trips. He asked about the proposed re-route of Geiger Grade, and how close will that threshold push the re-alignment. Stacy said she doesn't know the timing of the RTC re-alignment. That's a question for RTC.

Kathleen Pfaff said they purchased knowing they will have a beautiful view. She said she doesn't want to listen to construction of the project. She asked how do they develop homes and sell them knowing what they are up against. She said part of the beauty of south Reno the rural and peaceful. She said how can put in 56 houses and not disrupt an entire community to develop something.

Lonnie spoke about an easement road. She said if the south parcels are developed, she won't have emergency access. She needs an alley or gated road in case of emergency. In respect to the view, her property has a view of Mt. Rose. If houses are put in, it will block the view if the homes are two story. She said she will fight it. And if the homes are elevated, the view will be blocked. People cannot plant trees to block the view of Mt. Rose. She was concerned for utilities. Lemmon Valley is being required to hook up to sewer. She wants to know if they will have to be hooked up to sewer. She said she never saw wild horses. The horse are feral , not wild because they were not sterilized in the past.

Marsy asked about the timing. Jim said this project will go before the planning commission on February 7th. It won't be 2018 would they be building houses. Jim reviewed the recommendation process. Jim said Washoe County has all the information on the website. Stacy said 7am – 7pm would be the construction hours, Monday through Saturday.

Mr. Coker wanted to know who to speak to with those comments. Kelly Mullin introduced herself and invited all comments directed to her.

MOTION: Steven Kelly moved to forward all comments to the Planning Department. Jason Katz seconded the motion. The motion passed unanimously.

cc: Jim Rummings, Chair
Bob Lucey, Commissioner
Al Rogers, Constituent Services
Sarah Tone, Constituent Services



February 1, 2017

Ms. Kelly Mullin; Planner
Washoe County Community Services Department
VIA EMAIL

**RE: Bailey Creek Estates
South Truckee Meadows/Washoe Valley Citizen Advisory Board Summary**

Kelly,

In accordance with SETM Policy 2.4, the following is a statement regarding the January 25, 2017 South Truckee Meadows/Washoe Valley CAB meeting regarding Bailey Creek Estates (WTM16-003).

Bailey Creek Estates (Case Number WTM16-003) was presented to the South Truckee Meadows/ Washoe Valley Citizen Advisory Board (CAB) on January 25, 2017. A brief presentation was provided to the CAB and residents by the applicant's representative (Stacie Huggins, Wood Rodgers). Following an overview of the project specifics, the item was opened for public comment. There were approximately 10 residents that spoke during public comment with conversation primarily focused on the recent flood event and issues related to the Bailey Creek drainage. Washoe County Engineering Director, Dwayne Smith attended the meeting and answered questions related to the proposed project as well as issues regarding drainage related to the larger Bailey Creek watershed. As a result of the recent flood event, there were several concerns related to regional drainage issues in this area. This topic was not agendaized for this meeting so Mr. Smith suggested that the CAB add an agenda item to a future CAB meeting where the topic could be discussed in greater detail.

Specific to the Bailey Creek Tentative Map request, the following items were discussed (1) drainage, (2) traffic and access, (3) wildlife migration, (4) utilities, and (5) viewshed impacts resulting from building height and potential tree locations. A response to each concern is provided below:

- 1) Drainage - The applicant's representative explained that the Bailey Creek Estates project has been designed to address drainage directly associated with the project by including common areas that will serve as detention areas when necessary. Neighbors located along the eastern boundary of the project asked if there would be ditches along the rear lot lines to perpetuate existing drainage channels and if so, who would maintain the ditches. The applicant's representative responded that a drainage ditch would be provided along the entire eastern boundary to direct drainage toward the common/detention areas. It was further clarified that it will be the responsibility of the Homeowner's Association or individual property owners to maintain the ditch located on the project site.*

The applicant's representative further explained that the project has been designed in accordance with Washoe County Engineering and Drainage requirements. Generally, the concerns voiced by the neighbors regarding drainage were not specific to this project but rather were focused on regional issues.

- 2) Traffic and Access - Primary access is proposed on Geiger Grade with secondary, gated emergency access, at Moon Lane. This secondary access at Moon Lane will not be utilized unless an emergency prohibits access to Geiger Grade via the Shadow Hills Drive access point. Under normal circumstances,*

traffic from this project will not utilize Moon Lane or Kivett Drive. The emergency access is required for secondary fire access to the site should the main entrance be blocked. The emergency access is not intended for flood evacuation uses as no flooding events have occurred blocking Geiger Grade at the proposed main entrance. Therefore project traffic should not impede emergency evacuation for those who cannot use Toll Road during excessive flooding.

One resident adjacent to the southern tip of the project thought they may have legal access onto the site and asked that they continue to have access for emergency purposes if so. The title report was reviewed prior to design for any such issues. Subsequent to this resident's comments the report was reviewed again and it is confirmed that no parcels along the entire eastern boundary of the site are being accessed via legal easement or prescriptive easement across or through the proposed project site.

With regard to traffic impacts, according to a traffic analysis prepared by Solaegui Engineers, this project is anticipated to generate 56 PM peak hour trips which will have some impact on the adjacent street network and Geiger Grade. To address additional traffic on Geiger Grade accessing the proposed project, a right turn eastbound to southbound deceleration lane will be constructed within the existing 100 foot right-of way on Geiger Grade. Based on the traffic analysis, this project does not trigger any additional improvements along Geiger Grade, specifically stop lights or widening of the roadway.

- 3) Wildlife Migration - With regard to horses currently migrating across the project site to access Bailey Creek, the subject site is NOT identified as migration path and therefore a perpetuated migration path across the site was not provided.*
- 4) Utilities are located in Geiger Grade and can be extended to serve the project without impacting the adjacent properties.*
- 5) In accordance with SETM Policy 2.7 homes in this subdivision will match the adjacent building type (single story/multi-story). With regard to tree placement and height blocking adjacent property views, the Washoe County Development Code requires one tree in each front yard of a new subdivision. However, the Development Code does NOT restrict the amount of landscaping in rear yards, including location, count or height.*

We believe we addressed the questions/comments voiced by the residents at the CAB meeting and that this project, as designed, should be considered acceptable for this site.

If you need anything else or have any questions, please do not hesitate to contact me.

Sincerely,



Stacie Huggins
Associate
Wood Rodgers, Inc

From: [Stark, Katherine](#)
To: [Stark, Katherine](#)
Cc: [Emerson, Kathy](#); [Mullin, Kelly](#); [Webb, Bob](#); [Edwards, Nathan](#)
Subject: Additional public comment for Bailey Creek
Date: Tuesday, February 07, 2017 1:46:06 PM
Attachments: [Bailey-Creek-public-comment-after-addendum-before-PC.pdf](#)

Good afternoon, Planning Commissioners.

This is most likely the final email I will send you before tonight's meeting. Please see the attached addendum for Bailey Creek (WTM16-003), which is item 9B on the agenda. I will also be providing hard copies of this addendum for you at the meeting.

Thanks!

Katy Stark

From: Mullin, Kelly
Sent: Tuesday, February 07, 2017 12:45 PM
To: Stark, Katherine; Emerson, Kathy
Cc: Webb, Bob
Subject: Additional public comment for Bailey Creek

Katy and Kathy,

Attached is a compilation of 11 new public comment letters. This includes all letters received after the addendum was published and up until noon today. Can you please provide to the Planning Commission at tonight's hearing and add to the public record (with copies for tonight)?

Thank you,
Kelly

Kelly Mullin
Planner | Washoe County Community Services Department
kmullin@washoecounty.us | (775) 328-3608 | 1001 E. Ninth St., Bldg. A, Reno, NV 89512



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From: KEN BROCK
To: bwhittney@washoecounty.us
Cc: [Mullin, Kelly](#)
Subject: Bailey Creek Estates
Date: Monday, February 06, 2017 10:35:21 AM

Gentlepeople,

On Dec 8, 2015, my wife and I arrived in Reno from our move from the Tampa, FL area. Since we had not previously purchased a home, we moved in with our son, his wife and 2 young children. We began to search for a home to purchase. Our realtor set about to find us a home, We looked at available homes. The search began after New Years. Most everything we were shown, within our price range was in areas where the homes were too close for our likes.

Finally in March, we were shown a home in the Virginia Foothills area, on Chamy Drive, off Geiger Grade. The home had been in foreclosure for over 2 years and we had to pour a lot of money in the interior.

Now, for us to learn 50 some odd homes may be built, not to even mention a new tract of homes are planned for the area across from Brown School, already over crowded, is not to our liking.

We were so excited to learned wild horses roamed our area. This was almost unbelievable for us. Now, the areas where the horses roam and feed, is threatened. Please help protect these areas for the horses by denying these permits in the Bailey Creek area.

Now, I haven't even mentioned the impact of more cars in that area. There are many senior citizens in our community and more cars will pose a problem for us.

I know \$\$\$\$ talks loudly, but have a HEART for the horses. This is something that not many people can brag of having near them.

Sincerely,

Ken A. Brock
775-453-9693

From: Kari Coleman
To: Mullin, Kelly; Lucev, Robert (Bob) L; Smith, Catherine
Subject: Bailey Creek Estates
Date: Tuesday, February 07, 2017 9:14:28 AM

To Whom it May Concern:

As a resident of the Toll Rd/Geiger Grade area for the last 10 yrs +, I wholeheartedly oppose the building of the Bailey Creek subdivision for the following reasons:

1. Our schools are tremendously overcrowded; Brown ES just had to adopt a MTYR scheduled to be able to accommodate existing students. Where will the children from this subdivision go to school?
2. Traffic congestion is already reasonably heavy in that area. The proposed 56 homes could possibly bring an additional 112 vehicles through the neighborhood which will result in traffic delays and more problems with the already poorly designed roundabout intersection. In the last few years we have had several instances where 395 was closed due to fires and traffic was routed through Virginia City, down Geiger into Reno. When this occurred, traffic was backed up at least 4 miles from 395. What about event traffic and tourist season? Every year we are inundated with motorcycle traffic during Street Vibrations. Will the increased residential traffic bring a stop to the much needed tourist income to Virginia City? Kivett was used repeatedly as the only access to the area after the Crane Ditch (Toll Road) flooded. It would appear based on continual flooding that Washoe County has not been able mitigate this issue... how is the addition of 56 homes going to make this problem any better?
3. The presence of wild horses in this area makes the additional traffic even more of a hazard. The horses cannot be controlled. We will have more horse vs vehicle accidents not to mention taking away their natural grazing areas will push them farther in to residential neighborhood in search of water and food.

Please do not let the plans for the subdivision to continue!

Sincerely,

Kari Coleman
310 Scorpio Circle
Reno, NV 89521
775.313.1906

Subject: Tentative Subdivision Map Case Number WTM16-003 (Bailey Creek Estates)

Applicant: Silver Crest Homes

Agenda Item Number: 9B

Project Summary: 56-lot single-family residential common open space subdivision

Re: Support Development and Urge Approval but with Request for Additional Conditions & Considerations

Submitted by: Lonnie Edwards-Detrick, 15111 Kivett Lane, Reno, NV

I am a third generation Native Nevadan and a 47-year resident of Washoe County. Parcel 071-017-06 (15111 Kivett Lane formerly 16170 Kivett Lane) has belonged to my family for approaching 50 years and abuts the proposed development on the southeast edge of the proposed site (Bailey Creek Estates, Lots 23 & 24). (see Exhibit A attached)

Silver Crest Homes and Tim Lewis communities, according to their website, is a "quality home builder with a commitment to being the region's top home builder in overall homeowner satisfaction," and I conditionally welcome them as a neighbor. It is my hope that the addition of their community will influence those nearby to take more pride in their own property and bring a better sense of community and pride of ownership to the Kivett Lane area. It is also my hope that, with the addition of the moderate to up-scale community, Kivett Lane and its residents will become a more integral part of SETM community in the eyes of County, and the sense of being the unwanted step-children and/or outcasts will diminish.

That said, **I do have the following issues/concerns/questions/condition requests** that directly relate to the project (Lots 23 & 24) abutting my parcel (and the parcels located to my north & south) and request that the following be thoroughly considered and perhaps added to "Conditions, Amendment A". Additionally, the property owners of the parcels to my north & south (parcels 017-071-05 and 017-071-09 are in extenuating circumstances and a state of transition (i.e. death and health issues) that most likely will not permit them to comment on their own behalf, so I feel compelled to speak accordingly.

Issues/Concerns/Questions/Condition Requests & SETM Goals:

1. **Emergency Access Ingress/Egress:** SETM Pg. 6, "Toll Road Community" "**Wild fires** have burned through this area...", "health and safety is very important..." "**additional means of ingress and egress**" (see Exhibit B, SETM Pg. 6)
 - a. This development will block my parcel as well as parcels 017-071-05 & 017-071-09 without providing for any additional means of egress in the event of a wildfire.
 - i. Will there be a 12' gravel road adjacent to the v-ditch as denoted by Staff Report's "Condition 'y.' in Exhibit A and Exhibit E – "V-Ditch to be located on the eastern side of the development." If so, could this be used as a gated emergency wildfire egress? (see Exhibit A & D attached)
2. **Blending Development:** SETM Pg. 3, "Future growth in area will be managed to **minimize negative impacts...**", "**blending development with existing development.**" SETM 2.7, "Dwellings in new subdivision must match the adjacent building type...", (Exhibit E & F & H attached)
 - a. **Minimize Negative Impacts & Blending:** Two lots (23 & 24) on the project's southwest boundary will abut my property. The typical roof pitch of a mobile/manufactured home is 3/12 to 4/12 or 15' to 18' in height. A single-story home with an 18/12 pitch could

potentially be up to 35' high – the height of a two-story home. What will the roof pitch and home height be on these new homes and will a single-story height of up to 35' be permitted? (Exhibit G & H)

- i. Model Homes Elevations should be included in Tentative Map Application for consideration by Planning Commission. Currently, Silver Crest is building homes with high-pitched roofs in both their Monte Vista and Highland Ranch subdivisions and could potentially see fit to place similar homes with similar roof pitch in Bailey Creek Estates, thereby by-passing SETM 2.7 Rule & Planning Commission Consideration and/or Conditions because they are "single-story". (see Exhibit I attached).

3. **Preservation of Mountain View & Minimize Negative Impact:** SETM Pg. 3, Pg 5. & Pg 7.

"Preserve... Mountain View..." : Baily Creek Lots 23 and 24 roof pitch/elevation and landscaping vegetation will directly and greatly negatively impact my mountain view. Parcel 071-017-06 has been in my family for nearly 50 years and has enjoyed unobstructed views of Mt. Rose and the Carson/Sierra Nevada Range for nearly 50 years (Exhibit E, J & K & P attached)

- i. **View Consideration & Vegetation Impact in CC&R's:** Silver Crests Monte Vista development off the Mt. Rose Hwy denotes view consideration in the CC&R's It would be neighborly and a sign of good will if the developer would add the same or similar language to their CC&R's as currently in place at Monte Vista development, and include consideration for their neighbors to the east, including my parcel. It is requested that language in "Condition 'r'" include the "view" language in the Bailey Creek CC&R's (Exhibit L & M attached)
- ii. **Minimize Negative Impact:** See above Item 2.a. above.
- iii. **Silver Crest & View Consideration:** Silver Crest recognizes the value of a view & demonstrates same on their website with statement such as "These homes offer Valley-sierra views, view of open-space – hillside views." & "incredible views". (Exhibit N)
- iv. **Condition "x" of Staff Report:** Request similar consideration be given to view retention as with "Condition "x" placed on applicable final map and a disclosure made by the developer to affected homebuyers. (see Exhibit H attached)

4. **Drainage, V-Ditch, & 12' wide Gravel Road:** SETM pg. 23. **"Development in the Southeast Truckee Meadows planning area will mitigate any increase in volume of runoff"** (see Exhibit O attached)

- a. **Drainage:** Staff Report, Exhibit E, V-Ditch: "Offsite flows from MDS parcels will be picked-up in v-ditches located on the project's east boundary." Request a more detailed description of v-ditch, including site location, material & depth. (see Exhibit D attached)
 - i. Steve of Wood Rogers indicated at the CAB Meeting that the ditch will be concrete, yet Silver Crest representative Brad pushed back on this suggesting riprap.
 1. County Engineering and Capital Projects Division Representative Leo Vesely indicated the ditch will be concrete as discussed in a recent phone conversation.
- b. **12' wide Grave Road:** Exhibit A "Condition 'y'", "All drainage facilities located within Common Area shall be constructed with an adjoining minimum 12' wide gravel access road."

- i. Does this Condition apply to the v-ditch? (see Exhibit C attached)
 1. If no, how will it be maintained in accordance with "Condition 'u'?"
 2. If yes, can road be used as an emergency egress to Moon. See Item 1, Emergency Egress, above?
 3. If yes, can road eventually be used for MDS to east of project to tap into Public Services such as natural gas and sewer?

Additionally, the CAB Memorandum failed to mention my major concerns and points brought up during my three minutes of allowed speaking time and DID NOT thoroughly represent my points. Kivett Lane (NOT "Divet Lane" as denoted in CAB Memorandum") flooding and the Hydrologic Report was merely one of my many speaking points -- which included Emergency Egress and Structure Height, View Considerations and V-Ditch/Swale questions, yet "flooding" was the only comment addressed in the CAB Memorandum -- this is very disconcerting to me.

The developer may be my neighbor but they may possibly not be my friend as demonstrated by their attempt to make my neighborhood a denser community by proposing an amendment to the Master Plan and the attempt to by-passing the County by approaching the City of Reno for annexation.

Thank you,

Lonnie Edwards-Detrick

Exhibit A: Bailey Creek Estates, 15111 Kivett Lane , Parcel 017-071-06

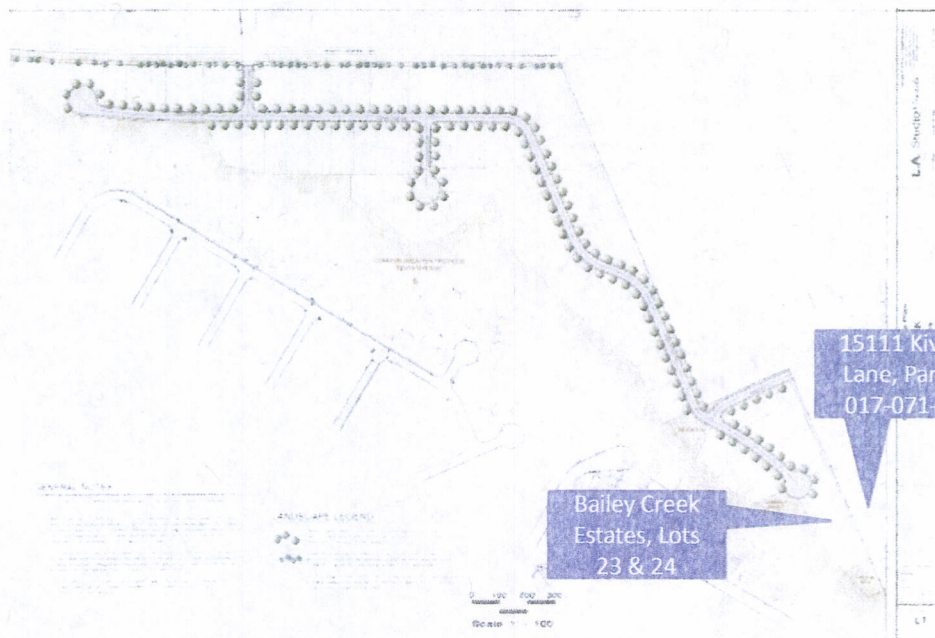


Exhibit B: SETM Area Plan Toll Road Community, Pg. 6 Ingress and Egress for Wildfire

The **Toll Road Community** is bordered on the west by the City of Reno and U.S. 395 and on the north by SR 341 and the Virginia Foothills community. The steep sparsely populated Virginia Range is to the east and the Steamboat Valley area to the south. The Toll Road community is a low-density suburban residential community, with a more rural atmosphere than the neighboring Virginia Foothills area. The area is a combination of older homes, newer subdivisions and manufactured home subdivisions located on the western edge of the area. The roadways in the Toll Road community are both paved and un-paved some with curb and gutter and most with V ditches. The residential street network is easily accessed from SR 341, Toll Road and Kivett Lane. A portion of the residential housing is accessed from U.S. 395. There is only a small amount of neighborhood serving commercial centered along SR 341 and at the intersection of Toll Road and SR 341. Due to the close proximity of new commercial development in the City of Reno, the residents believe that there is no need for further commercial or industrial land use in the Toll Road area.

