Diamond Dorado Retail Center Project
Final Environmental Impact Report

State Clearinghouse No. 2008012004

El Dorado County ▪ July 23, 2012

Michael Brandman Associates
2000 "O" Street, Suite 200
Sacramento, CA 95811

FINAL
Environmental Impact Report
Diamond Dorado Retail Center Project
Diamond Springs, El Dorado County, California

State Clearinghouse No. 2008012004

Prepared for:

El Dorado County
2850 Fairlane Court
Placerville, CA 95667
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Michael Brandman Associates

July 23, 2012

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SECTION 1: INTRODUCTION

In accordance with the California Environmental Quality Act (CEQA) Guidelines Section 15088, the County of El Dorado, as the lead agency, has evaluated the comments received on the Diamond Dorado Retail Center Project. The responses to the comments and other documents, which are included in this document, together with the Mitigation Monitoring and Reporting Program, comprise the Final Environmental Impact Report (Final EIR), for use by the County of El Dorado in its review.

The text of the Draft EIR is not reprinted herein because of its length. The Draft EIR, its appendices, and this document together constitute the Final EIR, which will be forwarded to the Board of Supervisors for its review and certification.

This document is organized into four sections:

- **Section 1 - Introduction**.
- **Section 2 - Master Response:** Provides a comprehensive response to similar comments made by multiple authors.
- **Section 3 - Responses to Comments:** Provides a list of the agencies, organizations, and individuals that commented on the Draft EIR. Copies of all of the letters received regarding the Draft EIR and responses thereto are included in this section.
- **Section 4 - Errata:** Includes an addendum listing revisions, refinements, and clarifications on the Draft EIR, which have been incorporated.

Recirculation of an EIR prior to certification is guided by CEQA Guidelines (Section 15088.5). For example, a lead agency is required to recirculate an EIR when significant new information is added to the EIR after public notice is given of the availability of the Draft EIR for public review, but before the EIR is certified. Such information can include substantial changes to the project or environmental setting, as well as substantive additional data. New information added to an EIR is not considered significant unless the EIR is changed in a way that deprives the public of a meaningful opportunity to comment on a substantial adverse environmental effect of the project or a feasible way to mitigate or avoid such an effect, including a feasible project alternative that the project proponents have declined to implement.

In connection with the standards for adequacy of an EIR, CEQA Guidelines Section 15151 states:

> An EIR should be prepared with a sufficient degree of analysis to provide decision-makers with information which enables them to make a decision which intelligently takes account of environmental consequences. An evaluation of the environmental effects of a proposed project need not be exhaustive, but the sufficiency of an EIR is to be reviewed in the light of what is reasonably feasible. Disagreement among

> experts does not make an EIR inadequate, but the EIR should summarize the main points of disagreement among the experts. The courts have looked not for perfection but for adequacy, completeness, and a good faith effort at full disclosure.

Changes to the Draft EIR discussed in this Final EIR are in response to two issues: (1) the re-analysis of traffic impacts at the US-50/Missouri Flat Road interchange and (2) the addition of Alternative 5: Existing MRF Access. Each issue and its incorporation into this document are summarized below.

As discussed in Section 3, Response to Comments, traffic impacts to the US-50/Missouri Flat Road interchange have been revised as requested in a comment made on the Draft EIR by Caltrans. Section 4, Errata reflects the new analysis and resulting changes to the Draft EIR. As a result of the new analysis, mitigation included in the Draft EIR has been revised to eliminate an impact previously considered significant and unavoidable. Because the reanalysis led to the elimination of a significant unavoidable impact, recirculation is not required.

As discussed in Section 2, Master Response, of this Final EIR, Alternative 5, Existing MRF Access, has been added to the Draft EIR. Section 4, Errata includes the analysis of the new alternative as amended to the Draft EIR. The new Existing MRF Access Alternative is substantially similar to Proposed Project and its implementation would reduce the magnitude or eliminate impacts that would occur under implementation of the Proposed Project. Accordingly, the Project applicant is now seeking approval of the Planned Development Permit based on the Existing MRF Access Alternative; therefore, recirculation is not required.

1.1 - Certification of the Final EIR

The County of El Dorado will review and consider the Final EIR, which consists of this document, the Draft EIR, and appendices. If the County of El Dorado finds that the Final EIR is "adequate and complete," the County may certify the Final EIR at a public hearing. The rule of adequacy generally holds that the EIR can be certified if (1) it shows good faith effort at full disclosure of environmental information; and (2) it provides sufficient analysis to allow decisions to be made regarding the project in contemplation of its environmental consequences.

Upon review and consideration of the Final EIR, the County may take action to approve, revise, or reject the project. A decision to approve the project would be accompanied by written findings in accordance with CEQA Guidelines Sections 15091 and 15093. Public Resources Code Section 21081.6 requires that lead agencies adopt a Mitigation Monitoring and Reporting Program (MMRP) to describe measures that have been adopted or made a condition of project approval in order to mitigate or avoid significant effects on the environment. The final MMRP will be provided separately.

1.2 - Public Review and Consultation Process

The County of El Dorado distributed a Notice of Preparation (NOP) of a Draft EIR for the proposed project on January 4, 2008. The NOP was distributed for a 30-day comment period that ended on February 4, 2008. The County held two public scoping meetings on the proposed project on January 24, 2008 in the El Dorado County Planning Commission Hearing Room in Placerville, California. The scoping meetings were an opportunity for agencies and the public to obtain information about the proposed project and to provide input regarding the issues they wanted addressed in the Draft EIR. Comments about the NOP were considered in the preparation of the Draft EIR.

The Draft EIR was distributed to various public agencies, citizen groups, and interested individuals for a 45-day public review period, from December 23, 2011 through February 5, 2012 (or next business day). The Draft EIR was circulated to state agencies for review through the State Clearinghouse of the Governor's Office of Planning and Research. Additionally, both documents were made available for review on the County's website (http://www.edcgov.us/Planning/) as well as in the County's offices.

The public was asked to provide written comments before closure of the public review period.

SECTION 2: MASTER RESPONSE

2.1 - Introduction

Master responses address similar comments made by multiple persons through written comments submitted to the County of El Dorado. A single Master Response is provided herein regarding the Lime Kiln Road Material Recovery Facility (MRF) Access.

2.2 - Master Response

Lime Kiln Road Material Recovery Facility (MRF) Access

The Project as proposed in the Draft EIR included the removal of Throwita Way south of the separately proposed Diamond Springs Parkway (DSP) to provide a continuous project site for the construction of the Diamond Dorado Retail Center (DDRC or retail center). Accordingly, the existing Material Recovery Facility (MRF) access point on Throwita Way was proposed to be relocated to Lime Kiln Road. In addition, the Proposed Project included an emergency-only access route in the MRF's northwestern corner, and potential alterations to existing onsite MRF infrastructure, including relocation of parking stalls, landscaping, and gatehouse. However, the MRF's operator, Waste Connections Incorporated (WCI), provided a comment letter on the Draft EIR (included in Section 3, Responses to Comments), indicating that relocation of the MRF's access along Lime Kiln Road would be problematic, resulting in traffic queuing, congestion, and turning radius issues. Furthermore, the Diamond Springs and El Dorado Community Advisory Committee provided a comment letter indicating its preference for the retention for the MRF's existing Throwita Way access.

In response to comments made on the Draft EIR concerning impacts to MRF access and operations, as well as concerns raised by El Dorado County regarding noise and traffic impacts to residential areas on Lime Kiln Road, the Project applicant has provided an alternative site plan that maintains the existing Throwita Way MRF access point. The revised site plan has been incorporated into the EIR as Alternative 5: Existing MRF Access and is included in Section 4, Errata of this Final EIR. The Project applicant is now seeking approval of the Planned Development Permit based on the Alternative 5: Existing MRF Access. Consistent with CEQA Guidelines Section 15126.6, the Existing MRF Access Alternative has been analyzed to determine how its environmental impacts would compare with that of the Proposed Project. As a result of the analysis, it has been determined that the Existing MRF Access Alternative would not significantly change the scope of the Proposed Project, would not increase any impacts, and would decrease or eliminate several impacts and the subsequent need for mitigation.

As stated in CEQA Guidelines Section 15088.5, a lead agency is required to recirculate an EIR when significant new information is added to the EIR after public notice is given of its availability for

public review but prior to its certification. As noted therein, significant new information requiring recirculation includes:

1. A new significant environmental impact would result from the Project or from a new mitigation measure proposed to be implemented.
2. A substantial increase in the severity of an environmental impact would result unless mitigation measures are adopted that reduce the impact to a level of insignificance.
3. A feasible Project alternative or mitigation measure considerably different from others previously analyzed would clearly lessen the environmental impacts of the Project, but the Project's proponents decline to adopt it.
4. The draft EIR was so fundamentally and basically inadequate and conclusory in nature that meaningful public review and comment were precluded.

Concerning item 1 above, addition of the Existing MRF Access Alternative would not be considered new information requiring recirculation because it would not result in a new significant environmental impact, nor would a new significant environmental impact result form a new mitigation measure.

Concerning item 2 above, implementation of the Existing MRF Access Alternative would not result in the increase of any environmental impacts and, as previously mentioned, would decrease or eliminate several impacts and the subsequent need for mitigation.

Concerning item 3 above, a feasible alternative (Alternative 5: Existing MRF Access) has been added to the EIR. However, it would not be considered significant new information requiring recirculation, as it is not considerably different from the Proposed Project. Furthermore, the Existing MRF Access Alternative is the Environmentally Superior Alternative (other than the No Project Alternative), and the applicant is seeking approval of the Planned Development Permit based on the Existing MRF Access Alternative.

In light of the discussion above, the addition of the Existing MRF Access Alternative would not be considered significant new information and would not require recirculation of the Draft EIR. Furthermore, as discussed and analyzed in Section 4, Errata, the Existing MRF Access Alternative would substantially lessen or eliminate several impacts compared with the Proposed Project

SECTION 3: RESPONSES TO COMMENTS ON THE DRAFT ENVIRONMENTAL IMPACT REPORT

3.1 - List of Commenters

3.1.1 - Written Comments

A list of public agencies, organizations, and individuals who provided comments on the Draft EIR is presented below. Each comment has been assigned a code. Individual comments within each communication have been numbered so comments can be crossed-referenced with responses. Following this list, the text of the communication is reprinted and followed by the corresponding response.

Commenter **Commenter Code**

State Agencies

California Department of Transportation CALTRANS.1
California Department of Transportation CALTRANS.2
California Department of Fish and Game ..... DFG
State of California, Governor's Office of Planning and Research, State Clearinghouse and Planning Unit..... OPR
California Regional Water Quality Control Board, Central Valley Region .....RWQCB

Local Agencies

Diamond Springs and El Dorado Community Advisory Committee DSEDCAC.1
Diamond Springs and El Dorado Community Advisory Committee DSEDCAC.2
Diamond Springs – El Dorado Fire Protection District..... DSEDFPD
El Dorado Irrigation District .....EID
City of Placerville..... PLACERVILLE

Private Organizations

El Dorado County Historical Society ..... EDCHS
Waste Connections, Inc. ..... WCI

Individuals

Martin and Diane Murillo..... MURILLO
Lee Dobbs..... DOBBS

3.2 - Responses to Comments

3.2.1 - Introduction

In accordance with the California Environmental Quality Act (CEQA) Guidelines Section 15088, the County of El Dorado, as the lead agency, evaluated the comments received on the Draft EIR (State Clearinghouse No. 2008012004) for the Diamond Dorado Retail Center Project, and has prepared the following responses to the comments received. This Response to Comments document becomes part of the Final EIR for the Project in accordance with CEQA Guidelines Section 15132.

3.2.2 - Comments and Responses

This section provides copies of the written comment letters. Each comment letter is numbered and immediately followed by the corresponding responses. In some cases, a response to an individual comment makes reference to single or multiple responses to comments that have previously addressed the subject of the comment.

The comment letters reproduced in the following pages follow the same organization as used in the List of Commenters.

On Tue, Jan 3, 2012 at 2:10 PM, Planning Unknown <planning@edcgov.us> wrote:

>
>
> ---------- Forwarded message ----------
> From: Jorge Rivas <jorge_rivas@dot.ca.gov>
> Date: Tue, Jan 3, 2012 at 11:10 AM
> Subject: Diamond Dorado Retail Center: Map Exhibit (Appendix D) is missing
> for Appendix I of the DEIR
> To: mel.pabalinas@edcgov.us
> Cc: planning@edcgov.us, Gurdeep Bhattal <gurdeep_bhattal@dot.ca.gov>
>
>
>
> Happy New Year Mel,
>
> Hope all is well.
>
> We noticed that the water shed map (appendix D) is missing from the
> Drainage Report (appendix I of the DEIR). Is it possible to get a copy for
> our review?
>
> Thank you,
> -Jorge
>
>
> .....
> Jorge Rivas Jr.
> California Department of Transportation District #3
> A: 2379 Gateway Oaks Drive Ste. 150
> Sacramento, CA 95833
> E: jorge_rivas@dot.ca.gov
> P: 916.274.0679

1

State Agencies

California Department of Caltrans (CALTRANS.1)

Response to CALTRANS.1-1

The commenter stated that the watershed map from the Preliminary Drainage Report for the Project was not included in Appendix I of the Draft EIR.

The Preliminary Drainage Report's watershed maps have been appended to Appendix I of the Draft EIR and are included in this Final EIR's Section 4, Errata.

DEPARTMENT OF TRANSPORTATION
DISTRICT 3—SACRAMENTO AREA OFFICE
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TTY 711
www.dot.ca.gov

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February 6, 2012

SCH# 2008012004
03-ELD-VAR
Diamond Dorado Retail Center Project
Draft EIR

Rommel Pabalinas
County of El Dorado
2850 Fairlane Court
Placerville, CA 95667

Dear Mr. Pabalinas:

Thank you for the opportunity to review and comment on the Draft Environmental Impact Report (DEIR) for the Diamond Dorado Retail Center Project. The Project consists of a General Plan Amendment to allow for the construction of approximately 280,515 square feet of general commercial retail center, the realignment of the Material Recovery Facility (MRF) access route and associated off site roadway improvements. The project will include up to nine commercial/retail buildings and 1,279 parking spaces, landscaping, and associated supporting infrastructure and utilities on 27.61 acres of the 30.63 acres of the project site. The remaining 3.02 acres will be utilized for the realigned MRF access route. Our comments are the following:

Scoping Meeting

- As this project may affect the State Highway System, the California Department of Transportation (The Department) requests a scoping meeting to discuss the project per Public Resources Code section 21083.9. 1

Cumulative Impacts

- The Department notes the potential for significant cumulative traffic impacts on Highway 50 mainline, near Missouri Flat Road, which could be linked to several developments in this area, including The Crossing at El Dorado. El Dorado County did not accurately analyze this possibility, with queuing and level of service changes given the short intersection spacing, and the potential impacts to adjacent local roadways. 2

Traffic Operations

- Page 4.11-22 of the DEIR states, "Under the Cumulative (2025) Conditions ...Phase 1B of the US50 - Missouri Flat Interchange is assumed to remain in place." Page 4.11-42 "also assumes that Phase 1B of the US 50/Missouri Flat Road Interchange remains in place, as the single-point urban interchange improvements are not currently funded or included in the County's CIP or TIM Fee Program and, therefore, do not have a mechanism for implementation." These assumptions overlook the fact that the County can amend the TIM Fee Program to include the single-point urban interchange improvements. These assumptions are also inconsistent with the traffic analysis used for other projects in the Missouri Flat Area (i.e. Creekside Plaza) that include the single-point urban interchange as a condition of analysis. 3