Photo 7: Residential Examples



Kivett Lane Home



Kivett Lane Home



Hill Home Located off of Toll Road

The Toll Road community is the only community within the SETM planning area that has any appreciable amount of federal land. Residents feel that, in general, the public lands in the area are best preserved as open space. The public land parcels that are surrounded by existing residential development can also be appropriate for residential development at similar densities as the surrounding private property. The public lands also offer the community an opportunity to locate public amenities such as trailheads or parks. A planned trail head where Toll Road

road area is located in what is considered a wildland/urban interface. Wild fires have burned through this area in the past and the public's health and safety is a very important issue. Providing for public safety during potential wildfire situations would be enhanced with an additional means of ingress and egress for the area. Bailey Creek runs through the Toll Road community and has caused flooding and property damage in the past. Bailey Creek should be managed as both a natural amenity to the area and a potential threat to public health and safety.

Exhibit C: Staff Report's - Exhibit A, Condition "y" - 12' Gravel Road Maintenance of Drainage

Washoe County Conditions of Approval

homeowners association. As an alternative to a homeowners association, the developer may request the establishment of a County Utility Service Area under which fees would be paid for maintenance of the proposed storm drainage

dedicated by the developer (i.e., curb and gutter, drop inlets and piping). The County Engineer shall determine compliance with this condition. The maintenance and funding of these drainage facilities shall also be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.

v. The maximum permissible flow velocity (that which does not cause scour) shall be determined for all proposed channels and open ditches. The determination shall be based on a geotechnical analysis of the channel soil, proposed channel lining and channel cross section, and it shall be in accordance with acceptable engineering publications/calculations. Appropriate linings shall be provided for all proposed channels and open ditches such that the 100-year flows do not exceed the maximum permissible flow velocity.

w. All slopes steeper than 3:1 shall be mechanically stabilized to control erosion. As an

x. Drainage easements shall be provided for all storm runoff that crosses more than one lot.

y. Maintenance access roadways and drainage easements shall be provided for all existing and proposed drainage facilities. All drainage facilities located within Common Area shall be constructed with an adjoining minimum 12' wide gravel access road. Maintenance access road shall be provided to the bottom of proposed detention basins as well as over County owned and maintained storm drainage facilities.

to the satisfaction of the County Engineer. All grading in these areas shall be in conformance with the Washoe County Code Article 416.

aa. Common Area or offsite drainage draining onto residential lots shall be perpetuated through or around residential lots and drainage facilities capable of passing a 100-year storm shall be constructed with the subdivision improvements to perpetuate the storm water runoff to improved or natural drainage facilities.

bb. Prior to the finalization of any final map, provide verification that permission has been granted to construct Bailey Canyon Creek improvements on offsite parcels not owned by the applicant.

cc. Drainage easements shall be recorded over all FEMA A zones and floodways.

Traffic and Roadway (Washoe County Code Chapter 110, Article 436)

dd. All roadway improvements necessary to serve the project shall be designed and constructed to County standards and specifications and/or financial assurances in an appropriate form and amount shall be provided.

Exhibit D: Staff Report's Exhibit E - V-Ditch located on the project's east boundary

A LOMR on Bailey Creek was completed on Bailey Creek in 2001 and the base flood elevations were established along the Bailey Creek. The project boundaries are outside of the current FEMA AE zone on the creek, but is anticipated that the final drainage analysis would include an updated review of the flood limits based upon current topographic information.

1.3 REGULATORY PERSPECTIVE

The Project site is located within the Washoe County jurisdiction. The onsite pipes and drain inlet drainage facilities will be operated and maintained by Washoe County. The Baily Creek Estates HOA will be responsible for maintenance of the detention basins and Bailey Creek.

2 PRELIMINARY DESIGN

The proposed drainage system for the project site consists of sheet flow from the lots and

storm drain pipes. Onsite flows will be directed to detention basins or directly to Bailey Creek. We have estimated five outfalls from the project into Bailey Creek. Two of those outfalls will be directed to detention basins to mitigate for flow rate increases due to development. Offsite flows from the MDS parcels to the east will be picked up in v-ditches located on the project's east boundary. The ditches will pick up the sheet flow from the east and convey it to the underground storm drain system. One detention basin is proposed in the common area with in the project boundary and one detention basin is proposed in the adjacent common area along Bailey Creek

3 HYDROLOGIC ANALYSIS

Preliminary flows were estimated for the 5-year and 100-year design events using the rational method per the Truckee Meadows Drainage Manual. NOAA Atlas 14 was used for rainfall intensities. The basin calculations are included in the Appendix. There are five outfalls that will drain onsite and offsite flows into Bailey Creek. Q5's ranged from 0.8 cfs to 25.0 cfs, and Q100's ranged from 2.7 cfs to 75.6 cfs. These flow rates are manageable in storm drain pipes within the street Right of Way. Excluding flows coming down Bailey Creek the predevelopment flows coming through the project site have been estimated at 23.3 cfs for the Q5 and 75.5 cfs for the Q100. Total post development flows, prior to detention, have been estimated to be 40.5 cfs for the Q5 and 127.1 cfs for the Q100. These are cumulative rational method summaries and are therefore conservative. It's likely the flows will be slightly smaller when routed through the drainage system in greater detail with a final design analysis. The detention basins will be sized to reduce the total post development flows to the maximum of the total predevelopment flow prior to the storm drainage leaving the site.



Exhibit E: SETM Area Plan, Character Stmt., Pg. 3 - Blending of New Development

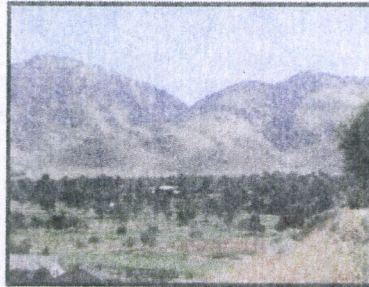
The area contains a number of perennial streams and water channels: Boynton Slough, Dry Creek, Steamboat Creek, Thomas Creek, Whites Creek, and many unnamed intermittent streams. The privately owned Alexander Lake and Washoe County's Huffaker Hills reservoir are the only major reservoirs in the planning area. Steamboat Creek is the natural feature that provides a common bond for the entire planning area as it winds its way from south to north eventually emptying into the Truckee River. Steamboat Creek, whether it's in the planning area

emphasize this natural feature of the area.

The planning areas character is completed by land uses that are distributed within several distinct communities. Future growth in the area will be managed to minimize negative impacts on the character of these communities, particularly those impacts related to the generation of light, air, and water pollution, wildlife and wildlife habitat and the blending of new development with any existing development.

Hidden Valley is a semi-rural community within the unincorporated county that borders Reno to the West, University of Nevada (UNR) Farms and the Truckee River to the north, the Virginia Range and Storey County to the East, and the Huffaker Narrows area to the south. Wild horses have grazed on this land for many years. They graze in the hills to the East of Hidden Valley Regional Park and also roam into the areas south of the park. Hidden Valley was a part of the Emigrant Trail taken by pioneers who were California bound in the mid 19th century. The infamous Donner party was known to have traversed through Hidden Valley following Steamboat Creek and passing to the south of Huffaker Hills before resuming their north and westward movement. In places their wagon ruts can still be seen. The hills surrounding Hidden Valley are home to coyotes, rabbits, raccoons, birds of all kinds, including the Mountain Bluebird, and golden eagles. The wetlands are home to herons, ducks, geese, and the occasional wildfowl visitor as a resting place when migrating on the Nevada flyway.

Photo 3: Hidden Valley and University of Nevada Farms



There are no major highways or arterial roads that presently bisect Hidden Valley. All the roads that are encompassed in the Valley are local access roads. This enables residents to enjoy a quiet atmosphere free from traffic noises. There are no streetlights in the Valley and this enables the residents to enjoy a view of the night stars that is not available to others closer into the city. There is an astronomy club that uses the accessible areas of Hidden Valley Regional Park to view the stars with telescopes because the darkness of the surrounding neighborhood permits better viewing.

Hidden Valley has a desert climate typical of arid western valleys, ranging from extended drought to flood conditions and is extremely sensitive to prevalent environmental conditions. Steamboat

Exhibit F: SETM 2.7 Dwellings Must Match Adjacent Building Type

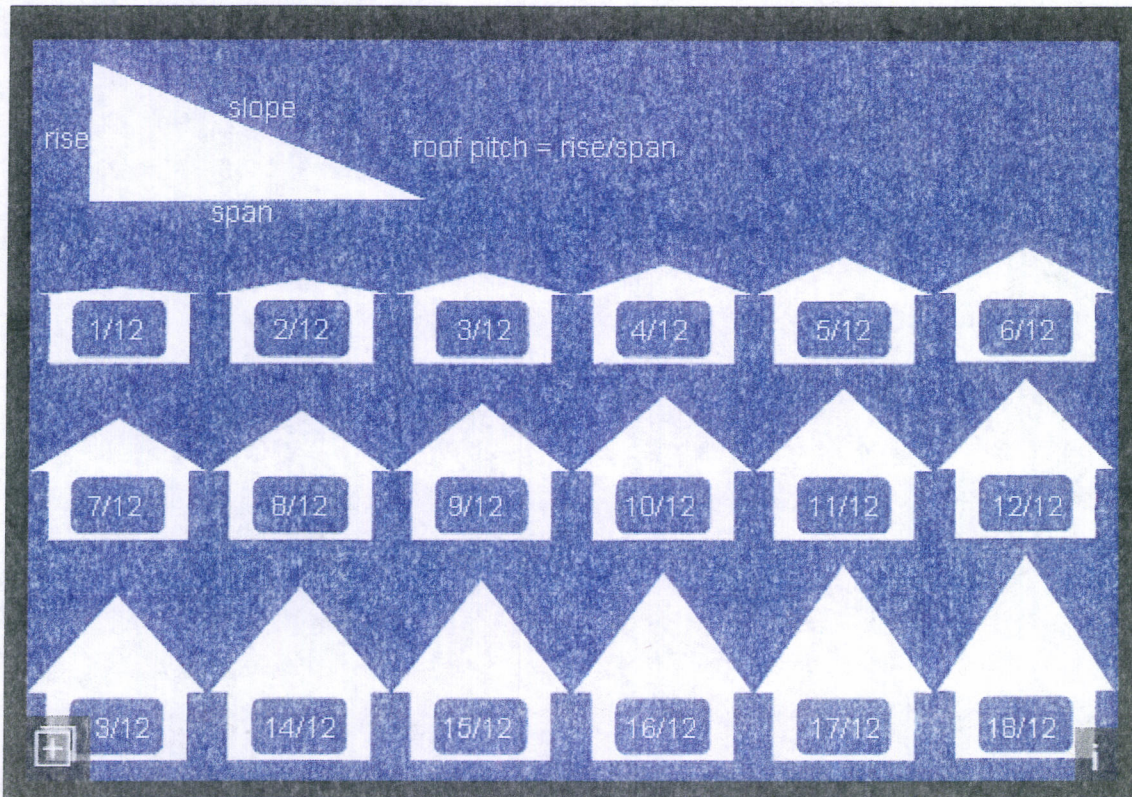
- SETM.1.7 The Washoe County Planning Commission will review any application to expand the Suburban Character Management Area into the Rural Character Management Area against the findings, criteria and thresholds in the Plan Maintenance section of this plan. At a minimum, the Planning Commission must make each of the applicable findings in order to recommend approval of the amendment to the Board of County Commissioners.
- SETM.1.8 Washoe County will work to ensure that the long range plans of facilities providers for transportation, water resources, schools and parks reflect the goals and policies of the SETM Area Plan.

Goal Two: Establish development guidelines that will implement and preserve the community character commonly found within the individual communities of the Southeast Truckee Meadows planning area. Common Development Standards for all the Character Management Areas.

Policies

- SETM.2.1 When feasible, given utility and access constraints, grading in subdivisions established after the date of final adoption of this plan will:
- Minimize disruption to natural topography.
 - Utilize natural contours and slopes.
 - Complement the natural characteristics of the landscape.
 - Preserve existing vegetation and ground coverage to minimize erosion.
 - Minimize cuts and fills.
- SETM.2.2 The installation of new streetlights will be minimized and if approved will be for safety reasons. Any lighting proposed must show how it is consistent with current best practice "dark-sky" standards. Lights shall be shielded to prevent light spillage onto adjacent properties or streets.
- SETM.2.3 Site development plans for new subdivisions, commercial and public facilities in the Southeast Truckee Meadows planning area must submit and follow a plan for the control of noxious weeds. The plan should be developed through consultation with the Washoe County District Health Department, the University of Nevada Cooperative Extension, and/or the Washoe Story Conservation District.
- SETM.2.4 Applicants required to present their development proposal items to the Citizen Advisory Board must submit a statement to staff, not later than one week following the meeting date, explaining how the final proposal responds to the community input received from the Citizen Advisory Board.
- SETM.2.5 During review of tentative maps and other development proposals, the Planning Commission will review the adequacy of the minimum standards established under Goals 2, 3, 4, and 5; and upon a finding that a standard is inadequate to implement these goals, may impose other similar standards as necessary to implement the relevant goal.
- SETM.2.6 Washoe County Community Development will promote the use of renewable
- SETM.2.7 Dwellings in new subdivisions adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30 foot or wider landscaped buffer area.

Exhibit G: Roof Pitch Diagram & Roof Pitch 4/12



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Is a 4/12 Pitched Roof Considered Low or Moderate?

Most require slope for adequate drainage and when so-called flat roofs might have some decline. A 4/12 roof pitch indicates the rise rises 4 inches in height for every 12 inches of measured horizontal distance from the edge of the roof to the eave/line. The gentle slope of a 4/12 pitch roof falls on the cusp between low pitch and moderate pitch.

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How to Construct a Dual-Pitch Roof

How to Moderate Roof Pitch, Shingles and Drainage

Considerations

While a 4/12 pitch roof has enough slope for water runoff, it's not too low for regions with heavy snowfall, which can put considerable weight on the roof's structure. While the pitch is too high for water pipes or low-slope roofing, such as built-up roofing (BUR) or the application of thickened membranes, so a 4/12 roof installing water or drain pipe shingles because rain can leak under the shingles.

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Exhibit H: Staff Report's - Exhibit A Dwelling Height, Condition "x."

Washoe County Conditions of Approval

- areas and related improvements shall be addressed in the CC&Rs to the satisfaction of the District Attorney's Office.
- iv. The project adjacent to undeveloped land shall maintain a fire fuel break of a minimum 30 feet in width until such time as the adjacent land is developed.
 - v. Locating habitable structures on potentially active (Holocene) fault lines, whether noted on the recorded map or disclosed during site preparation, is prohibited.
 - vi. All outdoor lighting on buildings and streets within the subdivision shall be down-shielded.
 - vii. No motorized vehicles shall be allowed on the platted common area except emergency vehicles, utility service vehicles, or vehicles involved in homeowner association maintenance and repair of common area facilities.
 - viii. Mandatory solid waste collection.
 - ix. Fence material (if any), height, and location limitations, and re-fencing
 - x. Dwellings adjacent to existing residential development must match the adjacent building type (single story/multi-story). Development is considered adjacent if not separated by a road or a 30-foot or wider landscaped buffer area. A note to this effect shall be placed on applicable final maps, and a disclosure made by the developer to affected homebuyers on their closing documents.
- s. The common open space owned by the homeowners association shall be noted on the final map as "common open space" and the related deed of conveyance shall specifically provide for the preservation of the common open space in perpetuity. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The deed shall be presented with the CC&Rs for review by the Planning and Development staff and the District Attorney.
- t. Disturbed areas left undeveloped for more than thirty (30) days must be revegetated by methods approved by Planning and Development and that comply with the requirements of Southeast Truckee Meadows Area Plan Policy 11.5.
- u. Construction hours are limited to 7 a.m. to 7 p.m., Monday through Saturday.
- v. A will-serve from Truckee Meadows Water Authority and mylar map of the proposed project shall be presented to the State Engineer for approval and signed through his office prior to development.

Washoe County Engineering and Capital Projects Division

The Virginia Foothills Community is a peaceful residential suburban community within easy driving distance of urban amenities. The Foothills area is a combination of custom homes and subdivisions that range in lot size from 1/3 to 1/2 acre with a few larger properties. The Foothills is an area of wide residential streets some with curb and gutter and some with V ditches. The residential street network is easily accessed from SR 341 or Western Skies Road. Virginia Foothills is bordered on the west by residential development in the City of Reno and on the north by undeveloped land within the city. The steep privately owned and mostly undeveloped mountains of the Virginia Range are to the east and Geiger Grade (SR 341) on the south separates Virginia Foothills from the Toll Road area. Residents support the idea of the highway obtaining "Scenic Highway" status from the State. The area supports a small amount of neighborhood serving commercial centered along SR 341. Due to the close proximity of new commercial development in the City of Reno, the residents believe that there is no need for further commercial or industrial land use in the Foothills area.

Photo 5: Virginia Foothills Neighborhood (taken from SR 341)



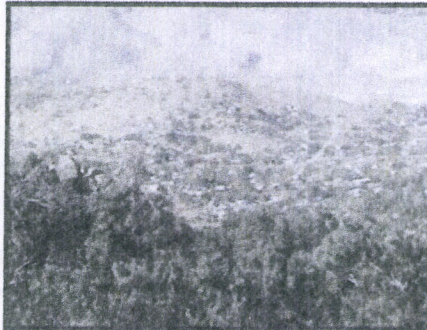
Photo 6: Commercial Uses Located on SR 341



The essential elements that create and support the Virginia Foothills suburban lifestyle include low-density housing against the backdrop of the Virginia Range, the neighborhood elementary

encroaching development has closed off many places to ride a horse, some of the residents of the Foothills still keep horses on their property. Foothill residents believe in the necessity to preserve their natural resources for the benefit of present and future generations of residents. Residents believe in the importance of preserving clean air, dark night skies, mountain views and providing a safe community free from excessive noise and traffic.

Photo 8: Toll Road Area (taken from SR 341)



The essential elements that create and support the Toll Road areas lifestyle include a mix of housing types in a rural style atmosphere; Cottonwood Neighborhood Park; occasional views of grazing wild horses and raptors along with wildlife such as coyote, skunk and raccoon. Although encroaching development has restricted places to ride a horse, some of the residents of the area

maintain the integrity of the community for existing residents along with enhancing equestrian and other recreational opportunities for the area. The recently completed path along the length of Toll Road would be complemented by an un-paved equestrian path along the opposite side of the road. Residents believe in the importance of preserving clean air, dark night skies, mountain views and providing a safe community free from excessive noise and traffic.

Vision and Character Management

Land Use

Goal One: The pattern of land use designations in the Southeast Truckee Meadows Area Plan will implement and preserve the community character described in the Character Statement.

- SEIM.1.1 The Southeast Truckee Meadows Character Management Plan Map (CMP) shall identify the Southeast Truckee Meadows Rural Character Management Area (RCMA), the Hidden Valley Suburban Character Management Area (HVSCMA), the Virginia Foothills Suburban Character Management Area (VFSCMA), and the Toll Road Suburban Character Management Area (TRSCMA).
- SETM.1.2 The following Regulatory Zones are permitted within the Southeast Truckee Meadows Rural Character Management Area.
 - a. General Rural (GR – One unit per 40 acres).
 - b. Low Density Rural (LDR – One unit per 10 acres).
 - c. Medium Density Rural (MDR – One unit per 5 acres).
 - d. Low Density Suburban (LDS – One unit per acre).
 - e. Medium Density Suburban (MDS – See Policy 2.13).
 - f. Public/Semi-public Facilities (PSP).
 - g. Parks and Recreation (PR).

Exhibit L: Monte Vista CC&R View Obstruction

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casualty insurance obligation or premium of the Association; and (e) such activities are consistent with the residential character of the Property and otherwise conform with the provisions of this Declaration. Additionally, notwithstanding the above, garage sales, moving sales, and rummage sales may be conducted upon the prior written approval of the Board, which approval may be granted or withheld in the Board's sole and absolute discretion.

3.10 No Further Subdivision. No Lot may be further subdivided without the prior written approval of the Board, which approval may be granted or withheld within the Board's sole and absolute discretion; provided, however, that nothing in this Section shall be deemed to prevent an Owner from, or require the approval of the Board for: (a) selling a Lot; or (b) transferring or selling any Lot to more than one (1) person to be held by them as tenants in common, joint tenants, tenants by the entirety or as community property; or (c) the leasing or renting by any Owner of all of his Lot, provided that any such lease or rental shall be subject to and in accordance with Section 3.2 of this Declaration.

3.11 Drainage. There shall be no interference with the established drainage in the Property unless an adequate alternative provision, previously approved in writing by the Architectural Committee, is made for proper drainage, and such alternative provision will not harm or unduly increase the burden on any adjacent Lots or Common Elements. For the purpose hereof, "established" drainage is defined as the drainage which exists at the time a Lot is conveyed to an Owner by Declarant

3.12 View Obstructions. No vegetation, improvement or other obstruction shall be planted, constructed, or maintained on any Lot in such location or of such height as to unreasonably obstruct the view from any other Lot. Each Owner or resident of a Lot shall be responsible for periodic trimming, pruning and thinning of all hedges, shrubs and trees located on that portion of his Lot which is subject to his control or maintenance, so as to not unreasonably obstruct the view of other Owners or residents. Each Owner, by accepting a deed to a Lot, hereby acknowledges that any construction or installation by Declarant may impair the view of such Owner, and hereby consents to such impairment.

external appearance of a Lot (or any improvement thereon) or any other portion of the Project may be modified without the prior written approval of the Architectural Committee, in accordance with Article VIII. No modification may be made that will impair the structural integrity or mechanical systems or lessen the support of any portion of the Project. Note: Washoe County has the right, but in no event the obligation, to enforce provisions of these CC&R's in a situation where the Declarant or Association cannot or will not enforce.

3.14 Maintenance and Repair. The Owner of each Lot shall be solely responsible for maintaining such property, and all Improvements thereon, in a clean and orderly manner, in a good condition and state of repair, and adequately painted or otherwise finished, all at such Owner's sole cost and expense. The Owner of each Lot shall keep such Lot free of debris, junk, and abandoned or inoperable vehicles, machinery, and equipment. Furthermore, the Owner of each Lot, subject to the restriction set forth in Section 2-A.9, shall keep all vegetation on such Lot appropriately irrigated, mowed, and pruned, as applicable, and shall immediately replace or otherwise landscape any yard area cultivated with grass or sod if such grass or sod is allowed to die. No building, structure, or other improvement within the Project shall be permitted to fall into disrepair. No Owner shall do any act or

Exhibit M: Staff Report's - Exhibit A, Condition "r"

Washoe County Conditions of Approval

- o. All landscaping and revegetation shall be maintained in accordance with the provisions found in Washoe County Code Section 110.412.75, Maintenance. A three-year maintenance plan shall be submitted by a licensed landscape architect registered in the State of Nevada to the Planning and Development Division prior to a Certificate of Occupancy. The plan shall be wet-stamped.
- p. The applicant shall submit and follow a plan for the control of noxious weeds. Prior to any ground-disturbing activity, the applicant shall provide the Planning and Development Division a copy of the plan, which should be developed through consultation with the Washoe County Health District, the University of Nevada Cooperative Extension, and/or the Washoe-Storey Conservation District.
- q. Any lighting proposed, including street lights, shall show how it is consistent with current best practice "dark-sky" standards and meets the requirements of Southeast Truckee Meadows Area Plan Policy 2.2. Lights shall be shielded to
- r. Conditions, covenants, and restrictions (CC&Rs), including any supplemental CC&Rs, shall be submitted to the Planning and Development staff for review and subsequent forwarding to the District Attorney for review and approval. The final CC&Rs shall be signed and notarized by the owner(s) and submitted to the Planning and Development Division with the recordation fee prior to the recordation of the final map. The CC&Rs shall require all phases and units of the subdivision approved under this tentative map to be subject to the same CC&Rs. Washoe County shall be made a party to the applicable provisions of the CC&Rs to the satisfaction of the District Attorney's Office. Said CC&Rs shall specifically address the potential for liens against the properties and the individual property owners' responsibilities for the funding of maintenance, replacement, and perpetuation of the following items, at a minimum:
 - i. Maintenance of public access easements, common areas, and common open spaces. Provisions shall be made to monitor and maintain, for a period of three (3) years regardless of ownership, a maintenance plan for the common open space area. The maintenance plan for the common open space area shall, as a minimum, address the following:
 - Vegetation management;
 - Watershed management;
 - Debris and litter removal;
 - Fire access and suppression; and
 - Maintenance of public access and/or maintenance of limitations to public access.
 - ii. All drainage facilities and roadways not maintained by Washoe County shall be privately maintained and perpetually funded by the homeowners association.
 - iii. All open space identified as common area on the final map shall be privately maintained and perpetually funded by the homeowners association. The deed to the open space and common area shall reflect perpetual dedication for that purpose. The maintenance of the common

Exhibit N: View Mentions -- Highland Estates & Monte Vista



Highland Estates features extra large homesites averaging 17,000 square feet, some of the best and highest sites in Wingfield Springs. Most of these homesites offer either valley-sierra views or open space - hillside views.

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Save \$51,935

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LE BORDEAUX Lot 318



Now \$1,149,900
Save

Discover the beauty of the mountains and the valley. This new home is built on a 17,000 square foot lot, offering a panoramic view of the valley and the mountains. The home features a large open floor plan, a gourmet kitchen, and a master suite with a walk-in closet. The home is built with high-quality materials and is ready to move in.

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<http://www.silvercresthomesnev.com/find-your-home/monte-vista/#move-in-ready-homes>

Goal Fourteen: Mining, including aggregate operations, in the Southeast Truckee Meadows planning area will be compatible with existing residential, recreational and educational uses.

Policies

- SETM.14.1 Mining activities in the Southeast Truckee Meadows must be adequately screened and/or buffered from residential, recreational and educational land uses and from roadways designated as arterials or highways on the Southeast Truckee Meadows Streets and Highways Map.
- SETM.14.2 Proposals for any new mining activities or review of existing activities permits will be subject to a Public Health Impact Review, to be conducted jointly by Community Development staff and Washoe County District Health Department Staff. The specific content and methodology of the Impact Review will be determined by the Washoe County District Health Department with the cooperation of the Washoe County Community Development Department, on a

Water Resources – Flooding

Goal Fifteen: Personal and economic losses associated with flooding will be minimized. Development in the Southeast Truckee Meadows planning area will mitigate any increase in volume of runoff to ensure that the flood hazard to existing developed properties is not exacerbated.

Policies

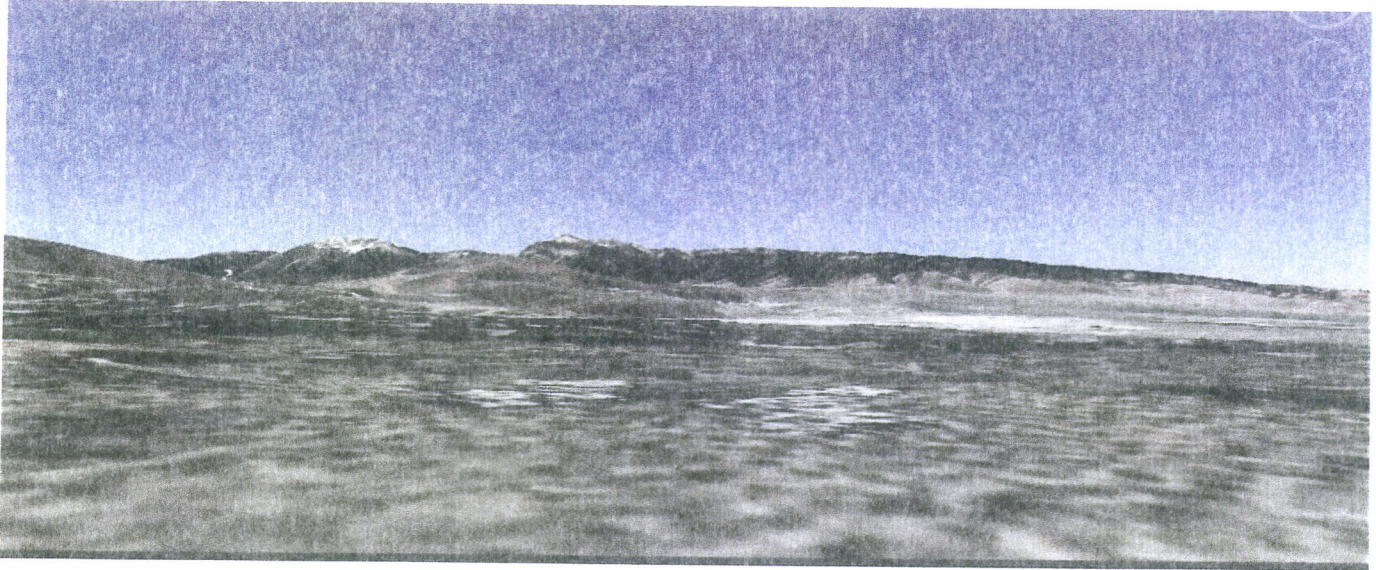
- SETM.15.1 Development within the Southeast Truckee Meadows will conform to Regional Water Plan Policy 3.1.b, "Flood Plain Storage within the Truckee River Watershed", as well as locally specific flood control requirements as adopted by Washoe County.
- SETM.15.2 Development within the Southeast Truckee Meadows will conform to Regional Water Plan Policy 3.1.g, "Management Strategies for Slopes Greater than 15 Percent," as well as locally specific erosion control requirements as adopted by Washoe County.

Goal Sixteen: The Truckee Meadows Hydrographic Basin is a designated groundwater basin and a decreed surface water system. Water resources will be supplied to land uses in the Southeast Truckee Meadows planning area according to the best principles/practices of sustainable resource development.

Policies

- SETM.16.1 New development shall comply with Regional Water Plan Policy 2.1.a: "Effluent Reuse - Efficient Use of Water Resources and Water Rights".
- SETM.16.2 Development proposals must be consistent with Regional Water Plan Policies 1.3.d, "Water Resources and Land Use", and 1.3.e, "Water Resource Commitments".
- SETM.16.3 The creation of parcels and lots in the Southeast Truckee Meadows planning area shall require the dedication of water rights to Washoe County in quantities that are consistent with the water use standards set by the State Engineer and/or Washoe County.

Exhibit P: View from 15111 Kivett Lane as rendered by Google Earth



From: Holly Eisemann
To: Mullin, Kelly; Lucey, Robert (Bob) L; Smith, Catherine
Subject: Stop Bailey Creek Estates
Date: Tuesday, February 07, 2017 7:56:31 AM

I'm writing this letter in order to voice my concern over the proposed Bailey Creek Estates development. We bought our home in 2011, and since then we have had to evacuate for fires at least three times. Evacuating from our neighborhood is already difficult because there are really only two ways out to Geiger Grade via Toll Road and Kivett Lane. Geiger Grade is only a two lane highway in which wild horses are frequently crossing. This past month, Toll Road was closed for a significant amount of time due to flooding. Just this morning, Toll Road is on the verge of being closed again due to more flooding, despite only having been reopened for a couple weeks. Kivett Lane has been our alternate road when Toll was closed, however that road is barely wide enough for two cars and surrounded by drainage ditches that are already overburdened. Several times throughout the flooding Kivett also became unpassable as the waters rapidly and significantly rose up over the roadway. The flooding measures we have in place are grossly inadequate, and the recent attempts to mitigate this have also been unsuccessful. Building a new housing development on top of our existing flood prevention infrastructure will be disastrous. I would like to point out that when we bought our home, we were only told that flood insurance was not required in the area and that in the field behind our house was existing culverts and drainage should any flooding arise. Obviously, we should have been warned more about prior flooding and potential for future flooding in the area. Are the potential buyers of the Bailey Creek Estates homes going to be made aware of these issues, or will they be left in the dark as we were? Fires and flooding are just two recent examples of how our neighborhood cannot handle the influx of even more cars on the already overcrowded and poorly designed roads.

The nearby schools are already switching to multi-track calendars because of such tremendous overcrowding. I understand the county is working towards building more schools, but until that actually happens, building Bailey Creek Estates will only further hinder our schools and our children's educational needs. Our neighborhood just simply cannot handle more students anytime soon.

The developers have provided extremely poor and inaccurate estimates as to how this will impact our neighborhood and community. Anyone can see that their estimates of added cars and students in the area are preposterously low. Until more appropriate studies and assessments can be made, Bailey Creek Estates just should not be built.

I trust that our elected representatives will keep the existing communities best

interests in mind when addressing this proposed development.

Holly and Marcus Eisemann

13577 Gold Run Drive

Reno, NV 89521

From: Diana Fowler
To: [Mullin, Kelly](#); [Whitney, Bill](#)
Cc: jhidalgo@rgi.com
Subject: CONCERNS: Bailey Creek Estates / Wild Horse Area
Date: Tuesday, February 07, 2017 11:03:48 AM

Dear Ms. Mullin and Mr Whitney,

I understand that Case# WTM16-003 Bailey Creek Estates is under review. I have lived in the Virginia Foothills area since 1998 and I have been a realtor in Reno/Sparks for over 22 years.

I understand that development on the subject property is most likely inevitable. However, I do hope that certain issues be addressed and considered:

1. Wild Horses: The wild horses have always roamed this area and migrate through it. They drink from the creek running through the subject property. If they get trapped on Geiger Grade it mean accidents for the horses and for drivers. The development needs to provide a way for the horses to get off of the road and back to the creek and open land - perhaps a easement or walking trail.
2. Walking Trails / Access to Open Land: The land proposed for development has always been used by residents for walking, hiking, bicycling, riding their horses and ATV's. It would be neighborly if this development allowed public access through this property so the area residents could still access the open land beyond it and preserve our rural quality of life in Virginia Foothills.
3. Light Pollution: The residents of Virginia Foothills cherish our view of the night sky without light pollution of street lights. Hopefully this will also be taken in to consideration.
4. Schools: Our schools in the area our already over capacity. How will this be addressed?

Thank you for your consideration.

Sincerely,

Diana Fowler Rogers, ABR, CRS, GRI

Keller Williams Group One Inc.

10539 Professional Circle, Ste 100, Reno NV 89521

Direct: 775-690-2474

E-Mail: DianaRenoHomes@gmail.com

Website: www.RenoFineHomes.com

Home Search: www.renoproperties.listingbook.com

From: [Smith, Catherine](#)
To: [Brian; Lucey, Robert \(Bob\) L](#)
Cc: [Emerson, Kathy; Mullin, Kelly](#)
Subject: RE: Bailey Creek Estates
Date: Tuesday, February 07, 2017 9:55:37 AM

Dear Mr. Jewell,

I believe your concerns are related to the Planning Commission and as such would be best directed to the Community Services Department which manages that Board. I understand some misinformation was provided to the public via the "Nextdoor" neighborhood App which advised concerned citizens to contact this office; however, as I previously stated this Board is not managed by the Clerk's Office. Any further comments for the Planning Commission related to the Baily Creek Estates should be provided to either Kathy Emerson or Kelly Mullin in the Washoe County Community Services Department, both of whom I have copied with this email.

Respectfully,

Catherine Smith

Supervisor, Board Records and Minutes
Washoe County Clerk's Office
1001 E. Ninth Street, Building A | Reno, NV 89512
775.784.7275 | csmith@washoecounty.us
www.washoecounty.us/clerks/

-----Original Message-----

From: Brian [<mailto:brianjewell13@hotmail.com>]
Sent: Tuesday, February 07, 2017 9:54 AM
To: Lucey, Robert (Bob) L
Cc: Smith, Catherine
Subject: Bailey Creek Estates

Hi Mr. Lucey,

My name is Brian Jewell and I live at 15180 Bailey Canyon Dr. I would like to start out that I would like to have this email apart of the public record voting against the Bailey Creek Estates subdivision you will be deciding on later today.

I have lived in South Reno my whole life. My family and I moved into this house 3 years ago moving from Wyngate Village in Double Diamond. We chose this area because of the rural feel and the space we had around us. We looked for houses for 18 months until we fell in love with this one. I really feel this new subdivision will intrude and interfere with our way of life.

Please "Do Not" allow this subdivision to go through. I have major concerns with this subdivision and the impact to all of our neighbors. Views, over crowding, traffic, flooding etc. I currently have a river going through a drainage behind my house. It is worse than durning the floods a few weeks ago. If you would like I can send you video of the flooding a few weeks ago and what is happening now. If houses are slated to be built on this land where will all of the water go? Can you share any impact flood studies that have been done for this new subdivision if any have been done?

I understand this subdivision has been on the books for 20 years or so. A neighbor told me that. I also understand that growth is good for our community. But there has to be some kind of statute of limitations. Why are they deciding to build 20 years later? There should have to be new impact studies for them to renew there permits to build since so much time has passed. In that 20 plus years we have all become more intelligent and aware of impacts that certain decisions can make on all of us. So I please ask of you again to vote "No" on approving the new Bailey Canyon Estates project.

Thank you.

Brian Jewell

From: Andrew Kaltenbach
To: [Mullin, Kelly](#); [Whitney, Bill](#); jhidalgo@rgi.com
Subject: Bailey creek estates
Date: Monday, February 06, 2017 10:10:42 AM

I am voicing my concerns to the proposed construction of the Bailey creek estates on hwy 341. I understand the growth in Reno and the need for tax revenue for the government. However, when is enough enough? Do we want to look like LA?. One of the reasons people move to Reno is the mountains and the wildlife that life around the area. Turning the 341 corridor into track housing will not only rob future generations of the beauty we enjoyed growing up, but will also take away from the allure that visitors have come to expect. That area would make a great park and a refuge for wild horses. How many tourist want to see track housing when they come to Reno. As a Nevada native that has lived in the Reno area for 50 years the idea of California builders coming into Nevada, manipulating regulations so as to not adhere to environmental concerns, and disregard any overcrowding of our schools to only make a buck and send that money back to California makes me sick. There is also a 900 home project that is breaking ground this spring (Caramella estates). I remember at one time the idea of a scenic corridor, has that great idea gone the way of tax revenue?. Why not draw a line around the basin and no growth above that line. Who will put their foot down and say stop, is tax dollars that intoxicating? I am sure if you have children you would want them to enjoy the beauty of the Sierra's. After all LA is only a short flight away if they want to see overcrowding.

Thank you for your time

Andy Kaltenbach
13830 Chamy dr
Reno, NV 89521

From: Sandi Moore
To: [Mullin, Kelly](mailto:Mullin_Kelly)
Cc: smoorenv@gmail.com
Subject: Concerns regarding Case WTM16-003 (Bailey Creek Estates)
Date: Tuesday, February 07, 2017 11:07:53 AM
Importance: High

Tuesday, February 2, 2017

To: Washoe County Community Services Department Planning and Development Division
Attn: Kelly Mullin, Planner

Dear Kelly,

My husband and I wanted to reach out to you and share our concerns about the Bailey Creek Estates subdivision plan prior to the meeting tonight.

We live in the Cottonwood Creek Estates subdivision directly to the south of the proposed Bailey Creek Estates subdivision. We purchased our home in 2014 because of the open spaces surrounding us, the quiet neighborhood, views of the mountains and the rural atmosphere close to town and amenities and do not want to lose that.

Our concerns are:

1. The potential for the 56 proposed homes to all be two-story. This does not fit with the character of the area and will ruin the open feel and views that so many of the homes enjoy. The Cottonwood Creek Estates to the south of the proposed project is a similar neighborhood but only has 28 two-story homes out of 114. The adjacent subdivision to the east is Comstock Estates subdivision, of which 24 of the 54 homes are either two-story or smaller split level homes. An in-fill project such as this needs to fit the profile of the surrounding neighborhoods.

2. The additional traffic added to Geiger Grade and the roundabout at Veterans Parkway. The roundabout is already very busy and overrun by drivers who either don't know how to navigate it properly (ie, yield to cars already in the roundabout) or choose to ignore the rules of a roundabout completely. Also, there is a high number of vehicles that run the red light at Toll Rd, making it dangerous for those of us pulling out there, even with a green light. Adding 56 more homes to this narrow, two-lane highway is only going to compound the already present safety issues.

3. The potential for even more flooding. This winter has been an eye-opener for local residents as to the lack of flood mitigation and storm water management being done by Washoe County. Toll Road was closed twice in January 2017 due to flooding from Bailey Creek. As I write this letter, the intersection at Gold Run Dr and Silver Run Dr. near my house is flooding. Building out the empty land with the proposed Bailey Creek Estates is only going to make matter worse. With less open ground to absorb precipitation from storms, the runoff and flood potential is only going to increase. The county owes the current residents some resolution for this before compounding the problem with additional development. Future residents of the proposed neighborhood deserve to live in homes that are not in immediate danger of flooding.


4. Overcrowding at the zoned schools. Washoe County School District is already trying to mitigate the

overcrowding at Brown Elementary School and adding more homes to this area is counterproductive to that. In 2015, Brown Elementary School was operating with 10 portable classrooms, the highest number in school district, and the sixth graders had to be diverted to Dapoali Middle School.

5. This plan seems to be put together in a rush and without consideration of the community. The lack of effort and research by the developer is evident in the requested street names - two of which already exist in the Cottonwood Creek Estates. Hearings and meetings regarding public input have been rushed and give the impression of trying to avoid conflict and push through without input from those affected by this proposed development. This is further exhibited by the developers failed attempt to have the property annexed by the City of Reno for the purpose of getting around the larger lot sizes and building restrictions of Washoe County.

I am a fifth generation Nevadan and this area embodies all that I love about my home state. My hope is that the county considers all aspects of this proposal and its impact on the community and does what is in the best interest of all parties concerned. Fixing existing problems should be a priority before adding more pressure to the system.