- Page 2-55, 4.11-55 MM TRANS-3a proposes that "the dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road should be converted into a single free right-turn lane." This mitigation measure was first identified in the Final Traffic Impact Analysis dated July 21, 2010 (Appendix L) and again in the Supplemental Traffic Analysis for the Missouri Flat Road Interchange dated December 10, 2010. This is an inadequate mitigation. Normally a free right would have a large capacity, but in this case, it is restricted downstream by the traffic signal at Mother Lode Drive which is about 150 feet away. Good coordination of signals with such a short spacing is extremely difficult if not impossible to achieve under high volume (peak hour) conditions. These improvements would not reduce the impact because of limitations that were not considered in the traffic analyses. 4

- The results of the KHA synchro analysis are invalid due to the proximity of the Missouri Flat Road and US 50 intersection to the Missouri Flat Road and Mother Lode Drive intersection and the limitations of the Highway Capacity Methodology (HCM) when dealing with close spaced intersections. The HCM is unable to account for potential impact of downstream congestion, and/or detect and adjust for the impacts of turn-lane overflows on through traffic for closely spaced intersections. A simulation analysis demonstrates that not only are levels of service unacceptable (LOS F) at all four intersections, but queues at the off ramps are overflowing onto the US50 mainline, especially at the westbound off ramp. This major safety concern is not addressed in the DEIR. 5

- Page 2-54, 4.11-37 MM TRANS-1a requires that the "addition of an eastbound left-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR49) and Forni Road...shall be completed to the satisfaction of the El Dorado County Department of Transportation." Since an encroachment permit from the Department will be required for any work at this intersection the text should read: "shall be completed to the 6

satisfaction of the El Dorado County Department of Transportation *and Caltrans*." (Italics indicate additional language.) 6 CONT

- Page 2-56 & 58 4.11-56 & 57 MM TRANS-3c references"...Diamond Road (SR29)..." but should read "... (SR49)..." 7

- Page 2-57, 4.11-56 MM TRANS-3f requires the "conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road...US50 Eastbound Ramps..." A simulation analysis has not been done for this conversion to ensure that the conversion is compatible with the safe and efficient operation of the State Highway System, but is required for the Department's review and approval prior to the encroachment permit process. 8

- Page 2-61, 4.11-37 MM TRANS-5e suggests that the conversion of the northbound right-turn lane to a shared through-right lane at the intersection of Diamond Road (SR49) and Pleasant Valley Road is "at the discretion of El Dorado County..." However, the Department operates this signal and this change requires the Department's review and approval. 9

- Traffic Management Plan. The Department requests a Traffic Management Plan (TMP) be prepared to minimize traffic impacts to the State Highway System during project construction. The TMP should discuss the expected dates and duration of construction, as well as traffic mitigation measures. The Department will review the TMP. For TMP assistance, contact John Holzhauser at (916) 859-7978. 10

Hydrology

- A review of the Post Development Shed map indicates that runoff will be captured on site and conveyed through a proposed storm drain across SR-49. Please provide detailed design with back-up calculations for the proposed storm drain across SR-49. The culvert should be designed to ensure that the highway will not be overtopped during a design 25-year event and no adverse downstream impacts would be expected. 11

The Department requests additional consultation about potential opportunities to lessen the SHS impacts of this project. To set up a scoping meeting and/or if you have any questions regarding these comments, please contact Jorge Rivas, El Dorado County Intergovernmental Review Coordinator, at (916) 274-0679 or via email at jorge_rivas@dot.ca.gov. 12

Sincerely,

Eric Fredericks, Chief
Office of Transportation Planning—South

Attachments:

1) Initial Consolation Comment Letter Dated June 20, 2008
2) Email dated 1/20/2011Diamond Dorado RC Supplemental Analysis

Cc: State Clearinghouse
Eileen Crawford, Supervising Civil Engineer, El Dorado County Department of Transportation
Sharon Scherzinger, Executive Director, El Dorado County Transportation Commission

DEPARTMENT OF TRANSPORTATION
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June 20, 2008

08ED0026
03-ED-49 PM 7.175
Diamond Dorado Retail Center
General Plan Amendment – Initial Consultation

Mr. Jason Hade
County of El Dorado
2850 Fairlane Court
Placerville, CA 95667

Dear Mr. Hade,

Thank you for the opportunity to review and comment on the General Plan Amendment – Initial Consultation, and zoning change for the Diamond Dorado Retail Center located on the northwest side of Lime Kiln Road approximately 500 feet northwest of the State Route 49 intersection. This General Plan Amendment – Initial Consultation requests to change the land use designation from Industrial to Commercial, a rezone change from a Industrial to a General Commercial-Planned Development, a planned development of up to 10 commercial/retail buildings on 44 acres, including the development of up to 438,476 square feet of retail space, and a tentative commercial parcel map application for 22 parcels from 0.184 to 19.012 acres. Our comments are:

- A Traffic Impact Study (TIS) should be completed, and include an analysis of impacts to the US Highway 50/Missouri Flat Road interchange and the State Route 49. With recent studies indicating the US Highway 50/Missouri Flat Road interchange is at Level of Service (LOS) F, the TIS should consider all possible traffic impacts to all ramps, ramp intersections, and mainline segments. Even with current US Highway 50 improvements at the Missouri Flat Road interchange, new traffic, such as from this development, will further increase congestion at this interchange. The TIS should also analyze both short-term (2012) impacts, and full build-out impacts. The "Guide for the Preparation of Traffic Impact Studies" (TIS Guidelines) can be found on our website at: http://www.dot.ca.gov/hq/traffops/developserv/operationalsystems/reports/tisguide.pdf. The TIS should use a Select Zone Analysis to identify trip distribution of the proposed project on the SHS. We would appreciate the opportunity to review and comment on the scope of the TIS before the Study begins. 13

- A grading plan and utility plan were received as part of the application package; however, it was difficult to read the small print and detail. Please provide larger and/or clearer plans. 14

- No drainage plans, drawings, calculations, or hydrologic/hydraulic reports were received with the application. As the proposed project site is located immediately adjacent to State Route 49, the development of this site will increase impervious surface area through the construction of roads, driveways, parking areas and structures with a corresponding increase in surface water (storm water) runoff. Any runoff increase introduced by the construction of the project must be quantified and mitigated to avoid potential adverse hydrologic and/or hydraulic impacts down stream of the proposed project site. To adequately evaluate these potential impacts upon the State's right of way, and drainage facilities, a detailed drainage plan with "pre-construction" and "post-construction" hydraulic calculations should be supplied for our review. Please request these calculations and send them to Mr. Gurdeep Bhattal for review prior to final project approval. Mr. Bhattal can be reached at (530) 741-4056. 15

- An Encroachment Permit is required for any work conducted in the State's right of way. To secure an application, please contact Caltrans' District 3 Encroachment Permit Office, Central Desk at (530) 741-4403. 16

Please provide our office with copies of any further actions regarding this development. If you have any questions, please call La Nae Van Valen at (916) 274-0637.

Sincerely,

ALYSSA BEGLEY, Chief
Office of Transportation Planning – South

TO: Claudia Wade, El Dorado County DOT
Matt Weir, Kimley-Horn and Associates
FROM: Teresa Limon, CT Rural Highway Operations
DATE: January 20, 2011
RE: 0310-ELD0048 Diamond Dorado RC Supplemental Analysis

We have reviewed the DDRC- US50 Supplemental Analysis, the Synchro and SimTraffic files.

The Missouri Flat Rd Interchange (MFRD) is a system of very close-spaced intersections. As such, in order to realistically evaluate its overall operation, we need to look at the level of service in conjunction with the queuing; not one or the other. This requires a simulation analysis. The SimTraffic files provided to us showed spacing inconsistencies when compared with actual design plans. After modifying the files to reflect the Phase1 design geometrics the Sim Traffic files were re-run. The results are shown below:

Cumulative no SPUI plus DDRC Conditions

	LOS* Mitigated	Option1 for Queuing
Intersection #1 (Plaza):	98.4 sec delay (F)	117.9 sec (F)
Intersection #2 (WB Ramp):	219. sec delay (F)	181.8 sec (F)
Intersection #3 (EB Ramp):	221.1 sec delay (F)	148.8 sec (F)
Intersection #4 (Mother Lode):	182.5 sec delay (F)	571.5 sec (F)

17

*Delay greater than 80 seconds is considered LOS F.
Caltrans threshold is LOS D with LOS E only acceptable for the peak 15 minutes.

Our staff re-ran the files with different signal timings in search of improving the level of service. Results were mixed with LOS in the F range for all but one intersection.

All the results demonstrate that the Phase1 geometrics will not be able to accommodate the projected 2025 volumes. If no other physical improvements are being programmed for this interchange then a parallel facility to Missouri Flat Rd (overcrossing) and/or a parallel facility to US50 will be needed to serve the traffic demand originating from the east.

California Department of Transportation (CALTRANS.2)

Response to CALTRANS.2-1

The commenter requested a scoping meeting, pursuant to Public Resources Code Section 21083.9.

Representatives of El Dorado County met with the California Department of Transportation on March 5, 2012 and April 13, 2012 to discuss the Project's impacts and concerns.

Response to CALTRANS.2-2

The commenter noted the potential for significant cumulative traffic impacts on Highway 50, near Missouri Flat Road, which could be linked to several developments in the project area, including The Crossings at El Dorado. The commenter stated that the Draft EIR did not accurately analyze the possibility for such cumulative impacts, with queuing and level of service changes given the short intersection spacing, and the potential impacts to adjacent local roadways.

When the DDRC traffic study was prepared in 2010, the size of the Crossings at El Dorado project was based on the information available for the project at the time. Page 21 of the Traffic Impact Analysis (July 21, 2010) describes the adjustments that were made to background traffic at the US-50 interchange with Missouri Flat Road and other intersections to account for the Crossings at El Dorado project. These adjustments were reflected in the Draft EIR's analysis under the Cumulative (2025) conditions. Therefore, the Crossings at El Dorado project was considered in the cumulative effects analysis for the Project using the best information available at the time.

More recently, the applicants for Crossings at El Dorado project submitted a revised development application to the County from which a new traffic impact analysis was required. The cumulative effects of the DDRC Project and the Crossings at El Dorado project are also documented in the Crossings at El Dorado traffic study, since the traffic study for the Crossings at El Dorado project was chronologically initiated approximately 2 years after the DDRC study. Furthermore, the recently prepared Headington Road Extension traffic study provided additional documentation of the cumulative effects of planned projects in the area. The traffic volumes used in this study (Headington Road Extension) were reviewed and approved by Caltrans. At the time of this writing, the County was soliciting comments from Caltrans on the draft analysis. In summary, all three studies (DDRC, The Crossings at El Dorado, and Headington Road Extension) consider their cumulative effects albeit at different points in time over the past 2 years. In each case, the best information available at the time of each study was utilized.

Response to CALTRANS.2-3

The commenter disagreed with the Draft EIR's assumption that Phase 1B of the US 50/Missouri Flat Road Interchange would remain in place under Cumulative (2025) conditions. As indicated in the Draft EIR on page 4.11-42, Phase 1B of the US 50/Missouri Flat Road Interchange remains in place, as the single-point urban interchange improvements are not currently funded or included in the County's CIP or TIM Fee Program and therefore do not have a mechanism for implementation. The

commenter stated that the Draft EIR overlooks the fact that the County can amend the TIM Fee Program to include the single-point urban interchange improvements. The commenter also stated that the assumptions regarding the US-50/Missouri Flat Road interchange are inconsistent with the traffic analysis used for other projects in the Missouri Flat Area (such as Creekside Plaza) that include the single-point urban interchange as a condition of analysis.

The Final Creekside Plaza Traffic Analysis and DDRC traffic analysis have been updated accordingly, which provide the 2025 forecast traffic analysis without the Single Point Urban Interchange. This change is reflected in the Draft EIR as stated on page 4.11-22.

Caltrans's comment with respect to the ability for the County to update the TIM Fee Program on an annual basis as well as the CIP is correct. The DOT will be completing a TIM Fee Program update and CIP update next fiscal year for El Dorado County Board of Supervisor's approval in coordination with the following:

1. The DOT is currently updating the Count's Travel Demand Model (TDM) 2010 Baseline Conditions and 2025/2035 Projected Traffic Conditions, which will most likely differ from the existing traffic analysis assumptions being used in the Missouri Flat Corridor area.
2. The DOT will be completing additional traffic field assessment base conditions during the fall at the US-50/Missouri Flat Road interchange upon completion of the US-50/Missouri Flat Road Interchange Phase IB Project to further calibrate the base traffic parameters within the County's updated TDM.
3. The County is currently in the process of updating the General Plan as part of a Targeted General Plan Amendment with an update to the Zoning Ordinance.

Each previously mentioned item will be coordinated with Caltrans during each prospective delivery schedule outside the DDRC Project approval process.

Additionally, the County is initiating the planning and scoping of the Phase II of the Missouri Flat Master Circulation and Funding Plan (MC&FP) as directed by the Board of Supervisors at the May 17, 2012 regular meeting (Agenda Item 12-0643). This is a high-priority project for the County, which will be coordinated with Caltrans and other stakeholders within the MC&FP area outside the DDRC Project approval process. One of the objectives of the Phase II MC&FP will involve the consideration of additional potential improvements at the US-50/Missouri Flat Road interchange, commensurate with the County-approved additional commercial capacity within the MC&FP area.

Furthermore, the DOT and Development Services Department (DSD) are in the process of developing the Project Conditions of Approval (COA). One category of the proposed Draft COA will relate to the traffic capacity limitations at the US-50/Missouri Flat Road interchange. The generality of this

traffic capacity limitation condition is summarized herein, and will be further codified as part of the DDRC Project approval process:

- The Phase I MC&FP road improvements are designed to provide traffic capacity that will address existing traffic demand and will serve a limited amount of development in the Missouri Flat Area. The capacity will be sufficient for previously approved projects and other currently pending development projects to meet the County's level of service standards as established in the County's General Plan and to mitigate the traffic impacts of those projects.
- Traffic capacity limitations at the Phase I US-50/Missouri Flat Road interchange are a constraint on the ability to develop new retail commercial space within the Missouri Flat Area. These traffic capacity limitations at the US-50/Missouri Flat Road interchange are acknowledged in the Draft EIR.
- In the event there is insufficient traffic capacity at the US-50/Missouri Flat Road interchange at the time that the Developer/Applicant desires to construct the DDRC Project, the Developer/ Applicant shall not be entitled to construct the DDRC Project until such time as additional capacity is made available by the construction of additional road improvements at the US-50/Missouri Flat Road interchange. Timing of said improvements shall be at the sole discretion of the County.

These summarized Draft COA items are subject to approval by the El Dorado County Board of Supervisors. Furthermore, Mitigation Measure TRANS-3a has been updated in Section 4, Errata to reflect these conditions.

Response to CALTRANS.2-4

The commenter stated that Mitigation Measure TRANS-3a on pages 2-55 and 4.11-55 of the Draft EIR, which would require the dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road to be converted into a single free right-turn lane, is inadequate. The commenter indicated that normally a free right-turn lane would have a large capacity, but in this case is restricted downstream by the traffic signal at Mother Lode Drive, which is approximately 150 feet away. The commenter further stated that good coordination of signals with such a short spacing is extremely difficult if not impossible to achieve under high-volume (peak-hour) conditions. The commenter indicated that these limitations were not considered in the traffic analysis; therefore, Mitigation Measure TRANS-3a would not reduce the Proposed Project's impacts to a less than significant level.

Refer to Response to CALTRANS.2-3, with relation to the additional efforts being pursued by the County to ensure appropriate capacity at the US-50/Missouri Flat Road interchange is maintained.

As requested by Caltrans in comment CALTRANS.2-5, impacts at the US-50/Missouri Flat Road interchange under the Cumulative (2025) Plus Project condition were re-analyzed by Kimley-Horn

and Associates and added to Appendix L of the Draft EIR. The Draft EIR has been updated to reflect the reanalysis in Section 4, Errata. The following discloses the re-analysis.