Thank you,
Sandi and Kevin Moore
749 Sterling Hills Ct.
Reno, NV 89521
775-848-9737

Thank you,
 Sandi Moore
Principal Support Analyst

e. sandi.moore@helpsystems.com
p. 952.933.0609
w. helpsystems.com

From: [Mullin, Kelly](#)
To: [Mullin, Kelly](#)
Subject: FW:
Date: Tuesday, February 07, 2017 10:52:03 AM

From: marjorie olson <marjole@live.com>
Sent: Monday, February 6, 2017 2:38 PM
To: jhidalgo@rgj.com
Subject:

We are deeply concerned regarding the Baily Creek Estates Case#WTM16-003 development for the following reasons:

1-part of this development is in FEMA flood hazard zone, and will impact the present residents. Should my insurance be affected adversely, be aware that class action lawsuits will be forthcoming

2-According to signs posted along Geiger Grade, wild horses appear **YEARLY. Is this a concern that the Humane Society or another agency need to be involved?**

3- Brown Elementary School and DePaoli Middle School are overcrowded, and the new development will certainly NOT benefit the overcrowding situation

4-Traffic increase will unduly affect those residents along the Virginia City Hwy 341. Is the county planning on building fences(as was done on McCarran) to compensate for the traffic noise?

From: [Mullin, Kelly](#)
To: [Mullin, Kelly](#)
Subject: FW: Bailey Creek Estaztes
Date: Monday, February 06, 2017 12:03:31 PM

From: Sherry Rapp [sherap6@yahoo.com]
Sent: Saturday, February 04, 2017 11:25 AM
To: Hartung, Vaughn
Subject: Bailey Creek Estaztes

Mr. Hartung

I have several concerns regarding the Bailey Ranch Estates development.

First:

Traffic. In reading all of the proposed traffic flows, I am concerned that the number of cars projected to turn left onto Geiger Grade is as low as 41. I really believe this is far from accurate. If there are 56 homes, then you should plan for two cars per house, thus equaling 112 cars turning left onto Geiger Grade. I feel that there need to be no access directly onto Geiger Road, but instead should be directed onto Toll Road in order to use the existing traffic light at Toll Road and Geiger Grade. No one has thought of the increased traffic that will be on Western Skies Drive when the Caramella Ranch Estates is built. Western Skies Drive is very close to the Shadow Hills intersection. I feel that there is going to be many accidents because of the amount of cars turning off and on Geiger Grade during peak travel times. Caramella Ranch development is approximately 800 homes with access to Geiger Grade and Rio Wrangler roads. There needs to be a more complete review of traffic with regards to all developments in the planning stage, both in Washoe County as well as Reno.

Second:

I think the flood risk assessment is very low. Since the flooding that closed Toll Road for days, and the amount of flooding in the Virginia Foothills, Shadow Hills and other areas, including the Stone House Nursery, that there should be a much larger emphasis put on flood control. I also read that there would be grouted rip rap for drainage and soil control. Does that mean that Bailey Creek will be concreted in, thus denying the wild horses access to cross the creek?

Third:

I am concerned about the wild horses. While they might not be endangered, they do roam this entire area. They are also a large tourist attraction, since most people have never seen a wild horse. I feel that there should be access routes that remain 'wild' for the horses to be able to go down to Steamboat Creek for the water contained there. The study said that there are no migration routes in the area, which I feel is incorrect. There are horses, deer, coyotes, as well as raptors that live and hunt in the area. There are also signs warning of the wild horses on Geiger Grade.

Thank you for taking the time to read my concerns regarding the Bailey Creek development.

Sherida and George Rapp
13845 Chamy Drive
Rano, NV 89521

From: Smith, Catherine
To: Jeffrey
Cc: Emerson, Kathy; Mullin, Kelly; Parent, Nancy; Galassini, Janis L.
Subject: RE: Proposed Bailey Creek Estates
Date: Monday, February 06, 2017 3:46:03 PM

Dear Mr. Tillison,

I believe your concerns are related to the Planning Commission and as such would be best directed to the Community Services Department which manages that Board. I understand some misinformation was provided to the public via the "Nextdoor" neighborhood App which advised concerned citizens to contact this office; however, as I previously stated this Board is not managed by the Clerk's Office. Any further comments for the Planning Commission related to the Baily Creek Estates should be provided to either Kathy Emerson or Kelly Mullin in the Washoe County Community Services Department, both of whom I have copied with this email.

Respectfully,

Catherine Smith

Supervisor, Board Records and Minutes

Washoe County Clerk's Office

1001 E Ninth Street, Building A | Reno, NV 89512

775.784.7275 | csmith@washoecounty.us

www.washoecounty.us/clerks/

From: Jeffrey [mailto:jtillison@hotmail.com]

Sent: Monday, February 06, 2017 3:43 PM

To: Berkbigler, Marsha; Lucey, Robert (Bob) L; Hartung, Vaughn; Herman, Jeanne; Smith, Catherine

Subject: Proposed Bailey Creek Estates

Dear Commissioners:

I write concerning the proposed development of Bailey Creek Estates on Geiger Grade. I own a home four houses from Bailey Creek Park on Granite Mine Drive.

I believe the development of this area will cause increased flooding, overcrowding of schools and increased traffic concerns.

The flooding may be documented by this most recent flood in January and the major flooding in 2005 when Bailey Creek Park was completely under water. Lack of erosion control from the mountains above to Steamboat Ditch has and will continue to cause problems. Development of the property at the far east and lower portion of this problem will only cause the water and earth to flow in other directions possibly causing more severe flooding to current residents.

The beginning of Toll Road will certainly need to be reconstructed. The FEMA specified flood

zones within the proposed development will cause many issues with the infrastructure required for this development.

Overcrowding of schools - self-explanatory.

Increased traffic is my largest concern. The two left-turn lanes from South Virginia St. to Geiger Grade Rd. across from The Summit are backed up into the travel-thru lane from 4:00 pm until 6:00 pm. There is already a lot of construction in the Damonte Ranch area and the traffic continues to increase. Many of the residents of that area avoid the Damonte Ranch Parkway exit off 580 due to congestion and choose Geiger Grade Rd. to Veterans Parkway as an alternate. More homes in this area will cause more traffic problems.

If this project is allowed to proceed I believe home design and development of the surrounding areas should be a major concern to the county. Bailey Creek will need to be built into a proper drainage and the homes should complement the current residences.

Thank you for taking my concerns into consideration.

Best regards,

Jeff Tillison
14735 Granite Mine Drive
Reno, NV 89521

ATTACHMENT F

From: tma_1@charter.net
To: Mullin, Kelly
Cc: "tma_1@charter.net"
Subject: appeal to stop Bailey Creek Estates
Date: Tuesday, February 21, 2017 5:13:53 PM

Kelly, Please add our name to the appeal filed Friday February 17, 2017 by Kathleen Pfaff to stop construction of Bailey Creek Estates.

Thank you for your attention regarding this matter.

Sincerely,

Thomas and Linda Aust

14668 Gold Run Dr.

Reno, NV. 89521

From: Elmira
To: Mullin, Kelly
Subject: appeal for Bailey creek development
Date: Monday, February 20, 2017 1:11:56 PM

Hi Kelly,

I sent you an email previously with comments right after Jan 25th hearing where I also spoke to you. It was a lengthy email with all the explanations why we do not want this development to be approved. Now that it was approved by Washoe county on 02/07 and Kat Pfaff submitted appeal to you on Friday, 02/17/17, I would like to ask you to add our names to the appeal - Randy Coker and Elmira Coker. Please confirm,

Thank you,

Elmira Coker

February 21, 2017

Dear Ms. Mullin,

We would like to join the appeal for the Bailey Creek Estates new subdivision.

Our reasons for appealing are based on the same items reported before:

- Overcrowding in the area to include schools and roads
- The drainage issues in the area
- Overall quality of life of living in a rural area that is getting less and less rural

If it is the decision of the Commissioners to approve this subdivision, we would like to respectfully request:

- New home construction match adjacent existing home construction. We are requesting that the conditions of approval on Page 7, Exhibit A, Item x of the Tentative Subdivision Map Case Number: WTM16-003 be modified to remove the current restrictions of; separated by a road, or a 30 foot or wider landscaped buffer. A two story home right behind our home (30 feet or 300 feet is still too close) and would significantly impact our quality of life and privacy. The property for the new subdivision is already at a higher grade than the property of the existing homes.
- Either no construction on Saturdays or lessened work hours of 9 AM to 3 PM local time.

Thank you for your consideration of this appeal.

Sincerely,

Cris and Larry Damico

From: Karen Degney
To: Mullin, Kelly
Subject: Bailey Creek Estates
Date: Sunday, February 19, 2017 8:33:39 AM

Hi Kelly,

Please add our names to the appeal to stop or revise the Bailey Creek Estates community proposed to be built.

1. We believe the traffic study to be greatly flawed.
2. We are concerned about the increase risk of flooding to our property with the additional building in the flood zone area.
3. We DO NOT want to loose the wild horses in our area.
4. We believe the builders are encroaching on the common areas owned by the Comstock Estates HOA.
5. We do not want bright lights, street lights, and increased light pollution in our rural area.
6. We do not want traffic from the proposed community to have access through our quiet neighborhood through Moon Lane to the West.

Thank you,

Karen and Ken Degney
15150 Bailey Canyon Drive
Reno NV 89521
775-233-5521
Kdegney1@gmail.com

From: Karen Degney
To: Mullin, Kelly
Cc: Kathleen Pfaff
Subject: Petition to stop Bailey Creek Estates
Date: Thursday, February 23, 2017 6:53:40 AM

Hi Kelly,

We ask about the following things,

1. Can Moon Lane where it meets the pavement on the W side into the court next to the park be blocked off so as not to allow traffic into our streets to Toll Road?
2. Can Pinion be graded and paved or at least base rocked to allow additional access to Geiger Grade in the event of flooding again, fires, emergencies that would block Toll Road or Kivett as it would be the only other way out of our neighborhood and will only be needed more with the addition of 56 homes and the increased population that will bring.
3. We want to know that the Wild Horses, which at the meeting they explained are not Wild Horses, but Feral or Stray Horses (and therefore unprotected) Sorry, but this is BS and not well received by our local community, will have access to migration to water as they do each and every year in our area. **WE DO NOT WANT THEM REMOVED FROM OUR COMMUNITY.** The majority of us here in the Virginia City Foothills enjoy them and feel privileged to live among them.
4. We want to make sure that the land belonging to the Comstock Estates HOA as common area is NOT absorbed into the community and kept as open space, this is at least one are of approx. 5 acres bordering Moon Lane.
5. We want to know that if we experience flooding like we have this winter, (we still have a river behind our home) that any drainage changed, re routed, disturbed during the construction of the new community will not create damage to our homes and land.
6. We are worried about increased light pollution and the loss of views. We would like to make sure that we do not loose our dark night skies by street lights and that only two story homes are built behind existing two story homes as stated at the meeting.
7. We want to make sure that the existing overcrowded schools are not taking on more students from this community or an explanation of what will be done to accommodate them.
8. We want assurance that the traffic study will be re assessed as it does not seem accurate that a 56 unit community will only increase the traffic by 56 cars per day. We are concerned about the entering and leaving the community onto Geiger Grade and the safety associated with that as it affects all of us using Geiger Grade.

Thank you,
Karen and Ken Degney
15150 Bailey Canyon Drive
Reno NV 89521
kdegney1@gmail.com
775-233-5521

From: Ronald Ellis
To: [Mullin, Kelly](#)
Cc: f4l4x@gmail.com
Subject: Bailey Creek Estates Appeal
Date: Saturday, February 18, 2017 9:03:33 PM

Dear Ms. Mullin,

I am writing to add my name and my wife's name, Frances P. Ellis, to the appeal filed by Ms. Pfaff in support of her efforts.

As I am a homeowner who will be directly impacted by this development, my desired outcome is the development of this land be halted and the project approval rescinded. I spoke at the Planning Commission Meeting when this agenda item was discussed on 2/7/16 as well as offering written comments. Those comments are incorporated herein by way of reference as points in support of my opposition of this project going forward.

Some of the key concerns we have: 1) Construction noise and dust; 2) Flooding of my property as a result of redirected storm water, similar to the concerns of the Fritz's in Fritz vs. Washoe County. 3) School overcrowding 4) Law enforcement, 5) Traffic issues 6) Wild Horse Safety and Displacement 7) Impact to other wildlife that will be displaced 8) Increased crime 9) Adverse environmental impact 10) Water supply 11) Fire and emergency services 12) Lowered property values.

Sincerely,

Ronald and Frances P. Ellis
High Chaparral Drive
Reno, Nevada

From: Joel
To: Mullin, Kelly
Subject: Appeal on Bailey Creek Estates
Date: Monday, February 20, 2017 2:08:50 PM

Please include my name, along with my wife Kathleen Pfaff, on the appeal she submitted to you on February 17.

Thank you,
Joel Pfaff

From: Kris
To: Mullin, Kelly
Subject: Bailey Canyon
Date: Monday, February 20, 2017 2:17:08 PM

Hello Kelly,

I am writing to express my concern with the proposed Bailey Canyon development. If we look at all the places in Reno and all around the country where homes and businesses are flooded, a single thought comes to my mind. What public official(s) allowed houses and business to be built here.

Where was their knowledge and if they had no knowledge of what they made decisions on why did they not learn first to make a wise decision.

The human species is suppose to be the most intelligent animal on this planet. Yet money and greed motivates them to constantly make unwise decisions. Decisions that don't affect them, however they affect others who are oblivious to the consequences that do occur in time. Developers don't care if the houses they built 5, 10, 20 years ago are flooded or fail because they don't live in them. Developers don't live in the homes they build to sell, they live in custom homes in wisely chosen locations that are safe and in appropriate places to build often on large sized properties. They don't live in 500+ unit condo or apartment complexes or communities where the houses are so close to each other they are looking into a neighbor's house or hearing all the noise a neighbor makes on the other side of the wall. Poor social manners are common these days and cramming too many people into a confined residential development does not provide quality of life to the people in them or the surrounding area.

I have noticed that in the past 10 or so years here in the Reno area, housing developments look more like zoos with animals all crammed together in as little space as possible. The reason for this.... so that developers can profit at the expense of the people who end up in these communities.

I am concerned that the necessary research and consideration for the current homeowner's (of the foothills area) quality of life has not been studied. As is the road noise on Toll Rd and Geiger Grade is already excessive.

It is my understanding that part of the proposed area is in a flood plan and that alone is a red flag. Please, please see that the necessary studies are conducted and wise decisions are made for life quality for people not for city or developer profits. Thank you for your time.

Regards,
Kris

From: Paula Patterson
To: [Mullin, Kelly](#)
Subject: An Appeal Against The Development of Bailey Creek Estates
Date: Sunday, February 19, 2017 2:36:51 PM

We would like to add our names to the appeal in support of Kathleen Pfaff's efforts to oppose the development of Bailey Creek Estates. We believe the decision to approve the development has been made without due diligence required to ascertain the impact this development will have on traffic, flooding potential, and our already over-populated schools.

We are not anti-growth, but do believe development must go hand-in-hand with improving our infrastructure. It seems very short-sighted to simply approve 56 new homes without requiring the associated upgrades needed to support our roads (think Veterans Parkway Circle) and our already overcrowded schools. With our weather this winter, county planning personnel must not omit proper flood mitigation measures from any neighborhood development.

Our county recently approved a tax increase for repair of our school system, and we are very concerned further neighborhood development will engender additional taxes.

Please take the time to assure all development in Washoe County is thoughtful and supportable. Our quality of life and the best environment for the education of our children relies on you.

Thank You,

Darrell and Paula Patterson
14663 Gold Run Dr
Reno NV 89521

From: julesheimbigner@aol.com
To: Mullin, Kelly
Cc: Lucey, Robert (Bob) L; f4l4x@gmail.com
Subject: Bailey Creek Estates Appeal
Date: Monday, February 20, 2017 4:48:49 PM
Attachments: GEIGERGRADE_TOLLROADFLOODC.pdf

Dear Ms. Mullin,

I'd like to add my name to the appeal completed by Kathleen Pfaff. I've attached a few items of research that I believe need to be reviewed as part of the appeal.

The Geiger Grade - Toll Road Flood Study is 11 years old. It references a 100 year flood often, but it seems those floods keep happening in the area about every 10-12 years. I believe this really needs to be reviewed during this appeal process.

The following is a relevant case, decided just last year by the Nevada Supreme Court. This is of importance, not just for reviewing the appeal, but to be financially prudent for the county to mitigate future litigation by future homeowners!

<http://caselaw.findlaw.com/nv-supreme-court/1745487.html>

Sincerely,

Julie A Heimbigner-Tullgren

STAFF NOTE: Attachment provided with this email is available online at <http://bit.ly/2nDLen5>

The attached document was submitted to the **Washoe County Board of Commissioners** during the meeting

held on APRIL 11, 2017

by KELLY MULLIN

for Agenda Item No. 16

and included here pursuant to NRS 241.020(7) as amended by AB65 of the 2013 Legislative Session.

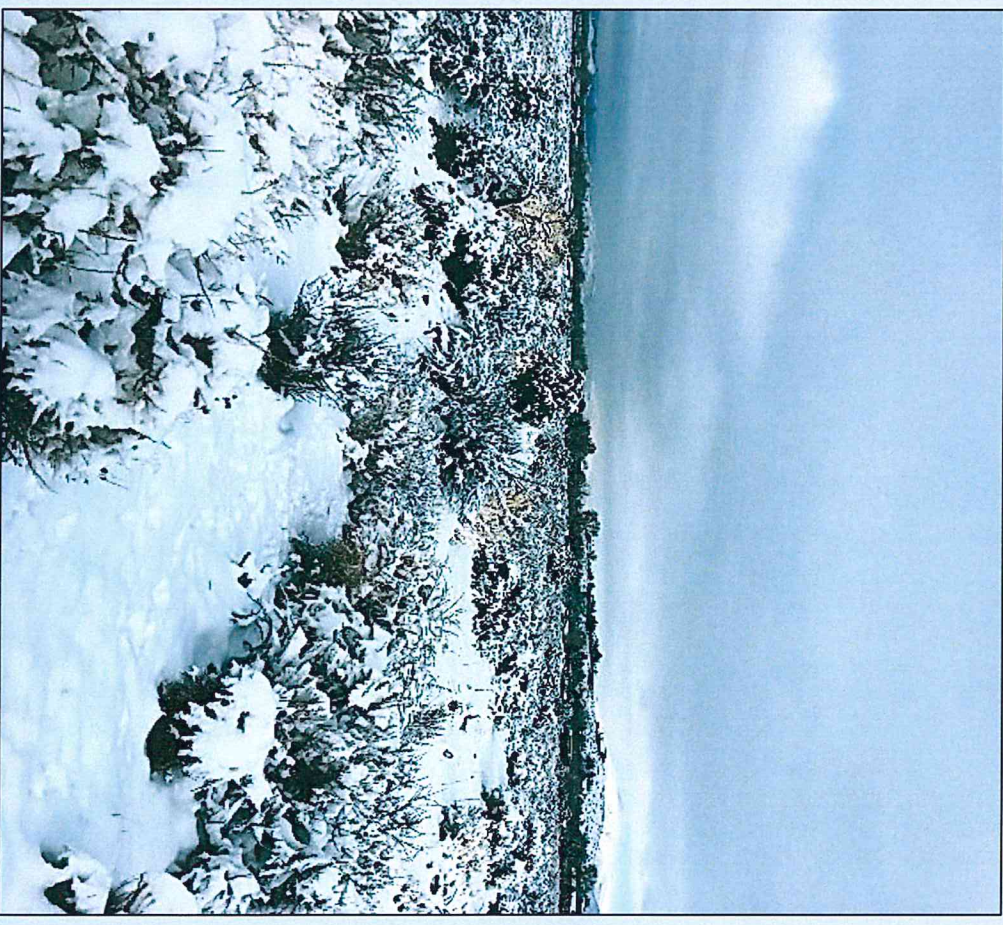


Tentative Map WTM16-003

Washoe County Commission

April 11, 2017

APPEAL OF APPROVAL FOR BAILEY CREEK ESTATES

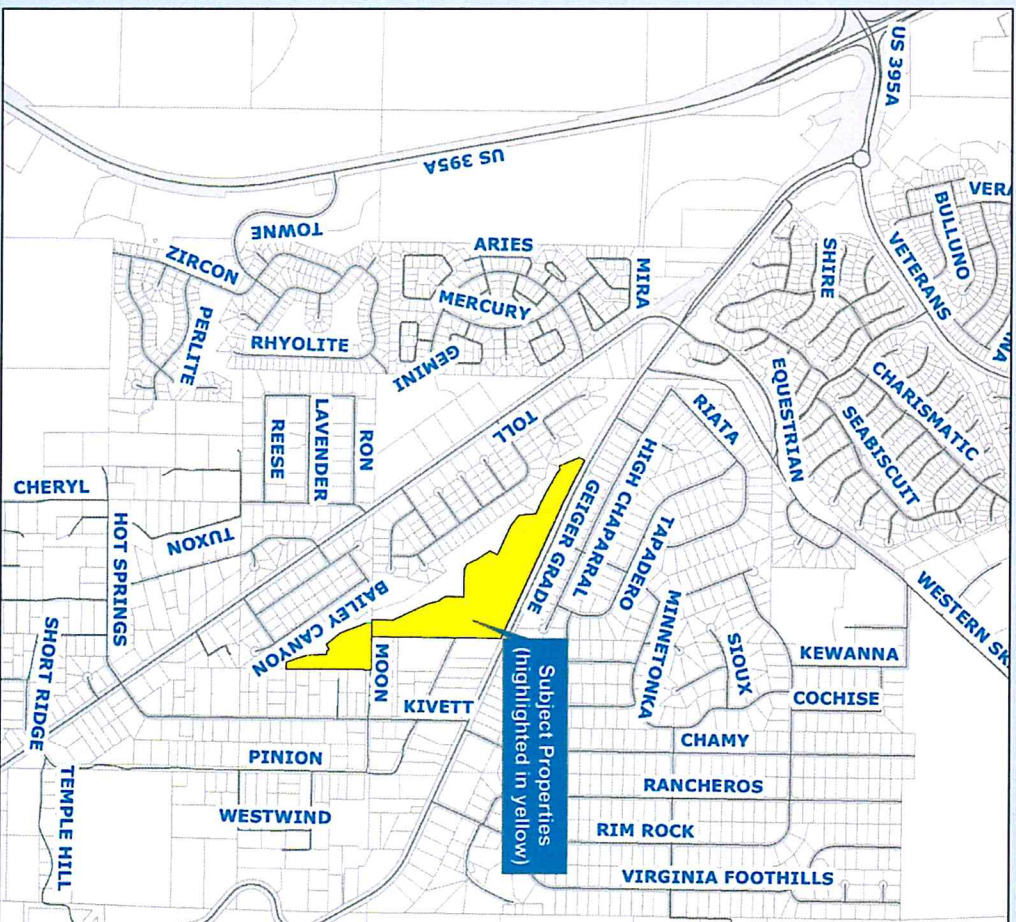


16



Vicinity Map

- Southeast Truckee Meadows Area Plan
- South of Geiger Grade at Shadow Hills Drive
- Medium Density Suburban (MDS)





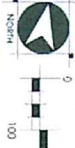
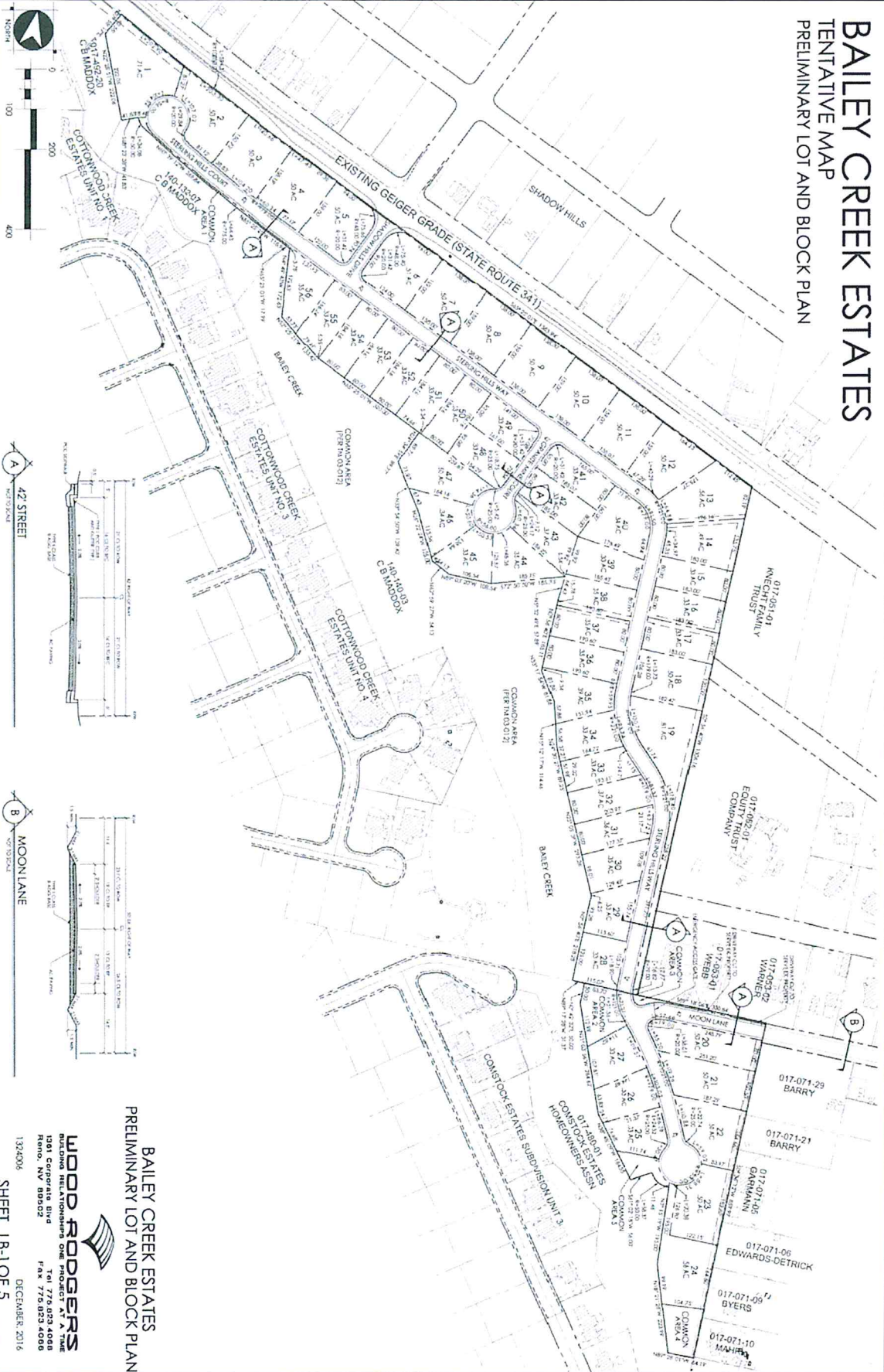
Summary of Request

- **Previously: 57-lot subdivision approved in 2004; expired 2010**
- **Currently: 56-lot infill subdivision**
- **Lots 1/3 ac. to 3/4+ ac.**
- **Main access via Geiger Grade**
- **Gated emergency access via Moon Lane**
- **Meets policies of Area Plan**



Site Plan

BAILEY CREEK ESTATES TENTATIVE MAP PRELIMINARY LOT AND BLOCK PLAN



BAILEY CREEK ESTATES PRELIMINARY LOT AND BLOCK PLAN

WOOD RODGERS
 REAL ESTATE & LAND SERVICES
 1361 Corporate Blvd Reno, NV 89502
 Tel: 775.823.4088 Fax: 775.823.4088
 1324006
 SHEET LB-1 OF 5
 DECEMBER, 2016



Planning Commission Hearing

- **Public testimony & discussion**
- **Questions/concerns:**
 - Drainage and flooding
 - Traffic
 - School capacity
 - Emergency access
 - Horses in area
 - Views & height of homes
 - Construction noise
 - Privacy & quality of life
- **Full details in minutes (Attachment C)**
- **Motion to approve passed unanimously**



Appellant Requests

- **Request to overturn approval or add conditions**
- **Flood mitigation in general area**
- **Less development in Shaded X**
- **300-ft housing buffer**
- **No approval until new schools built**
- **No Saturday construction; lessen hours**



Appellant Requests (cont.)

- **Walking path for people and horses**
- **Disclosures to new homeowners**
- **Landscaping to obscure homes**
- **New and improved access for area residents**



County Commission Options

- 1. Deny appeal and affirm approval of Planning Commission**
- 2. Modify approval of Planning Commission**
 - Add or change conditions of approval
- 3. Reverse approval of Planning Commission**
 - Indicate findings that can't be made

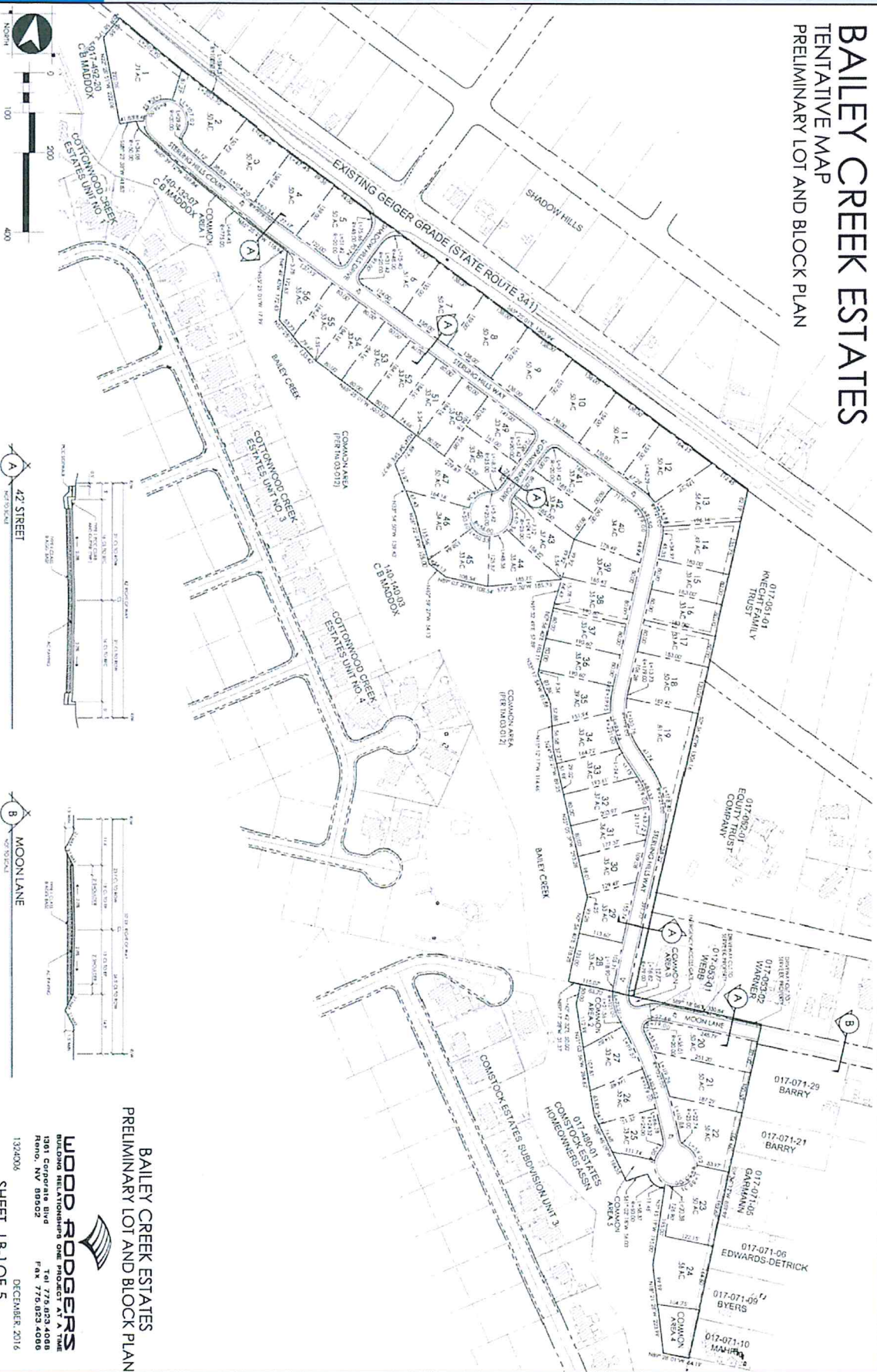


ADDITIONAL DETAILS ...



Site Plan

BAILEY CREEK ESTATES TENTATIVE MAP PRELIMINARY LOT AND BLOCK PLAN



BAILEY CREEK ESTATES
PRELIMINARY LOT AND BLOCK PLAN

WOOD RODGERS
BUILDING RELATIONSHIPS ONE PROJECT AT A TIME
1801 Corporate Blvd
Reno, NV 89502
Tel 775.823.4088
Fax 775.823.4086

1324206
SHEET LB-1 OF 5
DECEMBER, 2016



Commenting Agencies

- **Washoe County:**
 - Planning & Development
 - Engineering & Capital Projects
 - Utility Services
 - Health District
- **Washoe County School District**
- **Truckee Meadows Fire Protection District**
- **Truckee Meadows Water Authority**
- **NV Division of Environmental Protection**
- **NV Division of Water Resources**
- **Regional Transportation Commission**



Schools

- **Capacity of area schools:**
 - Brown Elementary: 137%
 - Depoali Middle: 94%
 - Damonte Ranch High: 108%
- **Development would generate:**
 - 14 elementary school students
 - 3 middle school students
 - 7 high school students
- **Students may be assigned to nearest school with capacity**
- **Brown Elementary will convert to multi-track year-round calendar for 2017-18 school year**



Traffic

Here to answer traffic questions:
Dwayne Smith, County Engineering

- **Primary access: Geiger Grade**
- **Gated emergency access off Moon Lane**
- **56 PM peak hour trips; 42 AM peak hour trips**
 - Under threshold to provide traffic study, but one was supplied as a courtesy
 - 533 ADT
- **Deceleration lane required along southern portion of Geiger Grade**



Water & Sewer

- **Water Service:**
 - Provided by Truckee Meadows Water Authority
 - Located within TMWA retail service area
 - Service from STMGID East system
 - TMWA: No impact to local domestic wells

- **Sewer Service:**
 - Provided by Washoe County Utility
 - Treatment at South Truckee Meadows Water Reclamation Facility



Grading and Drainage

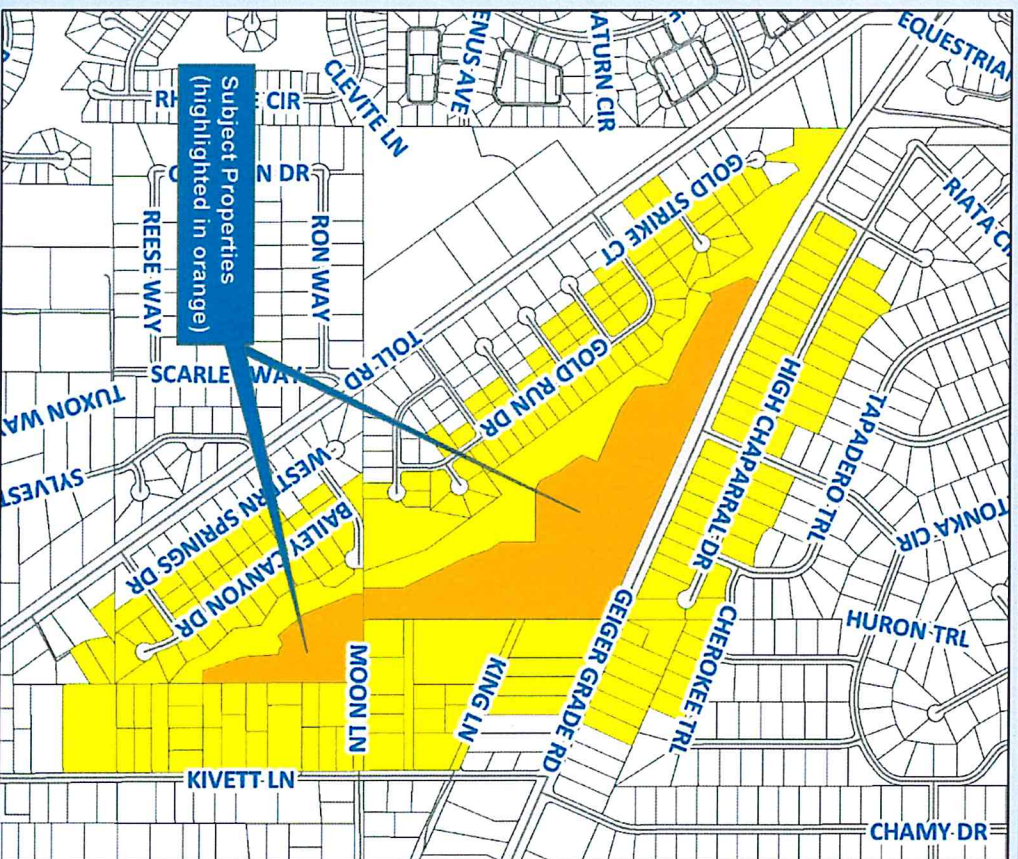
Here to answer drainage questions:
Dwayne Smith, County Engineering

- Site is relatively level
- 50,000 c.y. cut and fill to balance on site
- 5 common areas proposed for drainage & detention
- Southern portion of site is Shaded X (500-year floodplain)
- Bailey Canyon Creek located on adjacent property to west (Cottonwood Creek Estates)
(More on this later)



Public Notice

Property owners of
204 parcels within
500 feet of property
received notice





Citizen Advisory Board (CAB)

- CAB: January 25, 2017
- Questions/concerns:
 - Drainage and flooding
 - Traffic
 - School capacity
 - Emergency access
 - Wildlife in area
 - Views & height of homes
 - Construction noise
 - Development schedule
- CAB recommended comments be forwarded
- Applicant response in report addendum



Public Comment

- **Several letters received**
- **Online petition at change.org**
- **Common concerns similar to CAB meeting:**
 - Stray horses in area
 - Drainage/flooding
 - Emergency access
 - School capacity
 - Noise/light
 - Water availability
 - Traffic
 - Open Space
 - View from existing homes



Most Commonly Raised Topics

- **Horses in area**
 - BLM indicates these are not wild mustangs under federal protection or jurisdiction
 - State estray regulations apply
 - Considered stray or feral livestock
 - Property of the State
 - NRS deals mainly with collection, not protection
 - Regional Animal Services: No specific protections for estrays



Most Commonly Raised Topics

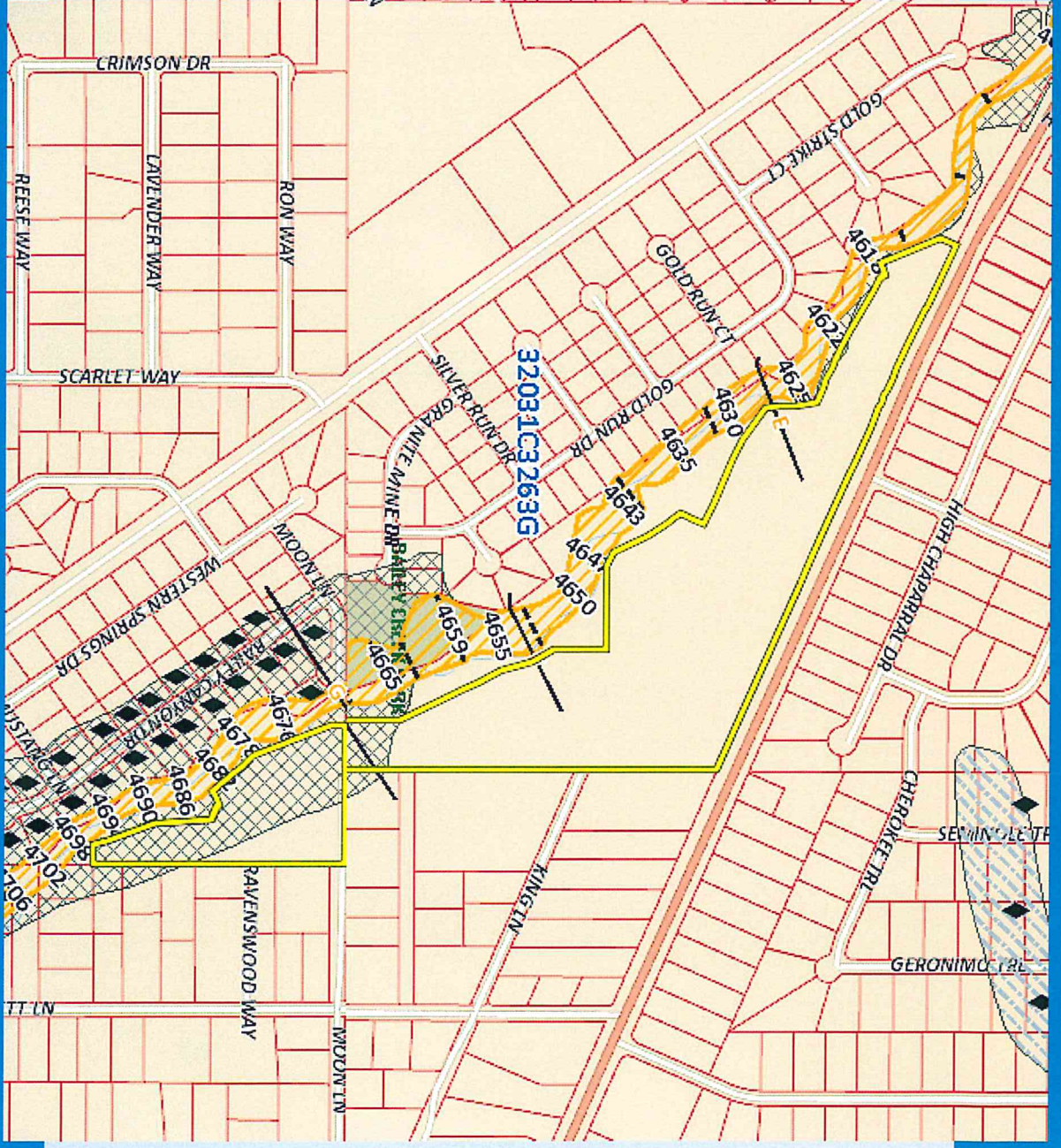
- **Drainage/flooding in general area**
 - Bailey Canyon Creek located on adjacent property to west (part of Cottonwood Creek Estates)
 - Southern portion of subject site is Shaded X (within 500-year floodplain)





FLOODWAY

Flood Zones	
	A
	AE
	AH
	AO
	D
	X
	Shaded X





County Commission Options

- 1. Deny appeal and affirm approval of Planning Commission**
- 2. Modify approval of Planning Commission**
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 - Indicate findings that can't be made

The attached document was submitted to the **Washoe County Board of Commissioners** during the meeting

held on APRIL 11, 2017

by STACIE HUGGINS

for Agenda Item No. 16

and included here pursuant to NRS 241.020(7) as

amended by AB65 of the 2013 Legislative Session.