Because of the close spacing of the study intersections, interchange operations were determined using SimTraffic® analysis software for the following intersections:

- Intersection 1 - Missouri Flat Road/Plaza Drive
- Intersection 2 - Missouri Flat Road/US-50 Westbound Ramps
- Intersection 3 - Missouri Flat Road/US-50 Eastbound Ramps
- Intersection 4 - Missouri Flat Road/Mother Lode Drive

SimTraffic® Measures of Effectiveness (MOEs) were compared against Highway Capacity Manual (HCM) intersection delay thresholds to equate SimTraffic® results to HCM Level of Service (LOS). For this evaluation, a 5-minute "seed time" was used and 60-minute simulation runs were recorded, in which a 15-minute peak period is followed by a 45-minute off-peak period. Five simulations were performed for each time period (AM and PM peaks), and the results of the simulations are presented in Appendix L of the Draft EIR as amended in Section 4, Errata of this Final EIR.

The previously developed US-50/Missouri Flat Road Single Point Urban Interchange (SPUI) configuration is no longer identified as a funded improvement through the County's Capital Improvement Program (CIP). As such, this analysis explores alternative interchange geometrics aimed at maximizing operations without the previously assumed SPUI configuration. Alternative geometrics have been explored using the underlying assumption that the Missouri Flat Road bridge structure cannot be widened, due to the associated construction costs. Alternatives with such widening would likely have costs rivaling those of the SPUI and, therefore, would not be considered feasible, alternate improvements.

Please note that the Traffic Impact Analysis for the DDRC, dated July 21, 2010 serves as the starting point for this analysis. This evaluation includes the following specific items:

1. Cumulative (2025)*
2. Cumulative (2025)* + DDRC

The asterisk (*) denotes US-50/Missouri Flat Interchange Phase 1B, in accordance with Missouri Flat Road Phase 1A & 1B Improvements, El Dorado County Department of Transportation, November 29, 2005.

Peak-hour LOS was determined for the four study intersections. As required by El Dorado County Department of Transportation's Traffic Impact Study Protocols and Procedures, impacts at study intersections were determined from the change of LOS when Project trips were added to the Cumulative (2025) Conditions. The following is a discussion of these scenarios.

Cumulative (2025)

For this scenario, baseline Cumulative (2025) Conditions were established at the US-50 interchange with Missouri Flat Road using Phase 1B of the interchange improvements. Table 3-1 presents the intersection operations for this scenario as generated using SimTraffic® traffic analysis software.

Table 3-1: Intersection Levels of Service with Phase 1B of the Missouri Flat Interchange – Cumulative (2025)

Intersection	AM Peak-Hour		PM Peak-Hour	
	Delay (seconds)	LOS	Delay (seconds)	LOS
1 - Missouri Flat Road/Plaza Drive	50.3	D	**152.3**	**F**
2 - Missouri Flat Road/US-50 Westbound Ramps	**82.4**	**F**	**214.1**	**F**
3 - Missouri Flat Road/US-50 Eastbound Ramps	**286.0**	**F**	**461.3**	**F**
4 - Missouri Flat Road/Mother Lode Drive	**184.4**	**F**	**210.3**	**F**

Note:
Bold denotes substandard LOS according to County and/or Caltrans.
Source: KHA, 2012.

As shown in Table 3-1, all intersections operate at an unacceptable level of service without the Project. Analysis worksheets for this scenario are presented in Appendix L of the Draft EIR as amended in Section 4, Errata of this Final EIR.

Cumulative (2025) plus DDRC

For this scenario, traffic associated with the DDRC Project was added to the baseline Cumulative (2025) Conditions and LOS were determined at the study intersections. Table 3-2 presents the intersection operations for this scenario.

Table 3-2: Intersection Levels of Service with Phase 1B of the Missouri Flat Interchange – Cumulative (2025) Plus DDRC Conditions

Intersection	Analysis Scenario	AM Peak-Hour		PM Peak-Hour	
		Delay (seconds)	LOS	Delay (seconds)	LOS
1 - Missouri Flat Road/Plaza Drive	Cum	50.3	D	**152.3**	**F**
	Cum + PP	51.9	D	**171.7**	**F**
2 - Missouri Flat Road/US-50 Westbound Ramps	Cum	**82.4**	**F**	**214.1**	**F**
	Cum + PP	61.9	E	**304.5**	**F**

Table 3-2 (cont.): Intersection Levels of Service with Phase 1B of the Missouri Flat Interchange – Cumulative (2025) Plus DDRC Conditions

Intersection	Analysis Scenario	AM Peak-Hour		PM Peak-Hour	
		Delay (seconds)	LOS	Delay (seconds)	LOS
3 - Missouri Flat Road/US-50 Eastbound Ramps	Cum	**286.0**	**F**	**461.3**	**F**
	Cum + PP	**269.5**	**F**	**495.7**	**F**
4 - Missouri Flat Road/ Mother Lode Drive	Cum	**184.4**	**F**	**210.6**	**F**
	Cum + PP	**203.5**	**F**	**227.7**	**F**

Notes:
Bold denotes substandard LOS according to County and/or Caltrans.
Cum = Cumulative (2025)
Cum + PP = Cumulative (2025) Plus Proposed Project
Source: KHA, 2012.

As shown in Table 3-2, while modest increases in delay are demonstrated, the addition of the DDRC Project does not result in a change in the intersection LOS at any of the study intersections. Analysis worksheets for this scenario are presented in Appendix L of the Draft EIR as amended in Section 4, Errata of this Final EIR.

Impacts

As reflected in Table 3-2, the addition of the Proposed Project results in four significant impacts as defined by the County and/or Caltrans and discussed below. Only the impact at Intersection 4 – Missouri Flat Road/Mother Lode Drive was identified and mitigated in the Draft EIR. These changes are reflected in Section 4, Errata of this Final EIR.

Intersection 1 – Missouri Flat Road/Plaza Drive

As shown in Table 3-2, this intersection operates at LOS F during the PM peak-hour without the Proposed Project, and the Project contributes more than 10 peak-hour trips to the intersection during a peak hour. This is a significant impact.

Intersection 2 – Missouri Flat Road/US-50 Westbound Ramps

As shown in Table 3-2, this intersection operates at LOS F during the PM peak hour without the Proposed Project, and the Project contributes more than 10 peak-hour trips to the intersection during a peak hour. This is a significant impact.

Intersection 3 – Missouri Flat Road/US-50 Eastbound Ramps

As shown in Table 3-2, this intersection operates at LOS F during the AM and PM peak hours without the Proposed Project, and the Project contributes more than 10 peak-hour trips to the intersection during a peak hour. This is a significant impact.

Intersection 4 – Missouri Flat Road/Mother Lode Drive

As shown in Table 3-2, this intersection operates at LOS F during the AM and PM peak hour without the Proposed Project, and the Project contributes more than 10 peak-hour trips to the intersection during a peak hour. This is a significant impact.

Mitigation

Mitigating the interchange intersections' levels of service with the existing Phase 1B interchange configuration is problematic considering the previously stated inability to widen the Missouri Flat Road bridge structure over US-50. The interchange currently has physical capacity constraints that hinder a feasible, cost effective mitigation measure from being identified.

As stated previously, the Project will result in a modest increase in delay at the interchange under Cumulative (2025) conditions; however, the addition of the DDRC Project does not result in a change in the intersection level of service at any of the study intersections. As documented, the Project contributes to an operationally deficient condition.

As discussed under Response to CALTRANS.2-3, the Project's Conditions of Approval will ensure that the Project is constructed only if capacity is available at the US-50/Missouri Flat Road interchange. If capacity is not available, the Project will not be issued building permits until additional capacity is made available through the implementation of the separate MC&FP Phase II project or other separately proposed improvements. This condition is also required as a revision to Mitigation Measure TRANS-3a as provided in Section 4, Errata.

Intersection Queuing Evaluation

Vehicle queuing for the study intersections was considered for the same movements as evaluated in the Traffic Impact Analysis for the DDRC, dated July 21, 2010. The calculated vehicle queues were generated in SimTraffic® and were compared to actual or anticipated vehicle storage/segment lengths. Results of the queuing evaluation are presented in Table 3-3.

Table 3-3: Intersection Queuing Evaluation Results for Selected Locations

Intersection/Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (feet)	95th% Queue (feet)	Available Storage (feet)	95th% Queue (feet)
#2, Missouri Flat Rd at WB US-50 Ramps					
Cumulative (2025)	WBLT	600*	2611	600*	3521
Cumulative (2025) plus DDRC			1962		3536
Cumulative (2025)	NBLT	125+	264	125+	253
Cumulative (2025) plus DDRC			263		254

Table 3-3 (cont.): Intersection Queuing Evaluation Results for Selected Locations

Intersection/Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (feet)	95th% Queue (feet)	Available Storage (feet)	95th% Queue (feet)
#3, Missouri Flat Rd at EB US-50 Ramps					
Cumulative (2025)	EBRT	545	646	545	593
Cumulative (2025) plus DDRC			668		661
Cumulative (2025)	SBLT	100+	232	100+	267
Cumulative (2025) plus DDRC			244		266

Notes:
\+ Dual left-turn lanes
* Intersection approach with available storage length equal to segment length
Sources: Highway Capacity Manual (HCM) 2000 methodology from Synchro® v7; KHA, 2012.

As presented in Table 3-3, the addition of the DDRC Project produces modest increases in vehicle queues. The available storage pocket for the movements presented in Table 3-3 are not projected to provide sufficient length to store vehicle queues either without or with the addition of the Project under the Cumulative (2025) conditions. However, implementation of Mitigation Measure TRANS-3a as revised in Section 4, Errata would ensure these impacts are reduced to a less than significant level.

Response to CALTRANS.2-5

The commenter stated that the Synchro analysis prepared by Kimley-Horn and Associates as a part of the Traffic Impact Analysis prepared for the Draft EIR is invalid, due to the proximity of the Missouri Flat Road and US-50 intersection to the Missouri Flat Road and Mother Lode Drive intersection and the limitations of the Highway Capacity Methodology (HCM) when dealing with closely spaced intersections. The commenter stated that the HCM is unable to account for potential impact of downstream congestion, and/or detect and adjust for the impacts of turn-lane overflows on through traffic for closely spaced intersections. The commenter further stated that a simulation analysis demonstrates that not only are levels of service unacceptable (LOS F) at all four intersections, but queues at the off ramps are overflowing onto the US-50 mainline, especially at the westbound off ramp. The commenter stated this is a major safety concern that was not addressed in the Draft EIR.

Refer to Response to CALTRANS.2-3 and CALTRANS.2-4.

Furthermore, the County understands the projected 2025 concern at the US-50/Missouri Flat Road interchange, which are based on various assumptions, and will be validating the forecast assumptions within the currently Traffic Impact Analysis reports on file during the County's TDM update. This validation process will also include the update to the current base conditions within the MC&FP and surrounding area that could have a traffic impact relation to the US-50/Missouri Flat Road

interchange. The process will provide the necessary data and traffic model runs to determine the approximate timing of the LOS deficiencies, which will assist with the development of the Project delivery schedule for the appropriate CIP Project at the US-50/Missouri Flat Road interchange. Said results will be coordinated with Caltrans during subsequent meetings outside the DRC Project approval process.

Response to CALTRANS.2-6

The commenter requested that Mitigation Measure TRANS-1a on page 2-53 and page 4.11-37 of the Draft EIR be updated to reflect the requirement of a Caltrans encroachment permit for work completed at the intersection of Pleasant Valley Road (SR-49) and Forni Road. Mitigation Measure TRANS-1a has been revised in Section 4, Errata.

Response to CALTRANS.2-7

The commenter indicated that Diamond Road (SR-49) was erroneously referred to as Diamond Road (SR-29) on pages 2-56, 2-58, 4.11-56, and 4.11-57. The text has been corrected in Section 4, Errata.

Response to CALTRANS.2-8

The commenter states that a simulation analysis has not been completed for the conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road and the US-50 Eastbound Ramps as required by Mitigation Measure TRANS-3f on page 2-57 and page 4.11-56 of the Draft EIR.

Mitigation Measure TRANS-3f on page 2-57 and page 4.11-56 of the Draft EIR indicate that improvements shall be completed to the satisfaction of both the El Dorado County Department of Transportation and Caltrans. As such, Caltrans will be included in the approval process for the encroachment.

Response to CALTRANS.2-9

The commenter states that Mitigation Measure TRANS-5e on pages 2-61 and 4.11-67 of the Draft EIR incorrectly indicates that the conversion of the northbound right-turn lane to a shared through-right turn lane at the intersection of Diamond Road (SR-49) and Pleasant Valley Road should be completed at the discretion of El Dorado County. The commenter indicates that Caltrans operates the signal at the intersection and, therefore, changes to its configuration require Caltrans's review and approval. Mitigation Measure TRANS-5e has been updated to reflect Caltrans responsibility in this Final EIR's Section 4, Errata.

Response to CALTRANS.2-10

The commenter requests that a Traffic Management Plan (TMP) be prepared to minimize traffic impacts to the State Highway System during Project construction.

As noted in Section 4.11, Transportation of the Draft EIR, a TMP will be prepared for the Project. TMPs are required under Caltrans Deputy Directive 60 (DD-60) for all construction, maintenance,

encroachment permit, planned emergency restoration, locally or specially funded, or other activities on the State Highway System. Several mitigation measures for the Project require offsite improvements that involve Caltrans facilities and requisite Caltrans encroachment permits. In addition, the requirement for a TMP will be added to the Conditions of Approval for this Project.

Response to CALTRANS.2-11

The commenter requests detailed design with back-up calculations for the proposed storm drain that crosses SR-49. The commenter states that the culvert should be designed to ensure that the highway will not be overtopped during a design 25-year event and no adverse downstream impacts would be expected.

The developer is required to submit a Drainage Study with the improvement plans. The Conditions of Approval will be modified to include approval by Caltrans for the analysis and design within the SR-49 corridor.

Response to CALTRANS.2-12

The commenter provided closing remarks to the comment letter reiterating the request for a scoping meeting. Refer to Response to CALTRANS.2-1.

Response to CALTRANS.2-13

The commenter provided a previously prepared letter, dated June 20, 2008 regarding the Project. The comments included in the previously prepared letter are considered here within.

As a part of the previously prepared letter, the commenter stated that a Traffic Impact Study (TIS) should be completed for the Project and include an analysis of impacts to the US-50/ Missouri Flat Road interchange and SR-49. The commenter stated that the TIS should analyze both short-term impacts and full buildout impacts. The commenter also indicated that the TIS should use a Select Zone Analysis to identify trip distribution of the Project on the State Highway System.

As a part of the preparation of the Draft EIR, a Traffic Impact Analysis was completed in July 2010 by Kimley-Horn and Associates. The Analysis included both short-term and cumulative (2025) impacts. In addition, two supplemental traffic analyses were prepared in December 2010 and June 2010 to reflect changes to the original analyses. These changes included the removal of the previously assumed US-50/Missouri Flat Road single-point interchange configuration in the Cumulative (2025) scenario and the implementation of signalization at the Diamond Road (SR-49) and Lime Kiln Road/Black Rice Road intersection. These analyses are included in Appendix L of the Draft EIR.

Response to CALTRANS.2-14

The commenter stated that a grading plan and utility plan were received as part of the application package; however, they were difficult to read due to the small print and detail. Larger and/or clearer plans were requested.

Updated grading plans and utility plans were provided to Caltrans.

Response to CALTRANS.2-15

The commenter indicated that no drainage plans, drawing, calculations, or hydrologic/hydraulic reports were received with the Project's application. The commenter indicated that any stormwater created by the Project's impervious surface must be quantified and mitigated to avoid potential adverse hydrologic and/or hydraulic impacts downstream of the project site. The commenter requested detailed drainage plans with pre- and post-construction hydraulic calculations.