BAILEY CREEK ESTATES TENTATIVE MAP

WASHOE COUNTY BOARD OF COUNTY COMMISSION | APRIL 11, 2017



WOOD RODGERS



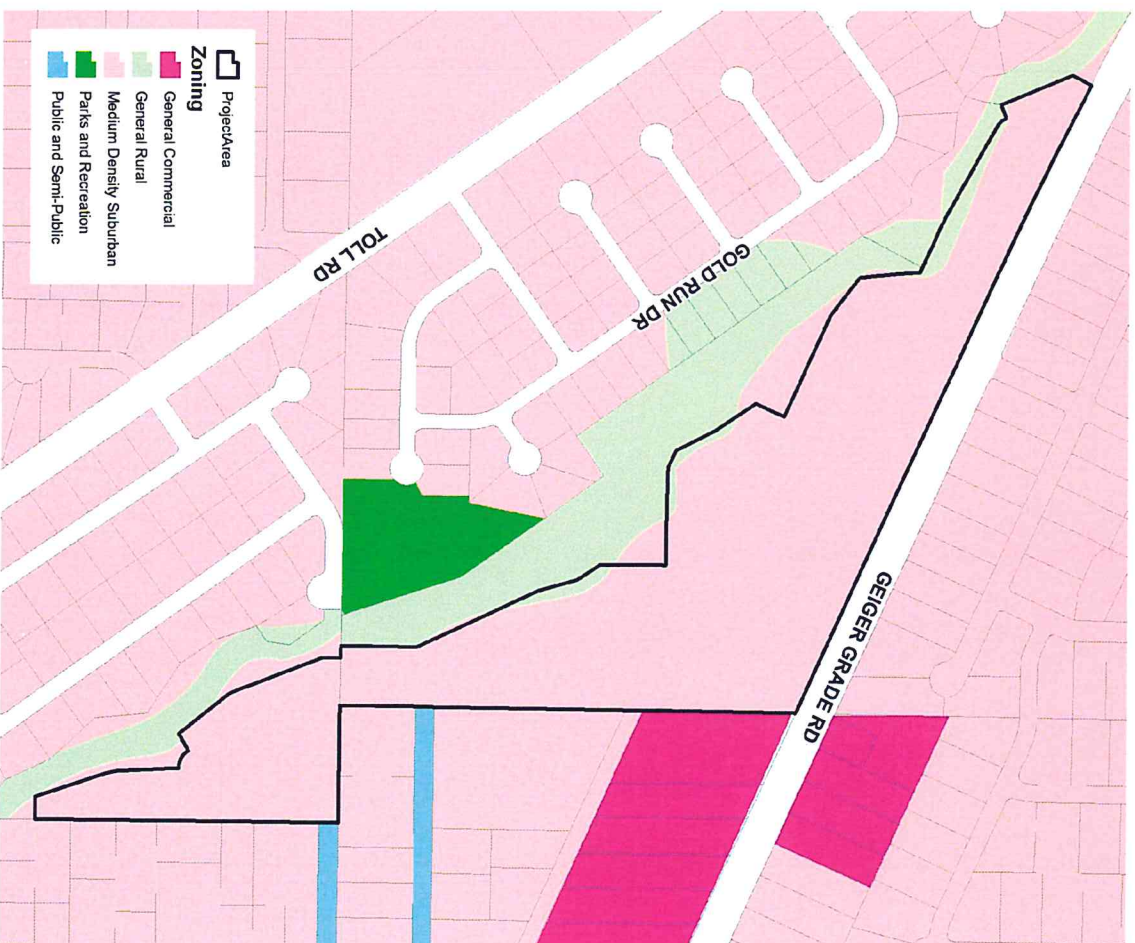
- 28.76 acre undeveloped site
- Bound by
 - ❖ Geiger Grade (north)
 - ❖ Toll Road (west)
 - ❖ Kivett Drive (east)
- Surrounding uses:
 - ❖ Single Family (north)
 - ❖ Single Family/Vacant/Commercial (east)
 - ❖ Common area/Single Family (south)
 - ❖ Single Family (west)



Project Area

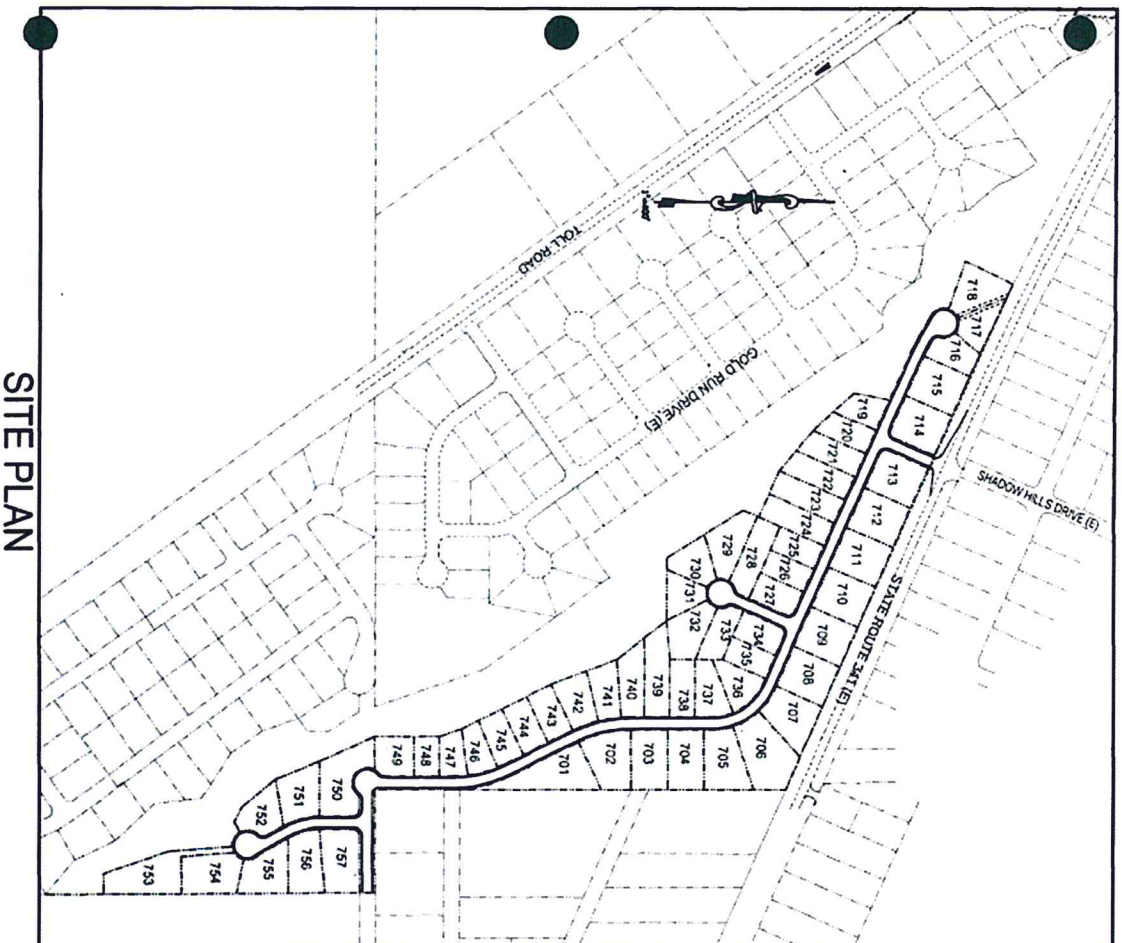
- County Land Use Designation
 - ❖ Southeast Truckee Meadows Area Plan
 - General Rural (GR) = 0.90 ac
 - Medium Density Suburban (MDS) = 27.815 ac
 - Restricts density to 2 dwelling units/acre
- Surrounding Land Use Designations:
 - ❖ North – MDS
 - ❖ East – GC & MDS
 - ❖ South – GR & MDS
 - ❖ West - MDS

Project Area



- Comstock Estates North (TM6-11-94) – Expired
- Cottonwood Creek (TM03-012)
 - ❖ Approved December 2003
 - ❖ 28.66 ± acres
 - ❖ 57 lots (2 du/acre)
 - ❖ Lots ranged from 9,988 – 32,302 sqft
 - ❖ Access via Shadow Hills Drive and Moon Lane
- Tentative Map expired before built out

Background

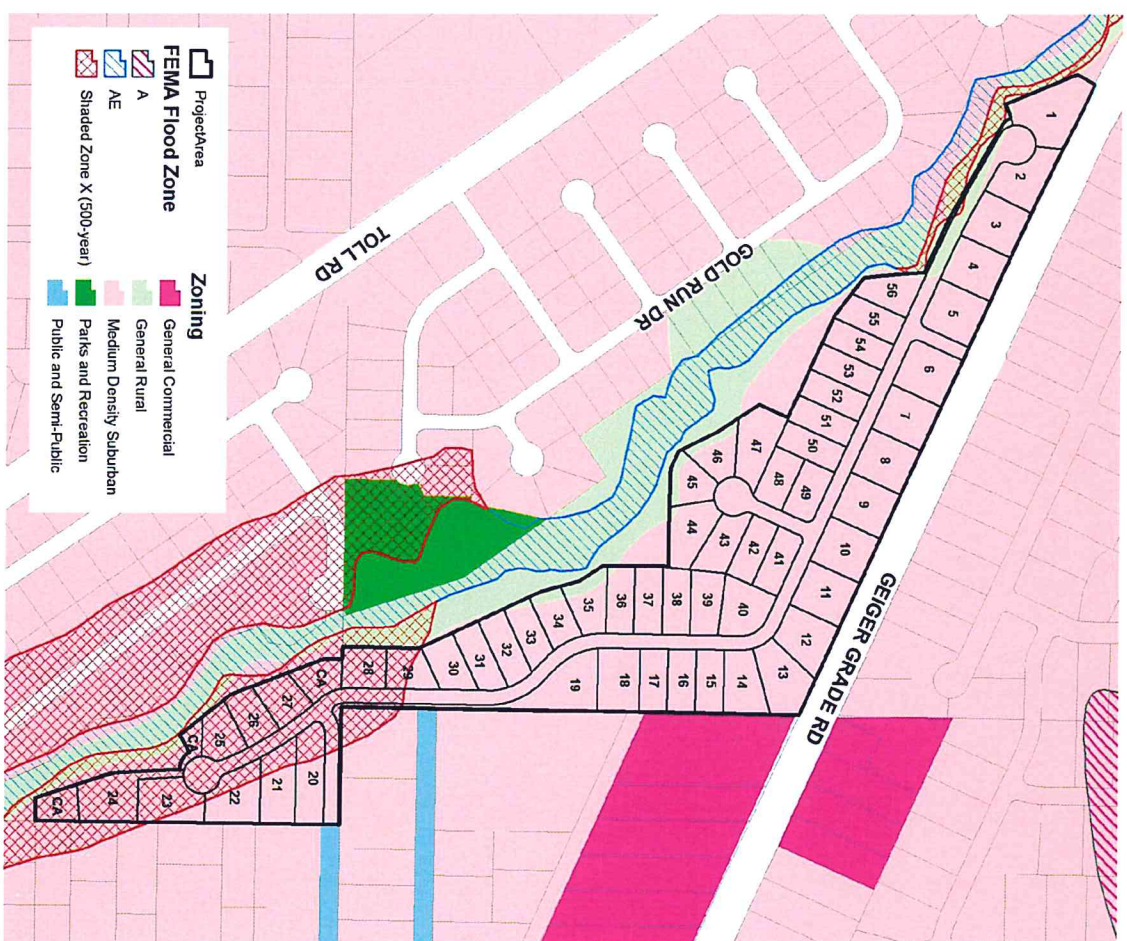


SITE PLAN

Tentative Map for 56 lots

- 1.95 du/ac (2 du/ac allowed)
- ❖ Lot sizes range from 0.33 to 0.81
 - 0.50 ac min along Geiger
 - 0.33 ac min along Creek
- ❖ Average lot size = 0.41 ac
- ❖ 0.75 acre of common area for detention and drainage
- FEMA Flood zones
 - ❖ Shaded Zone X (500-year)
 - ❖ AE – Bailey Creek
 - ❖ A – north of site

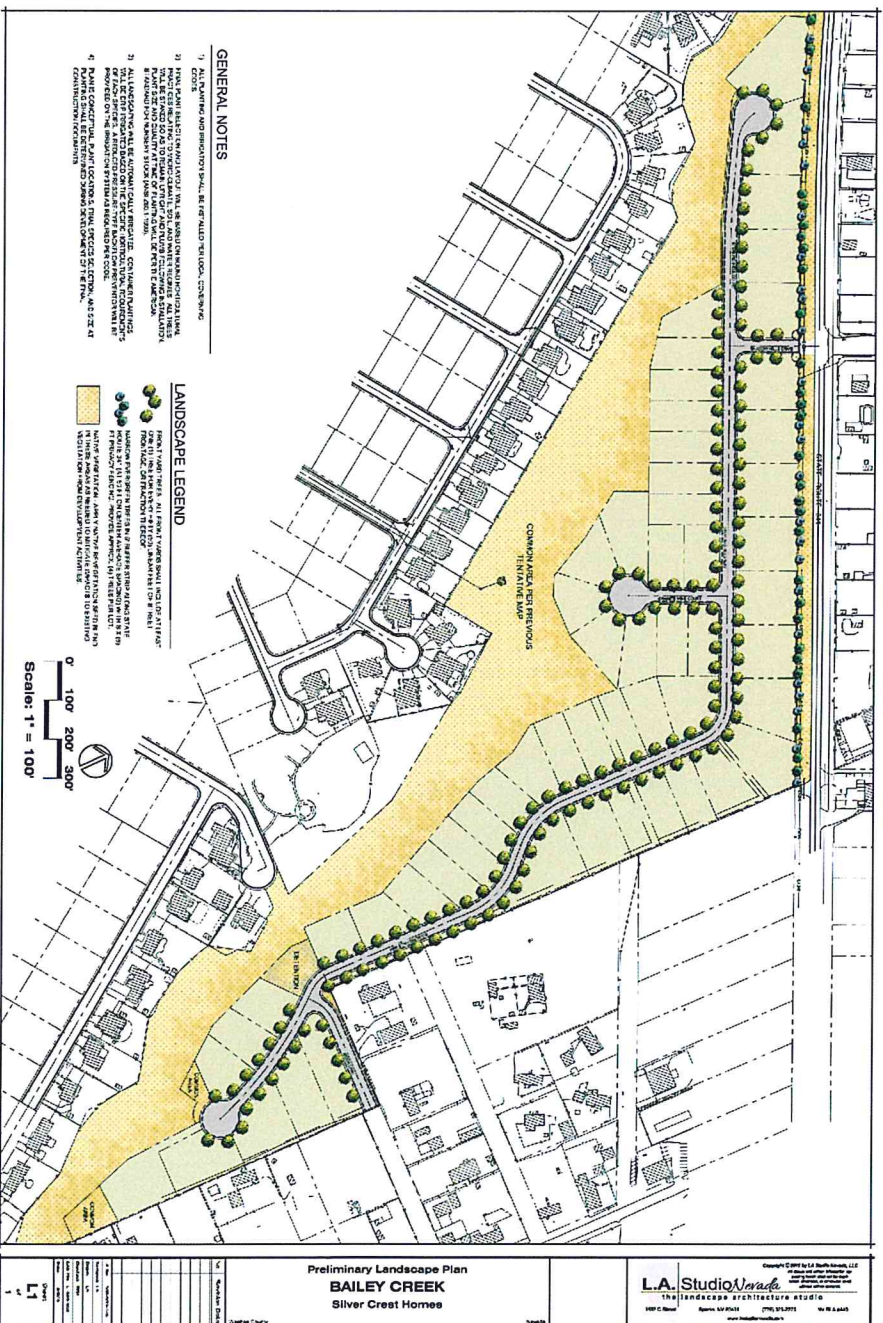
Project Request

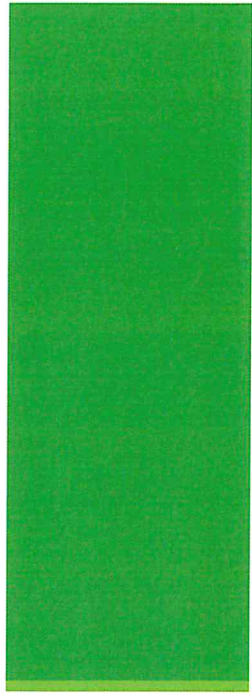


Drainage

- Onsite drainage directed to detention basins or Bailey Creek via underground storm drain pipes
- V-ditches will be provided along the project eastern boundary
- All runoff from adjacent properties and developed portions of the project site will be directed into detention basins.
- Impacts mitigated per Truckee Meadows Drainage Manual and WC Code.

Project Specifics





PLAN 4 Sierra Ranch

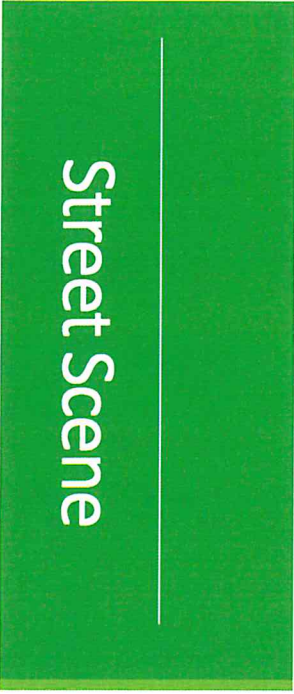
PLAN 2 Spanish Ranch

PLAN 3 Modern Prairie

PLAN 1 Sierra Ranch

03.11.17

STREET SCENE
COTTONWOOD CREEK | TIM LEWIS COMMUNITIES



Street Scene





WOOD RODGERS

Stacie Huggins
Associate

shuggins@woodroddgers.com

775.823.5258 – direct

775.250.8213 – mobile



The attached document was submitted to the **Washoe County Board of Commissioners** during the meeting

held on April 11, 2017

by Kathleen Pfaff

for Agenda Item No. 16

and included here pursuant to NRS 241.020(7) as

amended by AB65 of the 2013 Legislative Session.

FLOOD *facts*

WARNING! FLOOD DANGER

The Truckee River and its tributaries will flood again! This publication serves as a warning about the potential of future floods on the Truckee River and other areas of Washoe County. The New Year's Flood of 1997 – as bad as it was – could have been worse. The chances are high that a larger flood will occur in our watershed at some time in the future. The University of Nevada Reno, Cooperative Extension, Washoe County Division of Emergency Management, Federal Emergency Management Agency and National Weather Service want you to be aware of flood hazards. Take steps now to ensure that lives, property and financial interests are protected when the next flood occurs!