Refer to Response to CALTRANS.2-11.

Response to CALTRANS.2-16

The commenter stated that an encroachment permit is required for work conducted in the State's right of way.

The Project applicant would submit an encroachment permit application to Caltrans for any work proposed in the State's right of way.

Response to CALTRANS.2-17

The commenter provided a previously prepared email, dated January 20, 2011 regarding the Project. The comments included in the previously prepared email are considered here within.

The commenter indicated that Project's US-50 Supplemental Analysis, and Synchro and SimTraffic files were reviewed. The SimTraffic files provided showed spacing inconsistencies when compared with actual design plans. The commenter indicated that the SimTraffic files were modified to correctly reflect the Phase 1 US-50/Missouri Flat Road Interchange design geometrics and the SimTraffic files were re-run to evaluate facility operations. The commenter provided Mitigated LOS and Queuing results for US-50/Missouri Flat Road Interchange under the Cumulative No SPUI Plus DDRC Conditions. All LOS were indicated as F, which is beyond the Caltrans threshold of LOS D with LOS E only acceptable for the peak 15 minutes. As a result, the commenter indicated that the Phase 1 US-50/Missouri Flat Road Interchange geometrics will not be able accommodate the projected 2025 traffic volumes. The commenter stated that if no other physical improvements are being programmed for this interchange, then a parallel facility to Missouri Flat Road (overcrossing) and/or a parallel facility to US-50 would be needed to serve the traffic demand originating from the East.

Refer to Response to CALTRANS.2-3.

State of California -The Natural Resources Agency
DEPARTMENT OF FISH AND GAME
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EDMUND G. BROWN JR., Governor
CHARLTON H. BONHAM, Director

February 6, 2012

Rommel Pabalinas
County of El Dorado Planning Services
2850 Fairlane Court
Placerville, CA 95667

Subject: Comments on the Draft Environmental Impact Report for the Diamond Dorado Retail Center Project, SCH# 2008012004

Dear Mr. Pabalinas:

The Department of Fish and Game (DFG) has reviewed the County of El Dorado's Draft Environmental Impact Report (DEIR) for the proposed 280,515-square-foot commercial retail center in the form of one large one-story retail store; one medium-sized one-story retail store; up to seven smaller one-story retail/office buildings; a fuel station; 1,279 parking spaces; and realignment of the Material Recovery Facility access from Throwita Way to a new access road off of Lime Kiln Road, in the Diamond Springs area.

The DFG is providing comments on the DEIR as both a trustee agency and responsible agency under the California Environmental Quality Act (CEQA). As trustee for the State's fish and wildlife resources, the DFG has jurisdiction over the conservation, protection, and management of fish, wildlife, native plants, and the habitat necessary for biologically sustainable populations of such species. The DFG may also be a responsible agency for a project affecting biological resources where we will exercise our discretion after the lead agency to approve or carry out a proposed project or some facet thereof. 1

Impacts to Ephemeral Drainage

The DEIR identifies potential impacts to 1135 linear feet (0.075 acres) of two ephemeral drainages located on the project site, under the jurisdiction of the DFG, which are tributaries to Weber Creek. Also identified in the DEIR are potential impacts associated with the removal of 1.8 acres of valley foothill riparian habitat under the jurisdiction of the DFG.

In the event implementation of the proposed project involves such activities, and those activities will result in reasonably foreseeable substantial adverse effects on fish or wildlife, a Lake or Streambed Alteration Agreement (LSAA) will be required by the DFG. Because issuance of a LSAA is subject to review under CEQA, the Final Environmental Impact Report (FEIR) should analyze whether the potentially feasible mitigation measures set forth below will avoid or substantially reduce impacts requiring a LSAA from the DFG. 2

1. Protection and maintenance of the riparian, wetland, stream or lake systems to ensure a no-net-loss of habitat value and acreage within the system. Vegetation removal should not exceed the minimum necessary to complete operations.

2. Provisions for the protection of fish and wildlife resources at risk that consider various life stages, maintain migration and dispersal corridors, and protect essential breeding (i.e., spawning, nesting) habitats.

3. Delineation of buffers along streams, riparian zones, and wetlands to provided adequate protection to the aquatic resource. No grading or construction activities should be allowed within these buffers.

4. Placement of construction materials, spoils or fill, so that they cannot be washed into a stream or lake.

5. Prevention of downstream sedimentation and pollution. Provisions may include but not be limited to oil/grit separators, detention ponds, buffering filter strips, silt barriers, etc., to prevent downstream sedimentation and pollution.

6. Restoration plans must include performance standards such as the types of vegetation to be used, the timing of implementation, and contingency plans if the replanting is not successful. Restoration of disturbed areas should utilize native vegetation.

2 CONT

As the DEIR currently reads Mitigation Measure BIO-2a states in part that "mitigation required for direct and indirect impacts to all areas under the jurisdiction of federal and state resource agencies shall be carried out in accordance with the conditions of the Section 404 Permit and Lake and Streambed Alteration Agreement". Please note that simply requiring the project applicant to obtain a LSAA from the DFG does not reduce significant impacts to a level that is below significant under CEQA. As a responsible agency under CEQA, the DFG must rely on the CEQA analysis for the Project when exercising our discretion after the lead agency to approve or carry out some facet of a proposed project, such as the issuance of a LSAA. Therefore, the FEIR should include specific, enforceable mitigation and restoration actions to be carried out onsite, or within the same stream system, that will reduce the significant impacts associated with the permanent removal of 1.8 acres of riparian habitat identified in the DEIR, to a level that is below significant.

3

Enforceable Mitigation Measures

CEQA Guidelines §§15126.4 (a)(1)(B) states that formulation of mitigation measures should not be deferred until some future time. The DEIR lists mitigation measures for aquatic resources (i.e. mitigation measures BIO-2a, BIO-2b, and BIO-2c) that rely on future plans, surveys, approvals, or agreements with Resource Agencies as a means to bring identified significant environmental effects to below a level that is significant. Because there is no guarantee that these approvals or cooperation with all of the above entities will ultimately occur, the DFG believes that the above mitigation measures are unenforceable and do not bring the impacts to aquatic resources to below a level that is significant.

Mitigation measures should establish performance standards to evaluate the success of the proposed mitigation, provide a range of options to achieve the performance standards, and must commit the lead agency to successful completion of the mitigation. Mitigation measures should also describe when the mitigation measure will be implemented, and explain why the measure is feasible. Therefore, the DFG recommends that the mitigation measures in the FEIR be revised to include measures that are enforceable and do not defer mitigation details until some future time. The FEIR should identify the following items: how each measure will be carried out; who will perform the measures; where the mitigation will take place; when the measures will be performed; the performance standards and mechanisms for achieving success, and an assured source of funding to acquire and manage identified mitigation lands. The FEIR should describe a range of enforceable mitigation measures that will be implemented in instances where approval and cooperation with the entities identified above either does or does not occur.

4

Impacts to Oak Woodlands

The DEIR identifies the potential for significant impacts to oak woodlands located on the project site, including the potential for complete removal of the 4.3 acres of oak woodlands located onsite. Based on the recent judgment issued by the Third District Court of Appeals of California in the case of CENTER FOR SIERRA NEVADA CONSERVATION v. COUNTY OF EL DORADO, and pursuant to Public Resources Code Section 21084.4(b), the County should require one or more of the oak woodlands mitigation alternatives identified below to mitigate the significant effect of the conversion of oak woodlands in the FEIR:

1. Conserve oak woodlands, through the use of conservation easements.

2. Plant an appropriate number of trees, including maintaining plantings and replacing dead or diseased trees for seven years. Mitigation pursuant to this alternative shall not fulfill more than one half of the mitigation requirement for the project.

3. Contribute funds to the Oak Woodlands Conservation Fund, as established under subdivision (a) of Section 1363 of the Fish and Game Code, for the purpose of purchasing oak woodlands conservation easements, as specified under paragraph (1) of subdivision (d) of that Section and the guidelines and criteria of the Wildlife Conservation Board. A project applicant that contributes funds under this alternative shall not receive a grant from the Oak Woodlands Conservation Fund as part of the mitigation for the project.

5

If you have any questions please contact Patrick Moeszinger, Environmental Scientist, at (916) 358-2850 or, e-mail at pmoeszinger@dfg.ca.gov or Jennifer Navicky, Senior Environmental Scientist, at (916) 358-1340 or e-mail at jdnavicky@dfg.ca.gov.

Sincerely,

Jeff Drongesen
Environmental Program Manager

ec: Jeff Drongesen
Jennifer Navicky
Patrick Moeszinger

California Department of Fish and Game (DFG)

Response to DFG-1

The commenter provided introductory remarks to the comment letter and summarized the Proposed Project. The commenter indicated that the DFG is a trustee and responsible agency for the Project under CEQA. No response is necessary.

Response to DFG-2

The commenter indicates that a Lake or Streambed Alteration Agreement (LSAA) will be required by the DFG for potential impacts to 1,135 linear feet of two ephemeral drainages and 1.8 acres of valley foothill riparian habitat if those impacts will result in reasonably foreseeable substantial adverse effects on fish or wildlife. The commenter indicated that the issuance of an LSAA is subject to CEQA; therefore, the Final EIR should analyze whether the potentially feasible mitigation measures provided in the comment letter will avoid or substantially reduce impacts requiring an LSAA. The potentially feasible mitigation measures provided are as follows:

1. Protection and maintenance of the riparian, wetland, stream or lake systems to ensure a no-net-loss of habitat value and acreage within the system. Vegetation removal should not exceed the minimum necessary to complete operations.
2. Provisions for the protection of fish and wildlife resources at risk that consider various life stages, maintain migration and dispersal corridors, and protect essential breeding (i.e., spawning, nesting) habitats.
3. Delineation of buffers along streams, riparian zones, and wetlands to provide adequate protection to the aquatic resource. No grading or construction activities should be allowed within these buffers.
4. Placement of construction materials, spoils or fill, so that they cannot be washed into a stream or lake.
5. Prevention of downstream sedimentation and pollution. Provisions may include but not be limited to oil/grit separators, detention ponds, buffering filter strips, silt barriers, etc., to prevent downstream sedimentation and pollution.
6. Restoration plans must include performance standards such as the types of vegetation to be used, the timing of implementation, and contingency plans if the replanting is not successful. Restoration of disturbed areas should utilize native vegetation.

The Project would remove up to 1.39 acres of CDFG jurisdictional wetland habitat and up to 0.141 acre of USACE jurisdictional areas (including the ephemeral drainages and seasonal wetland). These USACE and CDFG jurisdictional features consist of fragmented habitat and are of marginal quality. Preservation or avoidance of the seasonal wetland and portions of the ephemeral drainage are not practicable in coordination with the Project. Mitigation Measures BIO-2a through BIO-2c require the

Project applicant to obtain USACE and CDFG permits to reduce potential impacts. Areas that cannot be avoided would be restored, or if restoration onsite is not possible, mitigation credits or restoration at other areas would be completed.

As stated in Mitigation Measure BIO-2a, prior to the initiation of ground clearing or other construction activities, the Project applicant will be required to obtain a CDFG Section 1602 LSAA. Mitigation required for the direct and indirect impacts to all areas under jurisdiction of federal and state resource agencies will be carried out as determined and outlined by the LSAA.

As stated in Mitigation Measure BIO-2b, impacts to jurisdictional features, including wetlands, shall be mitigated through replacement or rehabilitation on a "no-net-loss" basis in accordance with United Stated Army Corps of Engineers (USACE).

Mitigation Measure BIO-2c requires the protection of preserved seasonal and perennial drainages through adequate setback, implementation of measures to minimize erosion and runoff, and siltation and pollution controls.

In addition, Mitigation Measure HYD-1 requires the implementation of a Stormwater Pollution Prevention Plan (SWPPP) and associated Best Management Practices (BMPs) to prevent stormwater pollution during construction activities and implement site restoration.

In summary, the issuance of an LSAA has been included in the Draft EIR to avoid or reduce impacts to wetlands and riparian habitat to the extent feasible and, therefore, has been considered under CEQA.

Response to DFG-3

The commenter states that requiring the Project applicant to obtain a LSAA from the DFG does not reduce significant impacts to a level that is below significant under CEQA. The commenter indicated that the Final EIR should include specific, enforceable mitigation and restoration actions to be carried out onsite, or within the same stream system, that will reduce the significant impacts associated with the permanent removal of 1.8 acres of riparian habitat identified in the Draft EIR, to a level that is below significant.

As noted in Response to DFG-2, several mitigation measures included in the EIR would protect or reduce impacts related to the removal of 1.8 acres of riparian habitat to a level of less than significant. Mitigation Measures BIO-2a through 2c adequately mitigate impacts to wetlands. In particular, the mitigation measures first stress avoidance and minimization of impacts to waters where possible. In addition, the mitigation measures outline the permitting process and a ratio at which features will be mitigated. Further, the mitigation measures provide for a process of mitigating for any features lost and a mechanism to compensate the regulatory agencies. As outlined, between the three mitigation measures there are measurable and enforceable performance standards (i.e., incorporating into grading plans) to assure that jurisdictional waters, including riparian habitat, are properly mitigated for.

Response to DFG-4

The commenter cited CEQA Guidelines Section 15126.4 (a)(1)(B) indicating that formulation of mitigation measures should not be deferred until some future time. The commenter states that Mitigation Measure BIO-2a, BIO-2b, and BIO-2c rely on future plans, surveys, approvals, or agreements with Resource Agencies as a means to bring identified significant environmental effects to below a level that is significant. The commenter indicates that because there is no guarantee that future approvals or cooperation with all entities will ultimately occur, the referenced mitigation measures are not enforceable; therefore, the potentially significant impacts are not reduced to a less than significant level. The commenter further explains that mitigation measures should indicate performance standards, options to achieve the performance standards, timing of mitigation and why the mitigation is feasible. The commenter requests that the mitigation measures be revised and identify the following items: how each measure will be carried out, who will perform the measures, where the mitigation will take place, when the measures will be performed, the performance standards and mechanisms for achieving success, and an assured source of funding to acquire and manage mitigation lands. The commenter further requests that the Final EIR describe a range of enforceable mitigation measures that will be implemented where approval and cooperation with responsible or trustee agencies do not occur.

With regard to the "deferral" of mitigation, the Project applicant has already submitted adequate information to characterize the baseline conditions and analyze the impacts associated with the implementation of the Project, as presented in the Draft EIR. Resources occurring and potentially occurring have been adequately characterized and analyzed. Mitigation Measures BIO-2a, BIO-2b, and BIO-2c each require that specific steps be taken prior to the initiation of construction activities, as part of the permitting process or included in project plans (i.e., incorporating into grading plans). Accordingly, the mitigation measures identify specific actions that must be carried out at specific times. The mitigation measures adhere to published guidance issued by responsible and trustee agencies such as CDFG and USACE. Accordingly, this would not be considered deferred mitigation.

The commenter notes that there is no guarantee that future approvals or cooperation with all permitting entities will ultimately occur. However, Mitigation Measure BIO-2a indicates that impacts to jurisdictional features would require authorization prior to action and, this in and of itself, is a condition required to carry the project out.

Response to DFG-5

The commenter referenced the judgment issued by the Third District Court of Appeals of California in the case of *Center for Sierra Nevada Conservation v. County of El Dorado.* The commenter indicates the County should require one or more of the following oak woodland mitigation alternatives to mitigate the significant effect on the conversion of oak woodlands in the Final EIR:

1. Conserve oak woodlands, through the use of conservation easements.
2. Plan an appropriate number of trees, including maintaining plantings and replacing dead or diseased trees for seven years. Mitigation pursuant to this alternative shall not fulfill more than one half of the mitigation requirement for the Project.
3. Contribute funds to the Oak Woodlands Conservation Fund, as established under subdivision (a) of Section 1363 of the Fish and Game Code, for the purpose of purchasing oak woodlands conservation easements, as specified under paragraph (1) of subdivision (d) of that Section and the guidelines and criteria of the Wildlife Conservation Board. A project applicant that contributes funds under this alternative shall not receive a grant from the Oak Woodlands Conservation Fund as part of the mitigation for the project.