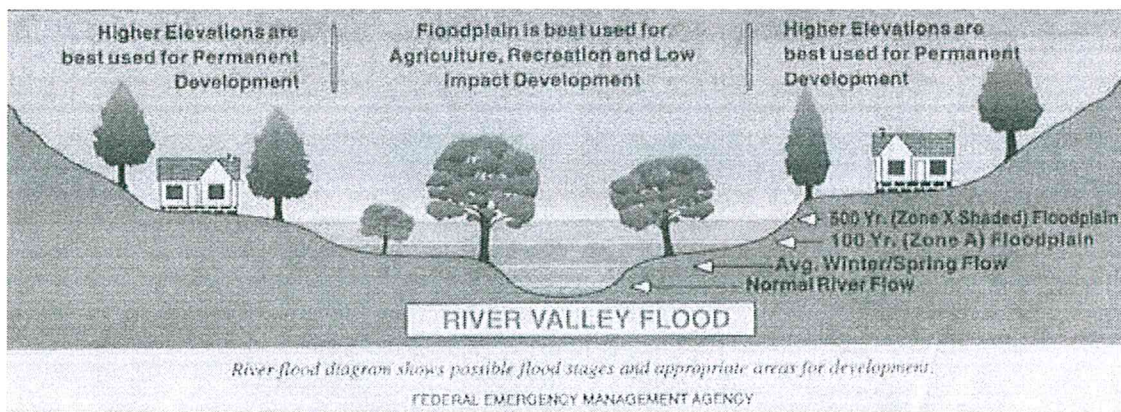
- BCC 4-11-17 #16
11-11-1994 Pfaff

PREPARE for flooding

Large river floods may occur any time between November and April in successive years, or not occur at all for many years.

Floods are Destructive and Costly

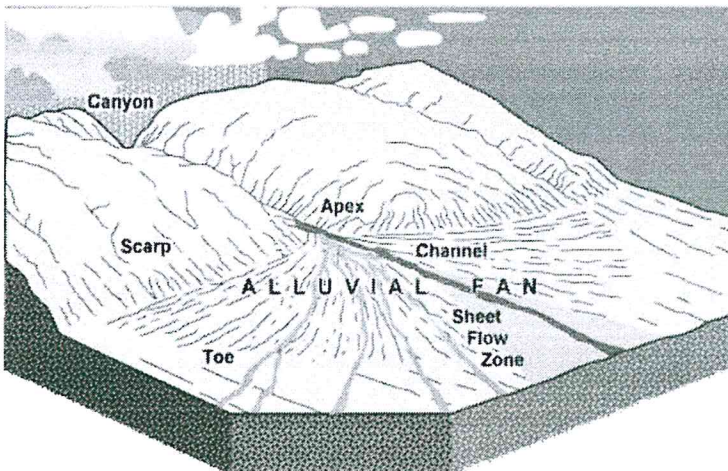
The National Weather Service has declared flooding the single most destructive natural hazard in the country. Even in desert areas like Nevada, Arizona and southern California, river floods and flash floods kill people and cause millions of dollars in property damage nearly every year. In Washoe County, as in many other areas of the West, we have built residential communities on river flood plains and alluvial fans.



Residents and business owners are urged to prepare for floods before they happen. Because years and even decades can pass between major floods, citizens are often caught unaware when they do occur.

Residents of Washoe County are vulnerable to two kinds of flooding. We have major winter floods on the Truckee River and its larger tributaries such as Steamboat Creek and the North Truckee Drain. We also have summer flash floods on small creeks, washes and alluvial fans.

Alluvial Fans Produce Unpredictable Floods



As a flash flood rushes out of a confined (concave) canyon at the top (apex) of a fan, it's contained for a short distance in a single, high-velocity channel. (See illustration) This channel, like the ravine upstream, is a high-hazard flood zone, threatening lives and structures in its path. In areas where the channel is not deeply entrenched, it can become clogged with debris not far below the apex, and cut a new path on the convex surface of the fan. This makes alluvial fan flooding much less predictable than valley bottom flooding.

Where canyons are close together, their fans tend to merge. These fans are sometimes hard to recognize because they're not always cone-shaped.

According to the FEMA manual, "Alluvial Fans: Hazards and Management" (FEMA, 1989) it's difficult to predict how severe the hazards will be for any given neighborhood. Since a channel can change location during a flood, almost all neighborhoods on fans are in a potential flood path. While predicted flood depths may average a foot or less over much of the fan, a rampaging flood can erode a gully 1 to more than 10-feet deep on one lot and deposit the sediment several feet deep a short distance down the street. Flash floods can also deposit large boulders, tree trunks and other debris on the fan surface below Sierra canyons. In the arid West, there's a tendency to underestimate the potential and severity of flash flood events on alluvial fans.

“There is a critical need to provide guidance to communities, developers and citizens on how to accommodate growth while protecting life and property from flood hazards on alluvial fans.”

Summer Flash Floods Drench Suddenly

A flash flood is a local flood of great volume and short duration. Small creeks and the usually dry "washes" that flow into the Truckee Meadows and surrounding valleys from nearby mountains are susceptible to summer flash floods. A wall of water can rush onto the valley floor from canyons or ravines just minutes or hours after a summer thundershower has drenched the headwaters a few miles upstream.

After floods emerge from a canyon, they deposit sediments that accumulate over time to form alluvial fans. While gently sloping fans at the foot of the mountains provide attractive development sites, they can also harbor severe flood hazards for those who live there.

The Federal Emergency Management Agency (FEMA) has identified a "critical need to provide guidance to communities, developers and citizens on how to safely accommodate growth while protecting life and property from flood hazards on alluvial fans." (FEMA 165, 1989)

Streams and Drainages Which Have Flash Flood Histories

1. Galena Creek
2. Thomas Creek
3. Steamboat Creek
4. Evans Creek (both Reno locations)
5. Whites Creek
6. Peavine Creek and Drainages
7. Skyline Wash
8. Browns Creek
9. Jones Creek
10. Ophir Creek
11. Hunter Creek
12. Dry Creek
13. Hidden Valley Drainages
14. Dog Valley Creek
15. Alum Creek
16. Spanish Creek
17. Golden Valley
18. Sun Valley
19. Lemmon Valley
20. Cold Springs
21. Bailey Canyon Creek
22. Jumbo Grade
23. West Washoe Valley
24. Incline Villages

Beware of Winter Floods on the Truckee River



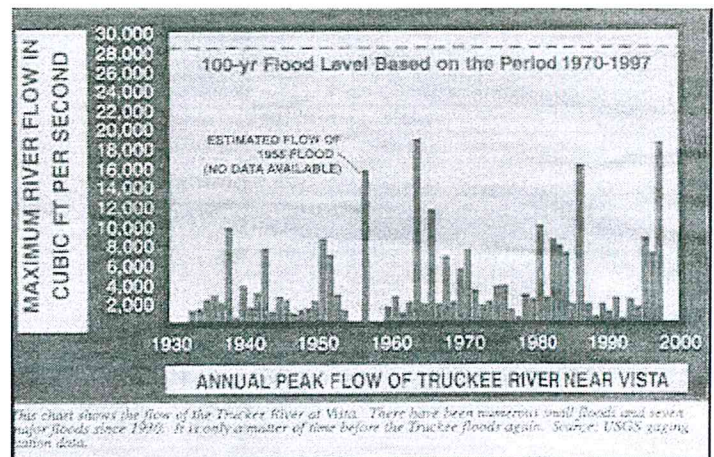
The famous New Year's flood of 1997 was a classic winter flood on the Truckee River. It flooded low-lying floodplains adjacent to the river and its major tributaries such as Steamboat Creek.

It caused more than 450 million dollars in damage, closing the Reno-Tahoe airport and shutting down businesses for days and weeks. The flood also caused environmental damage when sediments, urban pollutants and flood debris were washed downstream.

Winter floods of the Truckee River have occurred many times since Reno and Sparks were founded. Major floods occurred in the Truckee Meadows in 1862, 1875, 1890, 1904, 1907, 1928, 1937, 1943, 1950, 1955, 1963, 1986 and 1997.

The primary cause of river flooding has always been winter rainstorms that saturate and melt the Sierra snow pack at elevations between 4,500 and 8,000 feet or higher. Though most winter storms bring snow to elevations above 6,000 feet, a series of warm storms occasionally dumps rain at higher elevations. The January 1997 floods were caused by several warm storms, which swept into the Sierra Nevada from the Hawaiian Islands and rained on a heavy snow pack. This weather pattern is called "The Pineapple Connection" or "The Pineapple Express."

Winter flooding by rain-on-snow weather events will continue to cause damage to urbanized valley floors in Reno, Sparks and other low-lying Washoe County communities. Large river floods may occur any time between November and April in successive years, or not occur at all for many years.



FLOODING history

"Floods and Flash Floods are the #1 weather-related killer in the United States,"

National Weather Service

Truckee Meadows has a Long Flash Flood History

Flash floods have occurred on most small streams, drainages and washes in the Truckee Meadows vicinity. Detailed accounts of many of these cloudburst floods have described them as "walls of water." It's interesting to note that in several accounts, flooding resulted from the merging of convective thunderstorm cloud cells. A rainfall rate as high as 10 inches an hour was estimated for short durations in one particular instance.

100-Year Floods Can Happen Any Year

The most dangerous flood zones have an A, AE or AO designation. They are commonly referred to as 100-year flood zones, Special Flood Hazard Areas (SFHA :) or regulatory floodplains. Residents in these zones are required to buy flood insurance if they have federally assisted financing. See the map on pages 6 & 7 for a general delineation of flood-zone areas.

The 100-year flood is the accepted national standard used to designate regulatory floodplains. A 100-year flood is not a flood that happens once every 100 years. Instead, it's a flood so large it has a 1-percent chance of occurring in any year. The term "100-year" refers to the size of a flood, not how often it occurs. Decades may go by without a 100-year flood. On the other hand, several 100-year floods could occur within a few years.

A Sampling of Major Summer Flash Floods

July 1869: A cloudburst flood resulted from a heavy thunderstorm. Intense rain accompanied by hail resulted in flooding 2-feet deep from Browns School to Huffaker School in the southern Truckee Meadows.

August 15, 1878: Torrential rain (a "monster cloudburst") fell for 3 hours on watersheds southwest of Reno. Thomas Creek turned into a raging torrent 400-feet wide and 3-feet deep, gouging its channel to bedrock in many locations.

July 18-26, 1913: An almost daily occurrence of thunderstorms produced flooding from canyons draining into the Truckee River west of Reno. The most severely affected streams were Hunter Creek and Alum Creek. Galena and Browns Creeks poured a "solid sheet of water" into Pleasant Valley. An automobile mired on the highway was buried under a 30-foot thick deposit of flood debris.



Flood of March 1928, Glendale. Early-day Truckee Meadows motorists get a helping hand from a Glendale area farmer

Photo courtesy of the Nevada Historical Society

July 29, 1952: Floodwater from Galena Creek inundated hayfields in Pleasant Valley and deposited a thick layer of silt and sediment, damaging or destroying most of the baled hay in the fields. Highway 395 was blocked, and miles of fence and irrigation ditches were destroyed.

July 20, 1956: A wall of water, reportedly 10 feet high, rushed down Galena Creek, washing several cars off the Mount Rose Highway.

A 100-year flood is not the only flood zone. The FIRM maps also show the 500-year floodplains, areas with a 0.2 percent chance of being flooded any year. Some dams are built to withstand the worst possible flood that could occur, which is considerably larger than even a 500-year flood.

Find Out if You Live or Work in a Flood Zone!

If you live in a canyon, near a river or stream, or on an alluvial fan at the foot of mountain drainage, you may live in a flood zone. Find out by checking a [Flood Insurance Rate Map](#), (also known as a FEMA or FIRM flood map) available at local public works offices.

The 100-year Flood Strikes Again!

Flood Frequency Concept 1:

The probability that a 100-year flood will strike a river in California or Nevada is the same every year, regardless of how long it's been since the last 100-year flood.

Flood Frequency Concept 2:

It's not a certainty that the 100-year event will occur sometime in the next 100 years (although it's pretty likely).

Flood Frequency Concept 3:

In California or Nevada, where historic data is sparse, the 100-year floodplain is likely to grow following a major flooding event.

Flood Frequency Concept 4:

It's a virtual certainty that the defined 100-year floodplain is not the actual 100-year floodplain.

Peak flow on the stream gage at Galena Creek near Steamboat was recorded as 4,730 cubic feet per second (cfs). A mother and two children tragically perished in this flood. A fourth victim died while trying to rescue the family. The same convective storm that deluged Galena Creek dumped heavy rains on Peavine Mountain, causing the most disastrous flood ever seen on the mountain's barren south slopes. The waters ravaged homes, yards and streets in northwest Reno, and flooded business establishments in the northwest part of downtown Reno.



Most flood deaths occur when people try to drive through flooded areas. This car was swept off the Mt. Rose highway in 1956 trapping and killing the occupants.

Photo courtesy of Special Collections, Gatchell Library, University of Nevada, Reno.

☞ August 15, 1965: An intense summer thunderstorm caused significant flooding in the southwest drainages. Extensive development of homes in lower Galena Creek in Pleasant Valley shifted flood damage from the middle to lower portions of the valley. Highway 395 in Pleasant Valley was closed to traffic for three hours by a 300-foot wide, 5-foot wall of water, mud, rocks and debris. A 2,000 foot stretch of the Mount Rose Highway was also blocked by flood debris. Whites Creek produced flood flows that reached a peak of 2,280 cfs, and the flow at Galena Creek near Steamboat peaked at 3,670 cfs. The storm that caused this flood was also responsible for disastrous flooding in Incline Village.

☞ July 16, 1971: One of the more recent flash floods occurred in the east foothills of Hidden Valley. This flood caused considerable property damage, but no injuries.

FLOOD preparation

Let Flood Insurance Protect Your Home

It's not possible to completely protect all areas subject to flooding with flood-control structures. Recognizing the importance of a nonstructural approach to reducing flood losses, Congress created the National Flood Insurance Program (NFIP) in 1968. Its purpose is to provide affordable insurance forecasting floodplain development and to protect future development from flood losses. FEMA administers this program.

Washoe County participates in the NFIP. It has adopted floodplain ordinance that regulates development within the 100-year floodplain, or SFHA. This area is shown as Zone A, AK, AH or AO on the maps. A floodplain development permit is required for new construction, substantial improvements to existing buildings, and any other man-made changes to floodplains, such as mining, dredging, filling, grading, paving, excavation or drilling operations, or storage of equipment or materials.



Because Washoe County participates in the NFIP, flood insurance is available to residents as financial protection against flood losses. Flood insurance can be purchased on any building from a licensed insurance agent. Some insurance companies issue flood insurance under their own names, but it's still federal flood insurance governed by the requirements of the NFIP.

By law, mortgage lenders must require the purchase of flood insurance as a condition of any federally regulated or guaranteed loan to buy, construct, repair or improve a building that is located in a SFHA.

You may want to buy flood insurance even if your house is not in a 100-year flood zone. Some floodplains, designated "Zone X-shaded," can be hazardous, though not as hazardous as 100-year floodplains. Also rivers are not the only source of flooding. Alteration of natural drainage patterns and inadequate or blocked storm drains can flood areas not previously identified as flood-prone. Regardless of where your property is located, it's to your advantage to educate yourself about flood and drainage conditions in your area. Flood insurance rates are based upon the flood risk to a structure. Rates reflect location and how well a building is protected from flood damage.

In Washoe County, new construction and substantial improvements to structures in a SFHA must have finished floors elevated foot or more above the predicted depth of the 100-year flood. Before building or repairing a structure in the flood zone, check with your insurance agent to get the cost of flood insurance for the completed project. If you're required to purchase a flood insurance policy for any reason, it's critical to maintain that coverage so your loan is not jeopardized and you can qualify for disaster assistance.

Reminder: Federally subsidized flood insurance | does not cover the contents of a home unless you purchase additional coverage for that purpose. Check the policy to see if it covers the contents. For information on flood insurance, contact your insurance agent or the NFIP insurance contractor, Computer Sciences Corporation, at (800) 638-6620. Lenders and insurance agents desiring information on training seminars and technical issues should call (713) 531-5990.

Call these Emergency Numbers for Help
If you have a life-threatening emergency, call 911

Washoe County Emergency Management	(775) 328-2095
City of Reno Emergency Management	(775) 334-2300
City of Sparks Emergency Management	(775) 353-1619

How to Prepare for a Flood

Even though county and city governments are preparing for disasters such as earthquakes and floods, you need to be ready to respond to these emergencies as well. Because power, water, gas and even transportation routes can be cut off during a disaster, you and your family should be prepared to be self-sufficient for at least three days.

Here are some tips on preparing for a flood:


1. Find out if you are in a Flood-Prone Area.


Call or visit one of the offices listed on the back page to check the Flood Insurance Rate Map for your neighborhood. Find out if you live in a Zone A (SFHA) or a less hazardous Zone X-shaded flood zone. Identify dams in your area and determine whether they pose a hazard. If you live in a flood zone, consider buying flood insurance. There is usually a five-to 30-day waiting period before it takes effect. Insurance rates tend to be from \$400 to \$1,000 annually.


2. Learn How to Use Emergency Information.


Check your local TV and radio stations for more information. Purchase a National Oceanic and Atmospheric Administration (NOAA) Weather Radio, one with battery backup and a tone-alert feature that automatically alerts you when the National Weather Service issues a flood watch or warning.


3. Know the Terms Used to Describe Flooding Dangers.

 Flood Watch-Flooding is possible. Stay tuned to NOAA radio, commercial radio or television for additional information.

 Flash Flood Watch-Flash flooding is possible. Move to higher ground. A flash flood could occur without warning.

 Flood Warning-Flooding is occurring or will occur soon. If advised to evacuate do so immediately.

 Flash Flood Warning-A flash flood is occurring. Go to higher ground on foot immediately.

 Urban and Small-Stream Advisory or Warning-Flooding of small streams, streets and low-lying areas is occurring.

4. Create A Family Disaster Plan.

- ✿ Talk to your family about flooding and other disasters. Determine the safest routes to high ground from home, school and work locations. Make sure everyone knows exactly where to go if ordered to evacuate.
- ✿ Plan a place to meet your family in case you become separated in a disaster and can't return home.
- ✿ Choose a family contact phone number (preferably someone living out-of-state who's easy to reach by phone) to let other family members know where you are. After a disaster, it's often easier to call long distance.
- ✿ Talk to your neighbors about helping each other in an emergency. Determine special help needed for elderly or disabled people.
- ✿ Plan how to take care of pets.
- ✿ Teach children how and when to call 911 for emergency help.

5. Assemble a Family Disaster Supplies Kit. Keep this stocked for any emergency, not just a flood. Stock enough supplies for at least three days. Place the ones you'll most likely need for an evacuation in a portable, waterproof container. Here are the basics your kit should include:

- ✿ Drinking water in nonbreakable containers. Store 1 gallon per person for each day. Have at least a three-day supply.
- ✿ Three days of food. Select items that require no refrigeration, preparation or cooking and little or not water. Include canned foods and high-energy foods such as crackers, peanut butter and jelly, etc. Pack baby food if needed.
- ✿ First-Aid Kit. Keep one at home and one in each car. Include bandages, moist towelettes, soap, scissors, tweezers, pain/fever medication, antiseptic, thermometer, etc. Include prescribed medications.
- ✿ Clothing. Include a complete change of clothes for each person as well as rain gear, wool hat, gloves and waterproof boots.
- ✿ Bedding. Pack blankets, sleeping bags, pads and ground cloths.
- ✿ Tools and Supplies. Include flashlights, battery-powered radio with extra batteries, eating utensils, knife, can opener, rain tarp or tent, matches, toilet paper, towels, some cash, eyeglasses, etc.

FLOOD zones

Note: These maps are based on information available from Washoe County and from Current (1994) Flood Zone Maps. However, because of the scale, they represent only approximate flood zone locations. For detailed information about your neighborhood, please study the firm maps themselves, which are located at the agencies listed below.

MAP LEGEND

**100-YEAR FLOODPLAIN:
(ZONE A) - SPECIAL FLOOD
HAZARD AREAS INUNDATED
BY 100-YEAR FLOOD**
1% Chance of occurring in any year.



**500-YEAR FLOODPLAIN:
(ZONE X SHADED) - 500-YEAR
FLOOD AND/OR AREAS OF
100-YEAR FLOOD WITH
AVERAGE DEPTHS OF LESS
THAN 1 FOOT**
0.2% Chance of occurring in any year.