On May 6, 2008, the El Dorado County Board of Supervisors adopted the Oak Woodland Management Plan (OWMP) and its implementing ordinance (Chapter 17.73 of the County Code), which outlined appropriate measures for oak woodland mitigation. Mitigation Measure BIO-3a requires that the Project comply with the OWMP by mitigating for oak woodland canopy removed in accordance with either Option A (On-Site Mitigation, Replanting and Replacement), Option B (Conservation Fund In-Lieu Fee), or a combination of both options.

On June 6, 2008, a lawsuit was filed by the Center for Sierra Nevada Conservation, claiming that the Board's adoption of the OWMP based on a negative declaration tiered off the General Plan's 2004 Program EIR was in violation of CEQA. On February 2, 2010, El Dorado County Court ruled to uphold the Board's action to adopt the plan, citing its consistency with the General Plan.

On January 20, 2012, after the issuance of the Draft EIR on December 23, 2011, the El Dorado County Court's decision was overruled by the Third District Court of Appeal, indicating that a tiered EIR was required in place of the negative declaration because the 2004 Program EIR did not adequately study the potential impacts of the OWMP and fee program.

As a result, Option B, as included in Mitigation Measure BIO-3a of the EIR, is no longer a viable option. The applicant must now mitigate for oak woodland impacts in accordance with the El Dorado County General Plan Policy 7.4.4.4 (Option A), which includes onsite mitigation, replanting, and replacement.

Based on the proposed site plan, a significant portion of the onsite oak trees is in the center of the project area. Because of this, the Project as proposed cannot comply with the onsite retention requirements of General Plan Policy 7.4.4.4. Furthermore, because of the highly disturbed nature of the project site and its industrial and commercial surroundings, onsite preservation of the existing oak features is undesirable, as they have little habitat value. Therefore, the County's goal of preserving and maintaining functional oak woodland habitat would be better served through offsite mitigation or payment of fees for the use of conservation.

Prior to the approval of the Final Development Plan for the Project, it is expected that the County will adopt a new mitigation program as an alternative to retention of onsite oaks as directed by General Play Policy 7.4.2.8 and Measure CO-M. Accordingly, although there are a number of potential feasible and reasonable mitigation measures that may be available for the removal of oaks at the time the Final Development Plan is approved, it is impossible to articulate the precise approach to mitigation until the County has adopted its response to the lawsuit and how it intends to implement Policy 7.4.4.4. As such, Mitigation Measure BIO-3a indicates that a grading permit cannot be issued until the County has adopted a mitigation program that is compliant with CEQA and provides for a feasible alternative to retention of onsite oaks. Should the County fail to adopt an alternative to onsite retention of oaks, the project would be required to be redesigned prior to approval of the Final Development Plan and would be subject to additional environmental review.

STATE OF CALIFORNIA
Governor's Office of Planning and Research
State Clearinghouse and Planning Unit

Edmund G. Brown Jr.
Governor

Ken Alex
Director

February 7, 2012

Rommel Pabalinas
El Dorado County
2850 Fairlane Court
Placerville, CA 95667

Subject: Diamond Dorado Retail Center Project
SCH#: 2008012004

Dear Rommel Pabalinas:

The State Clearinghouse submitted the above named Draft EIR to selected state agencies for review. On the enclosed Document Details Report please note that the Clearinghouse has listed the state agencies that reviewed your document. The review period closed on February 6, 2012, and the comments from the responding agency (ies) is (are) enclosed. If this comment package is not in order, please notify the State Clearinghouse immediately. Please refer to the project's ten-digit State Clearinghouse number in future correspondence so that we may respond promptly.

Please note that Section 21104(c) of the California Public Resources Code states that:

> "A responsible or other public agency shall only make substantive comments regarding those activities involved in a project which are within an area of expertise of the agency or which are required to be carried out or approved by the agency. Those comments shall be supported by specific documentation."

1

These comments are forwarded for use in preparing your final environmental document. Should you need more information or clarification of the enclosed comments, we recommend that you contact the commenting agency directly.

This letter acknowledges that you have complied with the State Clearinghouse review requirements for draft environmental documents, pursuant to the California Environmental Quality Act. Please contact the State Clearinghouse at (916) 445-0613 if you have any questions regarding the environmental review process.

Sincerely,

Scott Morgan
Director, State Clearinghouse

Enclosures
cc: Resources Agency

RECEIVED
12 FEB -8 AM 11:43
PLANNING DEPARTMENT

Document Details Report
State Clearinghouse Data Base

SCH# 2008012004
Project Title Diamond Dorado Retail Center Project
Lead Agency El Dorado County

Type EIR Draft EIR

Description Proposed project consists of General Plan Amendment from Industrial to Commercial, Rezone from industrial to General Commercial-Planned Development, Planned Development permit, Development Agreement, and Commercial Tentative Parcel Map to allow for the construction of the 280,515 s.f. Diamond Dorado Retail Center, realignment of the Material recovery Facility access route, and associated offsite roadway improvements. The DDRC would include up to nine commercial/retail buildings and 1,279 parking spaces on 27.61 acres of the 30.63 acre project site. The remaining 3.02 acres of the project site would be utilized for the realigned MRF access route.

Lead Agency Contact

Name Rommel Pabalinas
Agency El Dorado County
Phone 530 621 5363 **Fax**
email
Address 2850 Fairlane Court
City Placerville **State** CA **Zip** 95667

Project Location

County El Dorado
City Diamond Springs
Region
Lat / Long 38° 42' 2.94" N / 120° 48' 52.3" W
Cross Streets Missouri Flat Road; Diamond Road (SR-49
Parcel No. 051-250-12,-46,-47,-51,-54
Township 10N **Range** 10,11E **Section** 24,25; **Base** MDBM

1 CONT

Proximity to:

Highways SR-49
Airports No
Railways SPTC
Waterways Weber Creek
Schools Herbert Green Middle
Land Use Present Land Use: undeveloped
Z: Industrial
GPD: Industrial

Project Issues Aesthetic/Visual; Air Quality; Archaeologic-Historic; Biological Resources; Drainage/Absorption; Economics/Jobs; Flood Plain/Flooding; Forest Land/Fire Hazard; Geologic/Seismic; Minerals; Noise; Population/Housing Balance; Public Services; Sewer Capacity; Soil Erosion/Compaction/Grading; Solid Waste; Toxic/Hazardous; Traffic/Circulation; Vegetation; Water Quality; Water Supply; Wetland/Riparian; Growth Inducing; Landuse; Cumulative Effects

Reviewing Agencies Resources Agency; Department of Conservation; Department of Fish and Game, Region 2; Office of Historic Preservation; Department of Parks and Recreation; Department of Water Resources; California Highway Patrol; Caltrans, District 3; Regional Water Quality Control Bd., Region 5 (Sacramento); Native American Heritage Commission; Public Utilities Commission

Date Received 12/23/2011 **Start of Review** 12/23/2011 **End of Review** 02/06/2012

Note: Blanks in data fields result from insufficient information provided by lead agency.

California Regional Water Quality Control Board
Central Valley Region
Katherine Hart, Chair

11020 Sun Center Drive, #200, Rancho Cordova, California 95670-6114
(916) 464-3291 • FAX (916) 464-4645
http://www.waterboards.ca.gov/centralvalley

Matthew Rodriquez
Secretary for
Environmental Protection

Edmund G. Brown Jr.
Governor

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2/6/2012
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OPR
Page 3 of 5

11 January 2012

CERTIFIED MAIL
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Rommel Pabalinas
El Dorado County
2850 Fairlane Court
Placerville, CA 95667

COMMENTS TO DRAFT ENVIRONMENTAL IMPACT REPORT, DIAMOND DORADO RETAIL CENTER PROJECT, SCH NO. 2008012004, EL DORADO COUNTY

Pursuant to the State Clearinghouse's 23 December 2011 request, the Central Valley Regional Water Quality Control Board (Central Valley Water Board) has reviewed the *Draft Environmental Impact Report* for the Diamond Dorado Retail Center Project, located in El Dorado County.

Our agency is delegated with the responsibility of protecting the quality of surface and groundwaters of the state; therefore our comments will address concerns surrounding those issues.

Construction Storm Water General Permit 1 CONT

Dischargers whose project disturb one or more acres of soil or where projects disturb less than one acre but are part of a larger common plan of development that in total disturbs one or more acres, are required to obtain coverage under the General Permit for Storm Water Discharges Associated with Construction Activities (Construction General Permit), Construction General Permit Order No. 2009-009-DWQ. Construction activity subject to this permit includes clearing, grading, grubbing, disturbances to the ground, such as stockpiling, or excavation, but does not include regular maintenance activities performed to restore the original line, grade, or capacity of the facility. The Construction General Permit requires the development and implementation of a Storm Water Pollution Prevention Plan (SWPPP).

For more information on the Construction General Permit, visit the State Water Resources Control Board website at:
http://www.waterboards.ca.gov/water_issues/programs/stormwater/constpermits.shtml

Phase I and II Municipal Separate Storm Sewer System (MS4) Permits[1]

The Phase I and II MS4 permits require the Permittees reduce pollutants and runoff flows from new development and redevelopment using Best Management Practices (BMPs) to the maximum extent practicable (MEP). MS4 Permittees have their own development standards, also known as Low Impact Development (LID)/post-construction standards that include a hydromodification component. The MS4 permits also require specific design concepts for LID/post-construction BMPs in the early stages of a project during the entitlement and CEQA process and the development plan review process.

For more information on which Phase I MS4 Permit this project applies to, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/storm_water/municipal_permits/

Industrial Storm Water General Permit

Storm water discharges associated with industrial sites must comply with the regulations contained in the Industrial Storm Water General Permit Order No. 97-03-DWQ.

For more information on the Industrial Storm Water General Permit, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/storm_water/industrial_general_permits/index.shtml.

Clean Water Act Section 404 Permit

1 CONT

If the project will involve the discharge of dredged or fill material in navigable waters or wetlands, a permit pursuant to Section 404 of the Clean Water Act may be needed for the United States Army Corps of Engineers (USACOE). If a Section 404 permit is required by the USACOE, the Central Valley Water Board will review the permit application to ensure that discharge will not violate water quality standards. If the project requires surface water drainage realignment, the applicant is advised to contact the Department of Fish and Game for information on Streambed Alteration Permit requirements.

If you have any questions regarding the Clean Water Act Section 404 permits, please contact the Regulatory Division of the Sacramento District of USACOE at (916) 557-5250.

Clean Water Act Section 401 Permit – Water Quality Certification

If an USACOE permit, or any other federal permit, is required for this project due to the disturbance of waters of the United States (such as streams and wetlands), then a Water Quality Certification must be obtained from the Central Valley Water Board prior to initiation of project activities. There are no waivers for 401 Water Quality Certifications.

[1] Municipal Permits = The Phase I Municipal Separate Storm Water System (MS4) Permit covers medium sized Municipalities (serving between 100,000 and 250,000 people) and large sized municipalities (serving over 250,000 people). The Phase II MS4 provides coverage for small municipalities, including non-traditional Small MS4s, which include military bases, public campuses, prisons and hospitals.

Waste Discharge Requirements

If USACOE determines that only non-jurisdictional waters of the State (i.e., "non-federal" waters of the State) are present in the proposed project area, the proposed project will require a Waste Discharge Requirement (WDR) permit to be issued by Central Valley Water Board. Under the California Porter-Cologne Water Quality Control Act, discharges to all waters of the State, including all wetlands and other waters of the State including, but not limited to, isolated wetlands, are subject to State regulation.

1 CONT

For more information on the Water Quality Certification and WDR processes, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/water_quality_certification/

If you have questions regarding these comments, please contact me at (916) 464-4745 or gsparks@waterboards.ca.gov.

Genevieve Sparks

Genevieve (Gen) Sparks
Environmental Scientist
401 Water Quality Certification Program

cc: State Clearinghouse Unit, Governor's Office of Planning and Research, Sacramento

State of California, Governor's Office of Planning and Research, State Clearinghouse and Planning Unit (OPR)

Response to OPR-1

The comment letter is the standard form letter issued by the Office of Planning and Research, State Clearinghouse and Planning Unit confirming that the Draft EIR was distributed to various state agencies, and that the County of El Dorado has complied with statutory review requirements. The letter forwarded a single comment letter received by the California Regional Water Quality Control Board, Central Valley Region. Responses to the forwarded comment letter are found here within under Response to RWQCB-1 through RWQCB-6.

California Regional Water Quality Control Board
Central Valley Region
Katherine Hart, Chair

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Matthew Rodriquez
Secretary for
Environmental Protection

Edmund G. Brown Jr.
Governor

11 January 2012

Rommel Pabalinas
El Dorado County
2850 Fairlane Court
Placerville, CA 95667

CERTIFIED MAIL
7011 2970 0003 8939 7981

COMMENTS TO DRAFT ENVIRONMENTAL IMPACT REPORT, DIAMOND DORADO RETAIL CENTER PROJECT, SCH NO. 2008012004, EL DORADO COUNTY

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Our agency is delegated with the responsibility of protecting the quality of surface and groundwaters of the state; therefore our comments will address concerns surrounding those issues.

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Dischargers whose project disturb one or more acres of soil or where projects disturb less than one acre but are part of a larger common plan of development that in total disturbs one or more acres, are required to obtain coverage under the General Permit for Storm Water Discharges Associated with Construction Activities (Construction General Permit), Construction General Permit Order No. 2009-009-DWQ. Construction activity subject to this permit includes clearing, grading, grubbing, disturbances to the ground, such as stockpiling, or excavation, but does not include regular maintenance activities performed to restore the original line, grade, or capacity of the facility. The Construction General Permit requires the development and implementation of a Storm Water Pollution Prevention Plan (SWPPP). 1

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For more information on which Phase I MS4 Permit this project applies to, visit the Central Valley Water Board website at:
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Industrial Storm Water General Permit

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For more information on the Industrial Storm Water General Permit, visit the Central Valley Water Board website at: 3
http://www.waterboards.ca.gov/centralvalley/water_issues/storm_water/industrial_general_permits/index.shtml.

Clean Water Act Section 404 Permit

If the project will involve the discharge of dredged or fill material in navigable waters or wetlands, a permit pursuant to Section 404 of the Clean Water Act may be needed for the United States Army Corps of Engineers (USACOE). If a Section 404 permit is required by the USACOE, the Central Valley Water Board will review the permit application to ensure that discharge will not violate water quality standards. If the project requires surface water drainage realignment, the applicant is advised to contact the Department of Fish and Game for information on Streambed Alteration Permit requirements. 4

If you have any questions regarding the Clean Water Act Section 404 permits, please contact the Regulatory Division of the Sacramento District of USACOE at (916) 557-5250.

Clean Water Act Section 401 Permit – Water Quality Certification

If an USACOE permit, or any other federal permit, is required for this project due to the disturbance of waters of the United States (such as streams and wetlands), then a Water Quality Certification must be obtained from the Central Valley Water Board prior to initiation of project activities. There are no waivers for 401 Water Quality Certifications. 5

[1] Municipal Permits = The Phase I Municipal Separate Storm Water System (MS4) Permit covers medium sized Municipalities (serving between 100,000 and 250,000 people) and large sized municipalities (serving over 250,000 people). The Phase II MS4 provides coverage for small municipalities, including non-traditional Small MS4s, which include military bases, public campuses, prisons and hospitals.

Waste Discharge Requirements

If USACOE determines that only non-jurisdictional waters of the State (i.e., "non-federal" waters of the State) are present in the proposed project area, the proposed project will require a Waste Discharge Requirement (WDR) permit to be issued by Central Valley Water Board. Under the California Porter-Cologne Water Quality Control Act, discharges to all waters of the State, including all wetlands and other waters of the State including, but not limited to, isolated wetlands, are subject to State regulation. 6

For more information on the Water Quality Certification and WDR processes, visit the Central Valley Water Board website at:
http://www.waterboards.ca.gov/centralvalley/water_issues/water_quality_certification/

If you have questions regarding these comments, please contact me at (916) 464-4745 or gsparks@waterboards.ca.gov.

Genevieve Sparks

Genevieve (Gen) Sparks
Environmental Scientist
401 Water Quality Certification Program

cc: State Clearinghouse Unit, Governor's Office of Planning and Research, Sacramento

California Regional Water Quality Control Board, Central Valley Region (RWQCB)

Response to RWQCB-1

The commenter stated that projects that disturb more than one acre of soil are required to obtain coverage under the General Permit for Storm Water Discharges Associated with Construction Activities Construction General Permit Order No. 2009-009-DWQ.

As included in the Draft EIR, pages 4.7-11 through 4.7-12, the project applicant shall be required to prepare and submit a Stormwater Pollution Prevention Plan (SWPPP) that identifies Best Management Practices (BMPs) to prevent stormwater pollution during construction activities. The SWPPP would be prepared in accordance with the Project's Construction General Permit as required under the Clean Water Act's National Pollutant Discharge Elimination System (NPDES) permitting program and the Porter-Cologne Water Quality Control Act. In addition, the Project is required to abide by the Western El Dorado County Storm Water Management Plan, which identifies how the County complies with the provisions of the NPDES permit issued by the California State Water Resources Control Board.

Response to RWQCB-2

The commenter indicated that the Project would be subject to a Phase I MS4 permit, requiring the reduction of pollutants and runoff flows from new development using BMPs to the maximum extent practicable.

El Dorado County's stormwater and urban runoff discharges are included in a Phase I MS4 area-wide permit along with the City of South Lake Tahoe and Placer County under Order No. R6T-2005-0026 and NPDES No. CAG616001. As required by a Phase I MS4 permit, the Western El Dorado Storm Water Management Plan (SWMP) provides a framework for consistent, effective, and efficient implementation of stormwater management practices in all of the unincorporated area of Western El Dorado County, including the project site. The SWMP includes construction and post-construction runoff control measures as well as pollution prevention measures. The County's Grading Erosion and Sediment Control Ordinance; Drainage Manual; and Design and Improvement Standards Manual all ensure implementation of the SWMP. Because the Project is required to be consistent with the County's Grading Erosion and Sediment Control Ordinance, Drainage Manual, and Design and Improvement Standards Manual, the Project would also be consistent with the SWMP as required by the existing Phase I MS4 Permit.

Response to RWQCB-3

The commenter stated that stormwater discharges associated with industrial sites must comply with the regulations contained in the Industrial Storm Water General Permit Order No. 97-03-DWQ.

The proposed Diamond Dorado Retail Center would not be considered an industrial land use and would not be subject to the Industrial Storm Water General Permit. While minor modifications to the Material Recovery Facility (MRF) site would occur, these modifications would be limited to the

MRF's entry gate area at the terminus of Throwita Way and would not be expected to affect current stormwater operations within the MRF or its existing permit under Order No. 97-03-DWQ.

Response to RWQCB-4

The commenter stated that the Project may require a Section 404 permit from the United States Army Corps of Engineers (USACE) and that the Central Valley Water Board will review the permit application to ensure discharge will not violate water quality standards. The commenter also indicated that if the Project requires surface water drainage realignment, the applicant is advised to contact the California Department of Fish and Game for information on an LSAA.

As noted in Mitigation Measure BIO-2a, a Section 404 permit from the USACE and a Section 1602 LSAA from the CDFG would be required prior to the implementation of construction activities. The Central Valley Water Board would be provided with the permit applicant for review as required.

Response to RWQCB-5

The commenter indicated that if a USACE permit is required for the Project, then a Section 401 Water Quality Certification would be required from the Central Valley Water Board, prior to the initiation of Project activities.

As noted in Mitigation Measure BIO-2a, a Section 404 permit from the USACE would be required, and as such a Section 401 Water Quality Certification would be required from the Central Valley Water Board. The project applicant would apply for the Section 401 permit at the time of the Section 404 permit application as required.

Response to RWQCB-6

The commenter stated that if only non-jurisdiction waters of the State (i.e., "non-federal" waters of the State) are present on the project site, the Project would be required to obtain a Waste Discharge Requirement permit from the Central Valley Water Board in accordance with the California Porter-Cologne Water Quality Control Act.

As noted on page 4.3-28 under Impact BIO-2, the project site contains 0.141 acre of drainage that are likely under the jurisdiction of the USACE. Implementation of Mitigation Measure BIO-2a would require the confirmation of federally jurisdictional features and the requisite 404 permit and Section 1062 LSAA permit. As such, a Waste Discharge Requirement permit is expected to be required.

DIAMOND SPRINGS AND EL DORADO
COMMUNITY ADVISORY COMMITTEE

April 10, 2012

Roger Trout, Director
El Dorado County
Development Services
2850 Fairlane Court, Building C
Placerville, CA 95667

Re: **DEIR for Diamond Dorado Retail Center**
Z07-0054/Planned Development PD07-0034/Parcel Map P08-0017/Development Agreement DA11-0003

Mr. Trout:

The Diamond Springs / El Dorado Community Advisory Committee met on March 15, 2012. During the course of this meeting application Z07-0054/Planned Development PD07-0034/Parcel Map P08-0017/Development Agreement DA11-0003 was considered under Agenda item Old Business #3. In examining this application, the committee agreed upon the following: 1

1. The DS/EDCAC supports the access to the MRF to be from the Parkway access other than from Lime Kiln Road.
2. The design of the big box development will require exceptional architecture, that echoes the design guidelines of the area, being the architecture of the gold rush era. 2

Public comment on this project was in agreement with both of the points expressed as traffic flow on Lime Kiln would be adversely affected by the entrance being from there as opposed to the Parkway. The representatives, of the applicant (Michelle Smira & Andy Sanegar (spelling?), displayed plans showing this revision, even though they recognize the loss of 40,000 square feet of retail development. 3

Sincerely,

/s/*Robert A. Smart, Jr.*

Robert A. Smart, Jr.
Chair

Local Agencies

Diamond Springs and El Dorado Community Advisory Committee (DSEDCAC.1)

Response to DSEDCAC.1-1

The commenter indicated a preference for the MRF access to be maintained on Throwita Way. Comment noted.

Response to DSEDCAC.1-2

The commenter stated that the design of the retail center will require "exceptional architecture," consistent with the gold rush era.

As noted throughout the Draft EIR, the DDRC would be consistent with the Missouri Flat Design Guidelines, which recommend the incorporation of elements from the Gold Rush era.

Response to DSEDCAC.1-3

The commenter stated that traffic on Lime Kiln Road would be adversely affected by the relocation of the MRF entrance and reiterated support for the MRF access to be maintained on Throwita Way. Comment noted.

DIAMOND SPRINGS AND EL DORADO
COMMUNITY ADVISORY COMMITTEE

June 8, 2012

Roger Trout, Director
El Dorado County
Development Services
2850 Fairlane Court, Building C
Placerville, CA 95667

Several Issues were discussed with the developer of the Diamond Dorado Project at the DS/ED CAC meeting of May 17, 2012. The CAC has the following comments and recommendations: 1

1. The original plan and the EIR proposed that the truck access to the MRF be moved to Lime Kiln Road. The CAC strongly supports the revised plan to move that traffic to the main project entrance from the Parkway.

2. With respect to the project drawings, the proposed rooflines and massing were favorably received. We suggest that the designs attempt to incorporate items that link the current project to local character and history (such as aged rock walls and/or industrial equipment). Caldor Lumber Company operations (including the Diamond-Caldor Railroad) and the Lime Kiln plant with its aerial tram were located on or adjacent to this property. 2

3. We requested that the NE corner of the development at the intersection of Highway 49 and the Parkway be enhanced. This is one of the gateways to Diamond Springs and this area should be a transition to the historic downtown area. 3

4. We would like this project to be part of a complete streets concept ask that thought be given to developing pedestrian and bicycle access to downtown Diamond Springs. Gradient issues and Highway design impact development of these pathways, but the proximity to the downtown suggests making it a part of the circulation pattern from downtown to the El Dorado Trail. 4

5. Additionally we suggest that landscaping and design elements be used to screen the parking areas, and that xeriscape elements be used to reduce water usage. We would like the lighting design to minimize light pollution and provide optimum dark skies. We received public comment that the drainage of this area toward Weber Creek should receive consideration due to the multiple culverts, creeks and wetlands involved. In 5

addition, the Parkway is on the watershed break between the South Fork of the American River and the North Fork of the Cosumnes River; animals frequently cross between these major drainages. A specially designed drainage crossing on the Parkway could be developed to accommodate water needs, animal passage, and a safe grade-separated crossing for people; a measure that could help mitigate three major concerns. 5 CONT

Sincerely,

/s/Robert A. Smart, Jr.
Robert A. Smart, Jr.
Chairperson

Diamond Springs and El Dorado Community Advisory Committee (DSEDCAC.2)

Response to DSEDCAC.2-1

The commenter expressed support for the retention of the Throwita Way MRF access. Comment noted. Consideration of the retention of the Throwita Way MRF Access has been added to the EIR through the addition of Alternative 5: Existing MRF Access. Refer to Section 4, Errata for further discussion of the alternative.

Response to DSEDCAC.2-2

The commenter suggested that the Project's design incorporate features that link the Project to the local character and history (such as aged rock walls and/or industrial equipment). The commenter referenced the project site's former uses under the Caldor Lumber Company, Diamond-Caldor Railroad, and Lime Kiln plan.

As noted throughout the Draft EIR, the DDRC would be consistent with the Missouri Flat Design Guidelines. The Project would incorporate features referencing local character and history as appropriate and feasible.

Response to DSEDCAC.2-3

The commenter requested that the northeastern corner of the development, located at the intersection of Diamond Road (SR-49) and Diamond Springs Parkway be enhanced to reflect its status as a gateway to historic downtown Diamond Springs.

Comment noted.

Response to DSEDCAC.2-4

The commenter requested that the Project implement complete street concepts, including the development of pedestrian and bicycle access to downtown Diamond Springs and links to the El Dorado Multi-Use Trail.

As noted in the Draft EIR, the Project would include a link to the El Dorado Multi-Use Trail. Bicycle and pedestrian traffic would be able to utilize Diamond Springs Road (SR-49) to access downtown Diamond Springs.

Response to DSEDCAC.2-5

The commenter suggested that landscaping and design elements be used to screen the parking areas, and that xeriscape elements be used to reduce water usage. The commenter also requested that the Project's lighting design minimize light pollution and provide optimum dark skies. The commenter further requested that a specially designed drainage crossing on the Parkway be developed to accommodate water needs, animal passage, and a safe grade-separated crossing for people.

Mitigation Measure PSU-3a would require the project applicant to implement Model Landscape and Water Conservation Standards including outdoor irrigation water conservation measures. In addition, final landscaping plans must be approved by El Dorado County.

As noted in the Draft EIR, on page 4.1-18, the Project's lighting fixtures have the potential to create unwanted spillover effects onto surrounding properties. However, both the parking lot and building lighting fixtures would be designed with cutoff type fixtures or shielded light fixtures, or a combination of fixture types to cast light downward, thereby providing lighting at the ground level for pedestrian safety while reducing glare to adjacent properties. Furthermore, the project applicant has submitted the photometric plan to the County identifying lighting fixtures and practices to minimize light trespass onto neighboring properties. Implementation of the County approved photometric plan and design guidelines would ensure lighting would be appropriate for the project site and would not result in unwanted glare or illumination of adjoining properties.

Drainage crossings beneath the separately proposed Parkway would be constructed as a part of the Diamond Springs Parkway Project. While DDRC's stormwater drainage would utilize such infrastructure, the final design of Parkway drainage crossings is not at the discretion of the project applicant nor would it be implemented as part of the Project.

Diamond Springs - El Dorado
Fire Protection District

January 24, 2012

Mel Pabalinas
El Dorado County Development Services
Department-Planning Services
2850 Fairlane Court
Placerville, CA 95667

Re: Response to Draft Environmental Impact Report (SCH No. 2008012004)
Diamond Dorado Retail Center

Dear Mr. Pabalinas,

The Fire District is responding to the Draft Environmental Impact Report (EIR). This response is in the format of timing and context, given that material changes have occurred in the project environment during the study period:

General:
In the original project scoping, the Materials Recycling Facility (MRF) was not a component of the project. The Draft EIR now indicates that the MRF will remain at its existing location and that access will be redesigned. This configuration of land uses and traffic patterns will likely create increased routine concentration of request for service (incidents). Similar to the concerns related to the bulk propane storage facilities located nearby, this configuration of land use causes some increased concern for disaster or major incident management issues. A single incident of this nature would exceed the capacity of this agency. 1

Policy 5.1.2.1
The Draft EIR states that the findings are consistent and that "providers would have sufficient capability to service the Proposed Project." 2

On June 9th 2010 the District approved the revision of the Fire District Capitol Improvement Plan (CIP). The El Dorado County Planning Commission subsequently found this plan "consistent with the El Dorado County General Plan". However, the ratification and implementation of the plan has been stalled by the El Dorado County Board of Supervisors. Therefore, currently there is no means under the current CIP for the Developer or District to secure funding within the CIP to "increase service capacity" as required by Policy 5.1.2.1.

2
CONT

Following the initial comment period the District underwent a staffing reduction of 33 percent. Additionally, staffing and service level reductions have impacted all of the automatic aid providers in the County. This will be further exacerbated by the loss of supplemental funding to several fire agencies this year (see City Gate Report). This District now anticipates a revised minimum impact from this development of 98 calls for service each year, during which 100 percent of the District's available emergency resources will be committed for 45 minutes during each incident.

The District considers this a significant impact.

Sincerely,

Todd Cunningham
Fire Chief

Diamond Springs – El Dorado Fire Protection District (DSEDFPD)

Response to DSEDFPD-1

The commenter stated that the realignment of the MRF access was not included in the original scope of the Project. The MRF access as proposed in the Draft EIR will likely create increased routine concentration of requests for service. The commenter further indicated that the proximity of the MRF to the proposed retail center causes increased concern for disaster or major incident management issues. The commenter stated that a single incident of this nature would exceed the capacity of the Diamond Springs – El Dorado Fire Protection District.

Originally, the Notice of Preparation for the Draft EIR described the relocation of the MRF, allowing the proposed retail center to be developed on a contiguous 44.76 acres, including the MRF parcel. However, strong opposition to the MRF relocation halted any further consideration of MRF relocation. Accordingly, the Project, as analyzed and publicly presented in the Draft EIR, was adjusted to allow the MRF to remain at its current location. Under the Draft EIR, access to the MRF was to be realigned to Lime Kiln Road. However, as discussed in the Master Response, an additional alternative, Alternative 5: Existing MRF Access, has been added to the EIR to consider the retention of MRF access from Throwita Way with expanded queuing and lane capacity. Analysis of the new alternative is presented in Section 4, Errata. Nonetheless, the commenter's concern regarding the proximity of the MRF to the proposed retail center remains valid.

Implementation of the Project would place a large retail center close to the MRF, which accepts, handles, and transports hazardous materials. However, activities involving hazardous materials at the MRF would be conducted in accordance with all applicable federal and state regulations, thereby reducing the potential for incidents requiring Fire District response.