**EXISTING WATER FEATURES:
LAKES, RIVERS, STREAMS**



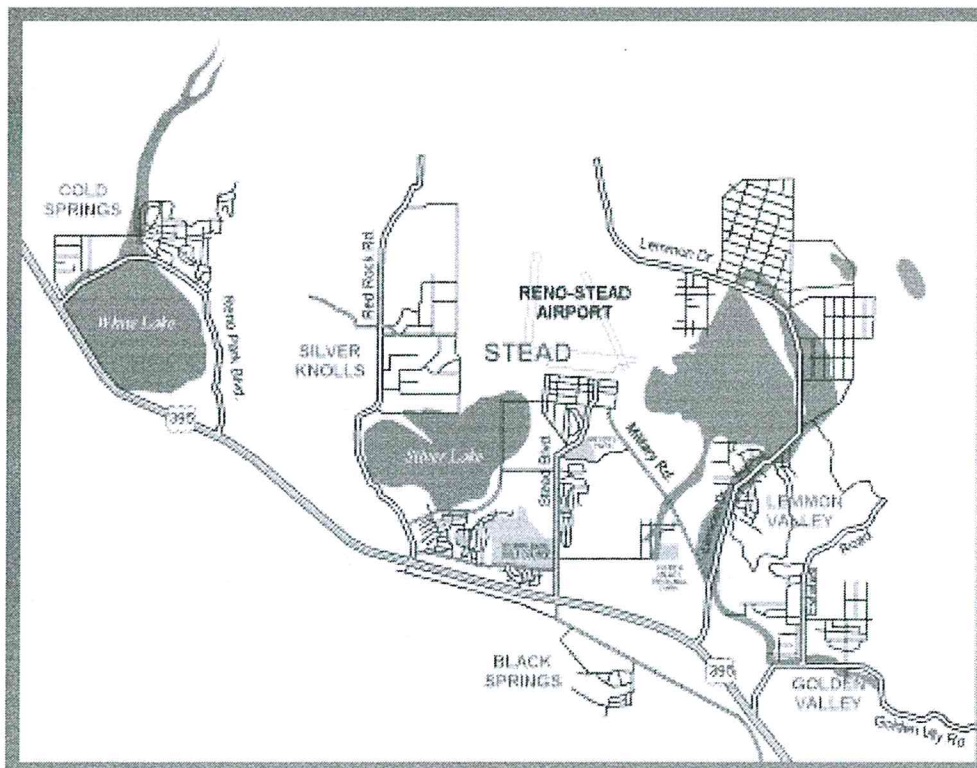
**RECREATIONAL AREAS:
PARKS AND GOLF COURSES**

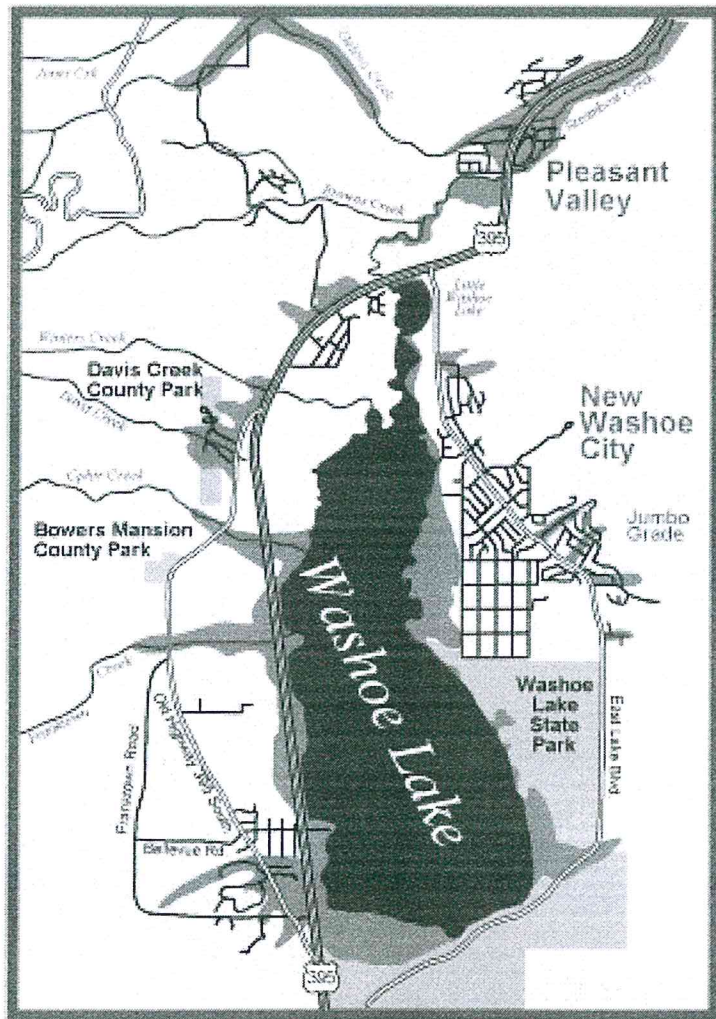
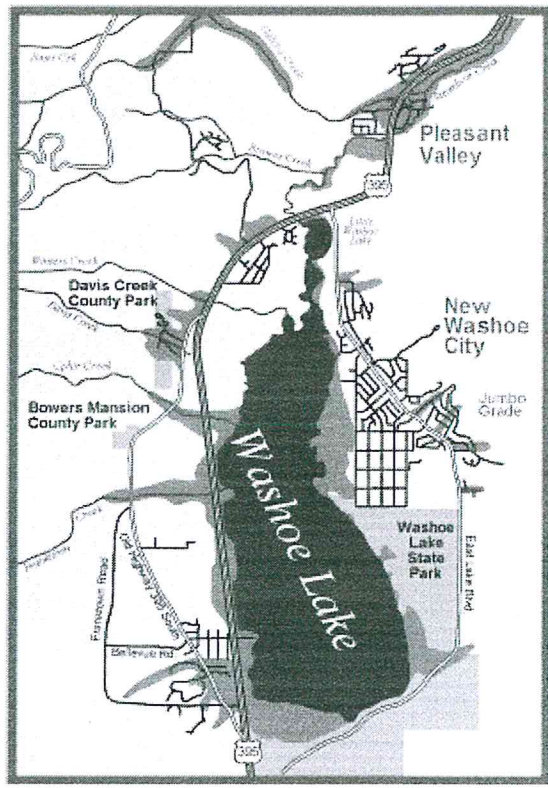
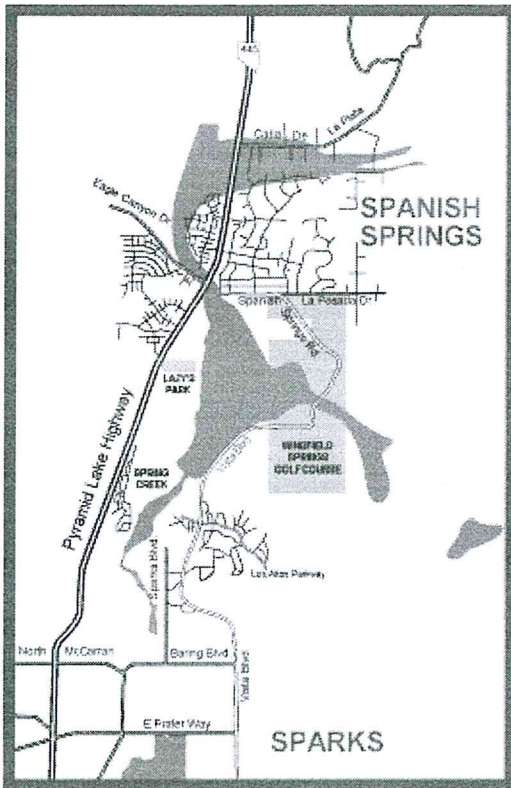


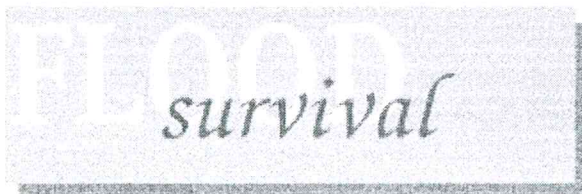
FREEWAYS - HIGHWAYS:



ROADS - STREETS:







What to do During a Flood

1. Keep a battery-powered radio: It's for emergency use in case your electric power is cut off.
2. When outside the house, remember, floods are deceptive: Avoid flooded roads and don't attempt to walk or drive through floodwaters.
3. If, and only if time permits, take these precautionary steps:
 - Turn off all utilities at the main power switch and close the main gas valve if evacuation is likely.
 - Don't touch any electrical equipment unless it's in a dry area and you're standing on a piece of dry wood wearing rubber gloves and rubber-soled boots or shoes.
 - Move valuable papers, furs, jewelry, clothing and other contents to upper floors or higher elevations.
 - Fill bathtubs, sinks and jugs with clean water in case the regular supply is contaminated. Sanitize these items by rinsing with bleach.
 - Board up windows or protect them with storm shutters.
 - Bring outdoor possessions inside the house or tie them down securely. This includes lawn furniture, garbage cans, tools, signs and other movable objects that could be swept away or hurled about.
4. If it's safe to evacuate by car, consider the following:
 - Stock the car with nonperishable foods (canned goods), a plastic container of water, blankets, first-aid kit, flashlights, dry clothing, and any special medication needed by your family. See family disaster supplies kit.
 - Keep the gas tank at least half full since gas pumps at service stations will not be working if electricity is cut off.
 - Don't drive where roads are flooded. Parts of the road may already be washed out. If your car stalls in a flooded area, quickly abandon it. Floodwaters can rise rapidly and sweep a car (and its occupants) away. Many deaths have resulted from attempts to move stalled vehicles.
5. If you're caught in your home by rising water, move to the second floor and, if necessary, to the roof:
 - Take warm clothing, a flashlight and a portable radio.
 - Wait for help - don't try to swim to safety. Rescue teams will be looking for you.

What to do After a Flood

1. Prior to entering a building:
 - Check for structural damage. Make sure it's not in danger of collapsing.
 - Turn off any outside gas or electricity lines at the meter or tank. If you smell gas, call the utility company immediately.
2. Upon entering the building: Use a battery-operated flashlight, not an open flame, as a source of light. Gas may still be trapped inside.
3. Watch for downed electrical wires:
 - Make certain the main power switch is turned off.
 - Do not turn on any lights or appliances until an electrician has checked for short circuits.
4. Cover broken windows: Cover holes in the roof or walls to prevent further weather damage.
5. Proceed with immediate clean-up measures:
 - Perishable food items pose a health risk. Throw out any fresh food and medicines that have come in contact with floodwaters.

- For the insurance claim, the items should be listed and photographed before discarding.
6. Be careful of water for drinking and food preparation:
- Tap water should be used only if the public water system has been declared safe.
 - In an emergency, water can be obtained by draining a hot water tank or melting ice cubes.
7. Take pictures of the damage to your building and its contents:
- Refrigerators, sofas and other appliances should be hosed off and kept for the adjuster's inspection.
 - Use a household cleanser to clean items that will be kept.
 - Any partially damaged items should be dried and aired. The adjuster will make recommendations as to repair or disposal.
8. All wet items must be thoroughly cleaned and dried: All equipment must be repaired and cleaned before use.
9. Be aware that roads, walkways and staircases may be undermined by floodwaters: They should be checked before use to make sure they're safe. Take pictures, etc.

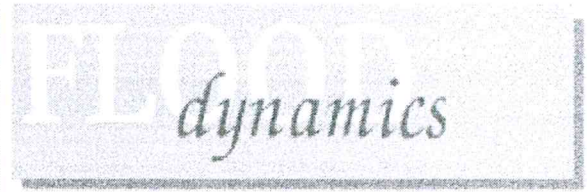
NOAA WEATHER RADIO - BUY ONE NOW!

Up-to-the-Minute Flood Reports and Much More

NOAA Weather Radio is not just for emergencies. It's a round-the-clock source of weather reports and information that helps you in preparing for the day ahead. When trouble arises, there is no substitute for NOAA Weather Radio. The constantly updated broadcasts provide dependable information when you need it most. The network offers listeners vital information about where to turn for help after severe storms and other emergencies occur. The radios come in many sizes with variety of functions. Pocket radios can be used for outdoor activities, or carried on family trips. Many of the radios receive a tone-alert signal, triggering a built-in alarm that warns listeners of severe weather announcements in their area. Weather information available on NOAA Weather Radio in western Nevada and eastern California originates from the National Weather Advice office in Reno. The broadcast cycle repeats every 4 to 6 minutes, depending on weather conditions. Information on NOAA Weather Radio includes:

1. Flood watches or warnings affecting the Truckee, Carson, Walker, Susan or lower Humboldt Rivers.
2. Hazardous weather watches, warnings or advisories affecting the area.
3. Other emergency information as requested by local law enforcement, fire or emergency management agencies.
4. Short-term forecast of expected weather conditions over the next 1 to 6 hours.
5. Latest regional forecasts for the next five days.
6. Latest regional weather observations (updated hourly).

During the New Year's flood of 1997, downtown Reno and the Sparks industrial area were devastated by severe flooding. Such floods will undoubtedly continue to occur.



1997 New Year's flood in the Sparks industrial area.
Photo by Marilyn Newton, Reno Gazette-Journal

How People's Activities Can Make Floods More Destructive

In the lower reaches of a watershed, (a river basin), rivers meander through bottom lands that are flat and moist. When floods occur, natural rivers overflow their banks and occupy the bottom lands, also known as the river's floodplain. As the water spreads out, it loses velocity and erosive force and does relatively little damage to the environment or an occasional road or structure.

However, if we "claim" the floodplain by building levees or floodwalls or straightening and channeling the river, we concentrate tremendous energy and destructive force in the channel. By forcing a channel to convey large volumes of water

that normally spread out over a wide area, we make the current flow deeper and faster. The river either breaks through its levees or, if it stays within the artificial channel long enough, it can severely flood the community downstream.

In addition, when people compact soil and construct impervious surfaces such as roads, parking lots and rooftops, the rainwater that would have soaked into the soil runs off the land rapidly into the nearest creek. When we urbanize land, we construct storm water collection systems that speed up the flow of runoff into rivers and streams. When we increase storm flows, or "peak flows," we also increase the likelihood of flooding downstream.

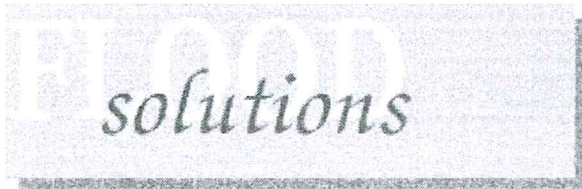
Over the last 130 years, we have made many changes in the natural function of the Truckee River. We channelized the river in places and lowered its channel level by dynamiting the Vista Reef in the early 1960s. We built commercial, industrial and residential structures in many parts of the natural flood-plain.

By building reservoirs such as Prosser Boca, Stampede and Martis Creek in the Sierra Nevada, we lessened the impact of winter floods on the Truckee Meadows. However, during the New Year's flood of 1997-in spite of the dams that were constructed upstream-downtown Reno and the Sparks industrial area were devastated by severe flooding. Such floods will undoubtedly continue to occur. Some atmospheric scientists predict that if the earth's climate continues to warm, the Sierra Nevada will receive more of its winter precipitation in rainstorms. This may increase the probability and frequency of major flood events on the Truckee River.

Because flood hazards will not go away and may indeed increase, we must consider ways to prepare for future flooding. These strategies include watershed management and floodplain management, using both structural and nonstructural flood-control methods.



Newly constructed homes near the Rosewood Lakes Golf course in Hidden Valley are inundated during the New Year's flood of 1997. Planning and zoning could restrict permanent construction in flood-prone areas, saving millions of dollars.
Photo by Marilyn Newton, Reno Gazette-Journal



We Need Coordinated Management Throughout the Watershed

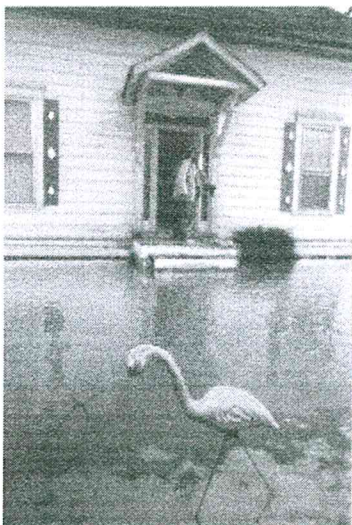
In many parts of the country, residents and government agencies are cooperating in efforts to improve land management throughout entire watersheds. Protecting the land, the vegetation and small streams could benefit it flood hazards in the Truckee River watershed.

During the 1990s, most work in the watershed has focused on improving water quality in the river. Since Reno and Sparks already have a state-of-the-art wastewater treatment plant, recent efforts have emphasized the use of best management practices (BMPs) to reduce polluted runoff and BMPs are methods we can use to restore natural watershed

functions. Used on both private and public lands, they can increase the watershed's ability to soak up water like a sponge, thereby reducing peak flows in rivers and streams. (See box at left). The Washoe-Storey Conservation District recently developed a restoration plan for Steamboat Creek. This plan urges implementation of erosion control BMPs and restoration of wetlands and riparian (stream-side) vegetation wherever possible. Similar efforts, if earned out in all parts of the Truckee River watershed, would not only improve water quality but also reduce flood flows from future storms. Government agencies can work to reduce the impact of roads.

Best Management Practices (BMPs) can help reduce flooding in watersheds:

- Erosion control
- Vegetation of stream banks
- Protection of natural wetlands
- Restoration of disturbed wetlands
- Runoff infiltration systems
- Construction practices to preserve and restore soil and vegetation
- Flood diversion or bypass structures
- Flood: retention basins which allow flood water to recharge into the ground



As a plastic flamingo strolls through the front yard, veteranman Kirk Andrews looks over the floodwaters surrounding his residence east of Reno during the flood of 1987.
Photo by David B. Parker, Reno Gazette-Journal.

We can do a Better job of Managing our Floodplains

Floodplain management refers to any program or action that reduces flood losses through the wise use of floodplains. Local governments have the primary responsibility for establishing floodplain management programs. They have the authority to guide land use and development within their jurisdictions, and are usually familiar with flooding problems and what might be done to solve them.

State and federal governments can play a significant role in helping communities develop and implement floodplain management programs by providing the financial and technical assistance local governments might not otherwise have. In Nevada, call the Nevada Division of Water Planning, 1550 East College Parkway, Suite 142, Carson City, NV 89706, (775) 687-3600, or your local government public works office.

Citizens also have a responsibility to do their part to make floodplain management programs effective. Here's how:

1. The first rule is simple: stay out of floodplain! If you don't have to rebuild there, don't. You will only be putting the property and its future residents in danger.

2. The second rule of floodplain management is to learn about the flood hazards in your area. If you're located in the flood-plain, learn what you can do to protect your property from losses. Once a flood zone has been identified, there are two ways to reduce losses within the floodplain-structural measures and nonstructural measures. (See box below).

We Need Both Structural and Nonstructural Methods of Flood Control

In the Truckee River watershed, property owners have been protected by costly flood-control dams, levees and channel improvements. After the record floods of 1950 and 1955, four reservoirs were built upstream. Flood experts credited these structures with preventing a worse flood in the Truckee Meadows in 1997.

In the '90s however, there's a growing body of evidence that structural methods of flood control must be complemented by non-structural methods to achieve reduced flood hazards and improved water quality and habitat goals. (See box below.) The new science of floodplain management encourages nonstructural solutions, such as zoning, to prevent construction and housing in flood-hazard areas. You can play a vital role by providing input to local and regional planning efforts. If you support the goals of agencies to improve watershed and floodplain management, your children will be rewarded with safer communities in the 21st Century.

The Two Main Types of Flood-Control Measures

Structural

- Flood control dams and reservoirs
- Levees and dikes
- Channel improvements
- Lined floodway channels

Nonstructural

- Comprehensive floodplain management
- Land-use planning and zoning
- Keeping agriculture in floodplains
- Land acquisition in floodplain areas
- Forecasting, warning and emergency preparedness
- Flood Insurance
- Flood proofing of structures

Getting streams and creeks to function as complex water ecosystems is a powerful tool that can reduce the velocity and volume of flows during storm events. Some flood experts in cities such as Denver have opted to give their rivers more room to roam. Flood-control districts throughout the country are acquiring land in critical floodplain areas, razing structures, and returning the land to parks and wildlife habitat areas. This "river corridor" approach can reduce flood hazards while simultaneously increasing the aesthetic appeal of the river as a magnet for tourists and residents.

In rural areas, farmers are being encouraged to keep floodplain land in agricultural production by creating conservation easements. This may be the single most cost-effective way to reduce flood hazards in a watershed.

The Army Corps of Engineers has been reevaluating flooding problems along the Truckee since 1996. The Corps is engaged in studies to improve flood control and recreation, and restore and improve the natural resources along the river. The Washoe County Regional Water Planning Commission is working on a flood -management plan as part of their Regional Water Plan. Call Washoe County Department of Water Resources for more details, (775) 954-4600.

You can play a vital role by providing input to local and regional planning efforts. If you support the goals of agencies to improve watershed and floodplain management, our children will be rewarded with safer communities in the 21st Century.

Act Now to Prepare for Floods

"Flood Facts" has given you a number of ways you can prepare for flooding. You can educate yourself and your family. You can set up a plan to protect your home and prepare yourself for a flood. You can get involved in focal or regional efforts to lessen the damage of future floods. Public participation in government planning efforts is the best way to work toward long-term solutions of flood problems. Whatever measures you decide to take, act now! Use this guide so you'll be ready the next time a flood hits the Truckee Meadows.