As noted on page 4.10-16 of the Draft EIR, the Diamond Springs-El Dorado Fire Protection District indicated that developments similar to the Project result in approximately 98 calls for service each year, during which 50 percent of the District's emergency response resources are required for approximately 45 minutes. The Project applicant is seeking approval of the Planned Development Permit based on Alternative 5: Existing MRF Access. The Existing MRF Access Alternative would result in 39,100 fewer square feet than the Proposed Project as analyzed in the Draft EIR; therefore, expected level of calls for service would be expected to be proportionally reduced. Furthermore, implementation of Mitigation Measure PSU-1a and PSU-1b would ensure that water fire-flow requirements are met and require that the final site plans are reviewed by the El Dorado-Diamond Springs Fire District to ensure appropriate emergency access and building materials are implemented.

Response to DSEDFPD-2

The commenter stated that the Fire District Capital Improvement Plan has yet to be approved by the County Board of Supervisors; therefore, there is no means to secure funding to "increase service capacity" as required by General Plan Policy 5.1.2.1. The commenter also stated that, since the initial comment period on the Project, the Fire District underwent a staffing reduction of 33 percent, and that

all automatic aid providers in the County have experienced similar reductions. Accordingly, the district indicates a revision to their initial service requirement estimates, changing it from 98 calls for service each year, during which 50 percent of the District's emergency response resources are required for approximately 45 minutes, to 98 calls for service each year during which 100 percent of the District's resources are required for 45 minutes.

The commenter is likely referring to the revised Capital Improvement Plan and related development impact fees that require an impact fee of $1.22 per square foot and has yet to be approved by the Board of Supervisors and, therefore, cannot be applied to the Project. The existing Diamond Springs-El Dorado Fire Protection District Capital Improvement Plan, approved under Resolution No. 179-2007 of the Board of Supervisors allows the District to impose development fees. As noted in the resolution, the purpose of the fees is to finance public facilities and equipment to mitigate the impact of development on fire protection services within the District. Fees must be paid prior to the issuance of a building permit. Commercial structures are charged at a rate of $0.77 per square foot. The Proposed Project as analyzed in the Draft EIR includes a total of 280,515 square feet and, according to this square footage, would be required to pay the District a development fee of $215,996.55. However, the project applicant is seeking approval of the Planned Development Permit based on Alternative 5: Existing MRF Access, which would include a total of 241,415 square feet and, therefore, would be required to pay the District a development fee of $185,889.55. In either case, the Project would contribute its fair-share fees to the District, which would assist in needed service capacity increases directly related to the Project.

In addition, implementation of Mitigation Measures PSU-1a and PSU-1b would require the District to review both the Facility Report Plan and the Project's final site plans. The District would be able therefore to ensure that appropriate fire flow requirements are provided to the project site. Site plan revisions provided by the District would be required to be incorporated into the Project.

In summary, payment of development fees in coordination with the implementation of Mitigation Measures PSU-1a and PSU-1b would reduce the Project's impacts on District services to a level of less than significant. This conclusion is reflected in the Draft EIR.

---------- Forwarded message ----------
From: Corcoran, Daniel <dcorcoran@eid.org>
Date: Mon, Feb 6, 2012 at 4:53 PM
Subject: Diamond Dorado Retail Center EIR - EID comments
To: "rommel.pabalinas@edcgov.us" <rommel.pabalinas@edcgov.us>
Cc: "Mackay, Marc" <mmackay@eid.org>

Mel,****

EID has reviewed the draft EIR for the Diamond Dorado Retail Center and provides the following comments for your consideration.****

** **

Section 3.3.2 (pg 3-10 – 3-11): Please refer to the recently certified EIR for the Diamond Springs Parkway Project (DSP) for discussion of installation timing of EID water line infrastructure that would be installed concurrent with the various phases of the DSP. The draft EIR does not provide any description of timing of EID infrastructure that could affect the proposed project.**** 1

** **

Section 3.5.1 (pg 3-16): Please provide a more complete description of EID facilities that would be installed as part of the project so that EID can utilize the final EIR for any future approvals that may be required for the project. It is EID's understanding that a Facility Plan Report has not yet been prepared for the project, but the anticipated on and off site facilities should be described to the extent they are known at this time.*** * 2

** **

Section 3.5.2 (pg3-24): The existing line within SR-49 is not a trunk line and therefore should be referred to simply as a sewer line.**** 3

** **

Section 4.10.2 (pg4.10-4 – 4.10-8): The 2009 Water Resources and Service Reliability Report is not the most current information used to assess existing water supply available to serve the proposed project. A copy of the most current report (2011) can be located at the following link. Please use this report to used the section. http://www.eid.org/doc_lib/02_dist_info/2011_WaterResourcesReport-FINAL.pdf* *** 4

** **

Thank you for the opportunity to provide comment on the draft EIR. Please contact me if you have any questions regarding EID's comments.****

** **

Dan Corcoran
Environmental Division Manager

El Dorado Irrigation District
2890 Mosquito Road
Placerville, CA 95667
(530) 642-4082
(530) 622-6197 fax
dcorcoran@eid.org****

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Rommel (Mel) Pabalinas, Senior Planner
El Dorado County Development Services Department- Planning Division
2850 Fairlane Court
Placerville, CA 95667
Main Line 530-621-5355
Direct line 530-621-5363
Fax 530-642-0508

El Dorado Irrigation District (EID)

Response to EID-1

The commenter indicated that the Diamond Springs Parkway EIR (SCH# 2007122033) should be referred to for information regarding the installation timing of EID water line infrastructure that would be installed concurrent with the various phases of the Parkway. The commenter stated that the Draft EIR does not provide any description of timing of EID infrastructure that could affect the Project.

EID proposes, as part of the separately proposed Diamond Springs Parkway Project (i.e., project, as defined under CEQA), to install a new 18-inch waterline in Diamond Springs Parkway and upgrade existing 6-inch and 8-inch waterlines with a new 12-inch waterline in SR-49/Diamond Road from Pleasant Valley Road to Finch Road.

As noted on page 3-24 of the Draft EIR, water service for the Project would be provided via the construction of water line extensions connecting to existing water lines located in Truck Street, Throwita Way, Diamond Road (SR-49), and the MRF property. Because implementation of the Diamond Springs Parkway is required prior to the implementation of the Diamond Dorado Retail Center, EID facilities would be upgraded before the retail center would be constructed. However, capacity available to serve the Project, as analyzed in the Draft EIR, is based on currently existing infrastructure, and does not account for the EID upgrades that would occur as a result of the Diamond Springs Parkway Project. Nonetheless, the timing of the water infrastructure would not affect the physical impacts on the environment resulting from their implementation; therefore, the timing is not germane to the Draft EIR's analysis. This should not be construed to mean that this is not a legitimate concern; rather, it simply means that it is outside the scope of the environmental review process for the Project.

Response to EID-2

The commenter requested a more complete description of EID facilities that would be installed as a part of the Project so that EID can utilize the Final EIR for any future approvals that may be required for the Project. The commenter stated that anticipated on- and offsite facilities should be described to the extent they are known at this time.

As noted on page 4.10-18 of the Draft EIR, water services for the Project would be provided via a connection to an existing waterline located in either Throwita Way or Diamond Springs Parkway. Additional water connections may be established to waterlines in the SR-49 right-of-way and on the adjacent MRF property. The Project would require the extension of a sanitary sewer collection line from an existing sewer line located within the Diamond Road (SR-49) right-of-way south of the Lime Kiln Road intersection. An onsite sewer lift station and force main would direct wastewater from the project site to this connection. All connections would be coordinated with EID.

Exact alignments routes for connections to EID facilities were unavailable at the time this document was written. However, water sewer line extensions from Throwita Way or Diamond Springs Parkway would occur within the project site and therefore would be covered by the environmental impact analysis contained within the Draft EIR. Furthermore, any potential water or wastewater connection to existing EID facilities in the SR-49 right-of-way would be within the areas considered under the offsite roadway improvement analyses provided throughout the EIR. The project applicant will provide EID with updated water line extension plans as soon as they are available.

Response to EID-3

The commenter stated that the existing sewer line within the Diamond Road (SR-49) right-of-way was incorrectly referenced as a trunk line on page 3-24 of the Draft EIR. The error has been corrected in this Final EIR's Section 4, Errata.

Response to EID-4

The commenter stated that the 2009 Water Resources and Service Reliability Report referenced in Section 4.10, Public Services and Utilities of the Draft EIR is out of date, and the updated 2011 Water Resources and Service Reliability Report should instead be referenced.

Updates to EID's Water Resources and Service Reliability Report and Urban Water Management Plan have occurred since the completion of the Draft EIR. While changes have occurred in both documents, it is clear that ample water supplies will be available to serve the Project and other future projects in both the near term and future.

As noted on page 4.10-18, the Facility Improvement Letter indicated the Proposed Project, as analyzed in the Draft EIR, would be expected to generate an average water demand of approximately 44 equivalent dwelling units (EDUs) per year. Note that this estimate was based on the project configuration presented in the Draft EIR and does not reflect the updated site plan incorporating a reduction in square footage that would result in a comparable reduction in water demand. The updated 2011 Water Resources and Service Reliability Report indicated that one EDU equals approximately 0.54 acre-foot of water, whereas the 2009 Water Resources and Service Reliability Report indicated that one EDU equaled approximately 0.59 acre-foot of water. In addition, the 2011 Report indicates that 2,300 EDUs are available in the Western/Eastern Water Supply Region in which the Project is located whereas the 2009 Report indicated that there were 1,315 EDUs available. Therefore, while the acre-foot equivalent and EDU were reduced, the overall availability of EDUs was increased. Accordingly, sufficient water is available to serve the Project and conclusions made in the Draft EIR, regarding the EID's ability to serve the Project based on the 2009 Report still remain valid.

City of Placerville

3101 Center Street, Placerville, California 95667

February 6, 2012

Hand-delivered

Roger Trout, Director
El Dorado County Development Services Department
2850 Fairlane Court
Placerville, CA 95667

Re: *Diamond Dorado Retail Center – DEIR Review*

Dear Mr. Trout:

Thank you for providing the City the opportunity to comment regarding the Draft Environmental Impact Report for the Diamond Dorado Retail Center. The City respectfully submits the following comments on the DEIR for your consideration. Please do not construe the City's comments to imply opposition to the Diamond Dorado project, however the City believes that the environmental document should address the following comments and concerns:

Traffic

While the City acknowledges that the project proper has an insignificant impact on City intersections, the more appropriate table for analyzing the project is Table 4.11-11, which includes Existing Plus Approved Projects Plus Proposed Project Intersection Levels of Service in the 2015 timeframe. The City believes that this is the more appropriate litmus test to analyze traffic impacts for the project because, in all likelihood, the project will come online around that time or thereafter. In this regard, the City is concerned with the decline in the Level Of Service at the Sacramento Street/Pacific Street/SR 49 signalized intersection from LOS C to LOS D, and the inconvenience caused to the community by a near-doubling of traffic delay at that intersection. While the City agrees that LOS D is a generally acceptable Level Of Service, the traffic study falls short of its analysis in that *no* analysis is provided at two other key intersections in the vicinity—the unsignalized intersection of Cedar Ravine and Pacific Street, and the signalized intersection of Main Street/Pacific Street/SR 49. 1

Of particular concern is the impact on the roadway system at the signalized intersections of Sacramento Street/Pacific Street/SR 49 and the aforementioned Main Street/Pacific Street/SR 49. Absent the analysis of the latter of the intersections, one cannot judge the impact of the 2015 traffic condition whether or not it disrupts traffic flow. For example, in the short commercial corridor on SR 49 between the Main Street/Pacific Street intersection and the Sacramento Street/Pacific Street intersection, it may be that traffic

degradation does occur, and that mitigation may be warranted, such as an upgrade to a fully synchronized signalization system. 1 CONT

In light of the discussion above, the City respectfully requests that a response to the aforementioned matters be addressed.

General Plan Consistency

The DEIR references policies 10.1.5.5, 10.1.9.3 and 10.2.4.3 on pages 4.8-19 and 4.8-20 of the Economic Development Element of the 2004 El Dorado County General Plan. The City acknowledges that the above policies are used to bolster the statement on page 4.8-20 which reads,

> "By designing and zoning the site for commercial uses, and developing the DDRC, the County would be taking steps to achieve the economic growth outlined in the County's General Plan. The Economic Development Element of the General Plan indicates the County's intent to provide expanded shopping opportunities to the residents of El Dorado County while improving retail sales capture within the County and promoting job generating land uses."

However, the Economic Development Element contains a relevant objective and two additional policies appropriate for discussion that do not appear to be mentioned in the DEIR. The policies that the City refers to are found on pages 215 and 216 of the El Dorado County General Plan and state as follows: 2

> "Objective 10.2.7: Coordinate land uses with other jurisdictions. Resolve conflicts with other jurisdictions regarding the location of revenue-generating land uses."

> "Policy 10.2.7.1: Large commercial or industrial projects located in the County but affecting a nearby city should be planned in cooperation with that city so that potential negative impacts can be effectively mitigated."

> "Policy 10.2.7.2: Establish a joint County/City task force to develop complementary land use designations, zoning, transportation, and funding plans to protect existing and to encourage new commercial, industrial, and research and development projects in the Missouri Flat—Placerville Drive area."

In light of the above, it appears that the issue of General Plan Consistency should be further addressed in regard to the above objective and policies, and the City respectfully requests the same.

The City is concerned regarding the overall impact the project may have upon Placerville, and that these impacts may be significant and cumulatively considerable. The crux of the City's concern relates to other recently-constructed and pending commercial projects in the greater Placerville area, including the Missouri Flat Corridor, and the recently revived Crossing at El Dorado development project. The environmental document should at least include a 3

meaningful analysis with respect to the aforementioned projects in this regard, and potentially mitigation measures to address these impacts. 3 CONT

There is a concern that the magnitude of the existing and proposed commercial development could result in significant increase in commercial vacancy rates in Placerville, thereby causing a blighted physical impact upon the community, and the gradual erosion of City resources for the provision of necessary and essential services funded via sales tax. 4

Thank you for the early consultation on this matter and for providing the City the opportunity to comment. Please feel free to contact me if you wish to discuss this matter further.

Sincerely,

M. Cleve Morris
City Manager

SC:eli

City Hall 621-CITY (2489) — Administration 642-5200 — City Clerk/Personnel 642-5531 — I.T. 642-5508 — Police Department 642-5210
Community Development: Planning & Zoning 530-642-5252 / Building Department 642-5240 — Recreation and Parks 642-5232
Public Works/Engineering/Street & Utility Maintenance 642-5250 — Finance/Business Licensing 642-5223 — Utility Billing 642-5225
City website: cityofplacerville.org — City Code online: sterlingcodifiers.com/placerville,ca

City of Placerville (PLACERVILLE)

Response to PLACERVILLE-1

The commenter stated that Table 4.11-11, which includes Existing Plus Approved Projects Plus Proposed Project Intersection Levels Of Service in the 2015 timeframe is the appropriate table for analyzing the Project's traffic impacts. The commenter expressed concern regarding the decline in level of service (LOS) at the Sacramento Street/Pacific Street/SR-49 signalized intersection in the City of Placerville. The commenter indicated that the intersection would experience a LOS decline from LOS C to LOS D, and referred to this as a "near doubling" of delay. The commenter further stated that the traffic study should address impacts at other key intersections: Cedar Ravine/Pacific Street, and Main Street/Pacific Street/SR-49. The commenter expressed particular concern regarding the Project's traffic impacts on the SR-49 roadway segment between the Main Street/Pacific Street/SR-49 intersection and the Sacramento Street/Pacific Street/SR-49 intersection, indicating that mitigation such as a synchronized signalized system may be warranted.

Table 4.11-11 was used to determine the traffic impacts of the Project as proposed in the Draft EIR.

As presented in the Draft EIR, the delay at this intersection of Sacramento Street/Pacific Street/SR-49 only increases 2.0 seconds under 2015 Plus Project Conditions during the PM peak hours, not the "near doubling" of delay that the commenter cited. Furthermore, this intersection does not experience LOS degradation during either the AM or PM peak hours under any of the analysis scenarios. It is possible that the operational data was misinterpreted by the City.

It should be noted that during the traffic study review process, the City provided comments on the Project to KHA that were addressed in the final TIA. In addition, KHA received an email from the City indicating that the requested changes to the traffic study were made to the satisfaction of the City.

Concerning the intersections of Cedar Ravine/Pacific Street, and Main Street/Pacific Street/SR-49, the following are the reasons that these intersections were not included in the analysis:

- The County contracted with Dowling Associates, Inc. to prepare a Scope of Work for the Project, which included specification of the requirements of the traffic study. The intersections referenced above were not included on this list of required study facilities.
- El Dorado County's Traffic Impact Study Protocols & Procedures, June 2008, states the following:

  In accordance with the County's CEQA review requirements and consistent with General Plan Policies TC-Xa(5) and TC-Xb(C), DOT will review all proposed development projects to determine each proposed project's potential effects on transportation and circulation. To facilitate this review and to address General Plan Policies TC-Xa and TC-Xc, projects which worsen traffic conditions will be required to prepare a traffic impact study in accordance with these traffic impact study

protocols and procedures. General Plan Policy TC-Xe defines the term "worsen" on a given roadway facility as follows:

1. A two (2) percent increase in traffic during the a.m. peak hour, p.m. peak hour, or daily, or
2. The addition of 100 or more daily trips, or
3. The addition of 10 or more trips during the a.m. peak hour or the p.m. peak hour.

The most common threshold used by the County to determine study facilities is item 3 (the addition of 10 trips). As illustrated in Figure 7 – Near Term (2015) Proposed Project Trip Assignment of the Final Traffic Impact Analysis (included in Appendix L of the Draft EIR), the Proposed Project, as analyzed in the Draft EIR, generates three and nine project trips during the AM and PM peak hours, respectively, on both the east and west legs of intersection of Sacramento Street/PacificStreet/SR-49. Therefore, a maximum of nine project trips could be expected to reach the intersections of Main Street/Pacific Street/SR-49 and Pacific Street/Cedar Ravine Street. Since the number of project trips at these intersections is less than the 10 trips, these intersections do not require analysis, consistent with the County's protocols.

Finally, as presented in the Final Traffic Impact Analysis, the delay at the intersection of Sacramento Street/Pacific Street/SR-49 only increases 2.0 seconds under 2015 Plus Project conditions during the PM peak hours. Therefore, it can be assumed that if the intersections of Cedar Ravine/Pacific Street and Main Street/Pacific Street/SR-49 were studied, the increase in delay at these intersections would likely be less than 2.0 seconds. It can be concluded that the effect of adding Project traffic to these intersection will be nominal, since the intersection of Sacramento/Pacific/SR-49 will experience more Project traffic than the intersections of Cedar Ravine/Pacific Street and Main Street/Pacific Street/ SR-49.

Response to PLACERVILLE-2

The commenter stated that the Project's consistency with El Dorado County General Plan Objective 10.2.7, Policy 10.2.7.1, and Policy 10.2.7.2 should be addressed.

Objective 10.2.7 reads as follows:

> Coordinate land uses with other jurisdictions. Resolve conflicts with other jurisdictions regarding the location of revenue-generating land uses.

The County has coordinated with other jurisdictions regarding the Project through noticing in accordance with CEQA Guidelines, including a Notice of Preparation for the Draft EIR and a Notice of Availability for the Draft EIR. These notices as well as the Draft EIR were provided to other jurisdictions, including the City of Placerville. The City's comments (as well as any other jurisdiction's comments) on the Draft EIR are addressed herein.

Policy 10.2.7.1 reads as follows:

> Large commercial or industrial projects located in the County but affecting a nearby city should be planned in cooperation with that city so that potential negative impacts can be effectively mitigated.

The City of Placerville has identified potential negative traffic impacts resulting from the Proposed Project. These potential impacts are addressed in Response to PLACERVILLE-1 through Response to PLACERVILLE-4. As such, the County has coordinated with the City to ensure that potential negative impacts would not occur.

Policy 10.2.7.2 reads as follows:

> Establish a joint County/City task force to develop complementary land use designations, zoning, transportation, and funding plan to protect existing and to encourage new commercial, industrial, and research and development projects in the Missouri Flat – Placerville Drive area.

Policy 10.2.7.2 does not include any directive or regulation that the Project would be required to abide by, but is instead a directive aimed at the County and City of Placerville. While it is acknowledged that the Project would be a subject of interest to a joint County/City task force as referenced in Policy 10.2.7.2, the establishment of such a task force is not a function of the Project, nor would it result in physical environmental impacts related to the Project and, therefore, is not germane to the Draft EIR's analysis. This should not be construed to mean that this is not a legitimate policy to be considered by the County and the City of Placerville; rather, it means the establishment of a joint task force is outside the scope of the environmental review process.

Response to PLACERVILLE-3

The commenter expresses concern regarding the potential for cumulatively considerable impacts to occur as a result of the Project and other recently constructed and pending commercial projects in the greater Placerville area including the Crossings at El Dorado project.

Cumulatively considerable impacts related to the Project and other projects in the project area were considered in Section 6.3, Cumulative Impacts of the Draft EIR. Each topical resources section was discussed, and the potential for cumulative impacts to occur was determined. The cumulative impact analysis considered all projects listed in Table 6-1 and Table 6-2, including the Crossings at El Dorado project, and presented an analysis of potential cumulative impacts in accordance with CEQA Guidelines.

Refer to Response to CALTRANS.2-2 for a discussion regarding the cumulative effects of area projects on the Missouri Flat Road interchange and surrounding roadway network.

It should be noted that the Crossings at El Dorado project traffic study did not analyze intersections within the City of Placerville, since most project traffic is assumed to be focused on US-50 within the city limits. The effects of adding the Crossings at El Dorado project to the City's roadway network, outside US-50, are expected to be nominal.

Response to PLACERVILLE-4

The commenter indicated concern regarding the Project and other commercial projects resulting in an increase in commercial vacancy rates in Placerville resulting in physical blight and reduction of city resources to provide services funded via sales tax.

As stated in Section 15131 of the CEQA Guidelines, economic effects of a project are not ordinarily treated as significant environmental effects. However, if the economic effects result in physical changes to the environment, such as contributing to the physical deterioration of a blighted area, the EIR should discuss those physical changes. Blight is defined as physical deterioration that is so prevalent and substantial it impairs the proper utilization of affected real estate or the health, safety, and welfare of the surrounding community. Physical deterioration includes but is not limited to abnormally high business vacancies, abandoned buildings and commercial sites, boarded doors and windows, parked trucks and long term unauthorized use of properties and parking lots, extensive gang or offensive graffiti painted on buildings, dumping of refuse or overturned dumpsters on properties, dead trees or shrubbery, and uncontrolled weed growth or homeless encampments.

CEQA Guidelines Section 15131(b) establishes that a project's economic impacts on a community are considered significant only if they can be tied to direct physical impacts. In *Bakersfield Citizens for Local Control v. City of Bakersfield*, the Appellate Court generally described urban decay (also referred to as blight) as "land use decisions that cause a chain reaction of store closures and long-term vacancies, ultimately destroying existing neighborhoods and leaving decaying shells in their wake."

As noted in the Project objectives on page 3-11 of the Draft EIR, one of the objectives of the Project is to promote increased economic growth and development consistent with the El Dorado County General Plan and to generate additional sales tax and property tax revenues for El Dorado County.

The El Dorado County Industry-Focused Economic Development Study (2010) concluded that "El Dorado County has a sizable retail gap where potential retail demand exceeds retail sales by about 47 percent, indicating that wealth is leaking out of the local economy across nearly every standard retail category." Based on this conclusion, there is adequate economic activity to support the Project in addition to existing and other proposed retail operations in El Dorado County, and urban decay, as defined above, would not be expected to occur.

Fountain Tallman Museum

EL DORADO COUNTY HISTORICAL SOCIETY
524 Main Street
Placerville, CA 95667

January 25, 2012

Roger Trout Director
Development Services Department
2850 Fairlane Court
Placerville, CA 95667

Re: DEIR for the Diamond Dorado Retail Center

Dear Mr. Trout,

The mission of the El Dorado County Historical Society is to encourage the preservation of the county's cultural resources and bring this significant history to the attention of the public. Doug Walker, a member of the Society's Board of Directors, reviewed the Draft EIR for the Diamond Dorado Retail Center. The Diamond Lime processing plant was a significant operation in this part of the county. It was served by an overhead tramway from the lime mine on Cedar Ravine, a rather unique engineering feature along with the plant itself. The spilled limestone from the tramway is still visible across open fields on Google Earth. Very little lime mining history has been preserved, so we ask that signage viewable by the public describing this history be part of the mitigation for this project. 1

The base of the modern kiln was located just west of the intersection of Bradley Drive and Throwitta Way. It was buried in an "un-engineered fill during the construction of the MRF and still may be intact. If so, it could be exposed during reprocessing of the fill. During construction, the contractor had difficulty in stabilizing the road beds due to the limestone ash slurry material that underlies a portion of the project. 2

We also want to note that the Diamond and Caldor Railroad skirted the south boundary of the proposed development, as shown on the USGS 1949 Placerville 7.5' Quad map. This was not included in the Cultural Resources Report. However, it does appear that the Retail Center will have no impact on the old rail bed. In addition, this region was an active Native American site, although any prehistoric sites within the proposed grading would have undoubtedly been wiped out by the previous industrialization of the site. However, we ask that this be considered as the project moves forward. Thank you for the opportunity to comment on this Draft EIR. 3

Sincerely,
Joyce Thompson
Joyce Thompson
Vice President

Our mission is to honor the people who came before us by rescuing, preserving, researching and displaying the county's rich history to ensure that its significance will be appreciated for generations to come.

Private Organizations

El Dorado County Historical Society (EDCHS)

Response to EDCHS-1

The commenter stated that the Diamond Lime processing plant was located in the vicinity of the proposed DDRC and was served by a unique overhead tramway that transported lime from a mine located in Cedar Ravine. The commenter requested that signage viewable by the public describing lime-mining history be incorporated as mitigation for the Project.

The historical use of the portions of the project site by the Diamond Springs Lime Plant was considered in Section 4.4, Cultural Resources, of the Draft EIR. As noted, there is no remaining evidence of structures related to the Diamond Springs Lime Plant within the project site. Some small pieces of brick, stone, glass fragments, and one nail were scattered across the top of the hill and are considered the only evidence possibly related to the former Lime Plant. In random areas, patches of dirt were scraped away to determine if there were subsurface remains from the Lime Plant. None of the scrapings resulted in the discovery of subsurface remains. It appears that after the buildings were demolished, equipment was used to grade the area where the Lime Plant stood, thus removing any remnants except very fragmented pieces of glass and brick. Onsite surveys verified that no prehistoric or historic resources were observed within the project site. As a result, implementation of the Project would result in no impacts to known historical resources.

However, the possibility exists that subsurface construction activities may encounter undiscovered historic resources. This is a potentially significant impact. Mitigation Measure CUL-1 is proposed to reduce this potentially significant impact to a level of less than significant.

The provision of public signage describing the local lime-mining history is being considered by the project applicant.

Response to EDCHS-2

The commenter stated that the base of the lime kiln previously operated in the vicinity of the project site was located just west of the intersection of Bradley Drive and Throwita Way. According to the commenter, the lime kiln was buried in "un-engineered" fill during the construction of the Material Recovery Facility and could be exposed during "reprocessing of the fill." The commenter also stated that during construction of the Material Recovery Facility, stabilizing road beds was difficult because of the limestone ash slurry material that underlies a portion of the project site.

The project site does not include the area west of the Bradley Drive and Throwita Way. However, the Draft EIR did indicate that the existing project site contains non-engineered fills, fill stockpiles, and lime sludge materials that are relatively loose and are not considered suitable for support of the Project in their current condition. A Geotechnical Engineering Study was prepared for the project site and included as Appendix G of the Draft EIR. The Geotechnical Engineering Study contains specific construction recommendations to reduce Project impacts associated with settlement potential to a less

than significant level. Furthermore, Mitigation Measure GEO-6b would require all grading plans for the Project to conform to the recommendations included in the Geotechnical Engineering Study. The mitigation measures also requires that design, grading, and construction shall be performed in accordance with the requirements of the California Building Code applicable at the time of grading and appropriate local grading regulations. Implementation of this mitigation would ensure that the Project would not be affected by unstable soils, or any undocumented or "un-engineered" fill located within the project site.

Response to EDCHS-3

The commenter stated that the Diamond and Caldor Railroad skirted the south boundary of the project site, but that it does not appear that the DDRC would have an impact on the old rail bed. The commenter also stated that the Project's region was an active Native American site, although any prehistoric sites within the project site would have undoubtedly been disturbed by the previous industrial uses of the site.

Mitigation Measure CUL-1 would ensure that any potentially significant cultural resource, including those related to former railroads or Native Americans encountered during subsurface earthwork activities for the Project, would be properly protected. Refer to Section 4.4, Cultural Resources of the Draft EIR.

WASTE CONNECTIONS INC.
Connect with the Future®

January 26, 2012

El Dorado County Development Services Department – Planning Services
Attn: Mel Pabalinas
2850 Fairlane Court
Placerville, CA 95667

Subject: Comments on Draft Environmental Impact Report, Diamond Dorado Retail Center (SCH No. 2008012004)

Dear Mr. Pabalinas:

Waste Connections Inc. (WCI) has completed a review of the Draft Environmental Impact Report (DEIR), dated December 23, 2011, for the Diamond Dorado Retail Center. The DEIR was prepared by Michael Brandman Associates for the El Dorado County, Development Services Department – Planning Services. Our comments are provided below.

Exhibit 3-7 Grading and Drainage Plan

Comment #1: The Plan shows an emergency entrance/exit. The location shown is not workable given that it goes right through a working area of the MRF facility. 1

Comment #2: The Plan shows proposed fill soils consuming MRF property on the northside of the MRF facility. A retailing wall will need to be provided instead. 2

Comment #3: An assumption is being made that the proposed reconfigured entrance to the MRF is workable. This may not be the case and may result in a fatal flaw. The project should be conditioned such that the reconfiguration is to the satisfaction of Waste Connections. Turning radii shown are insufficient for facility traffic and parking stalls are likely to be removed and require replacement. 3

Comment #4: The proposed project does not acknowledge and address the fact that stormwater from the MRF site is directed to a stormwater pond located in the northeast corner of the MRF property and that discharge from this pond flows off the MRF property to the north following historical drainage. 4

January 26, 2012
Mel Pabalinas
Subject: Comments on Draft Environmental Impact Report, Diamond Dorado Retail Center (SCH No. 2008012004)

Comment #5: With respect to the Lime Kiln Rd and Hwy 49 intersection, the proposed project provides for intersection signalization. This intersection needs to: (1) allow our vehicles to turn north and south on Hwy 49, and (2) provide a left hand turn lane for north bound Hwy 49 traffic wanting to turn left onto Lime Kiln. 5

Comment #6: With respect to the Lime Kiln Rd and proposed MRF entrance intersection, a 3 way stop needs to be provided. 6

Exhibit 4.1-1 Views of the Project Site

Comment #7: Photo #4 - View of proposed MRF access from Lime Kiln Road shows the gate at the entrance to old Lime Plant Road. It is our understanding that the project is not proposing old Lime Plant Road to be the new entrance to the MRF. Clarification needs to be provided. 7

If you have any questions, please contact me at (916) 608-8209.

Sincerely,

Thomas C. Reilly
CA Engineer Manager / Corporate Compliance Manager
Waste Connections, Inc.

Waste Connections, Inc. (WCI)

Response to WCI-1

The commenter stated that the emergency entrance/exit shown on Exhibit 3-7 of the Draft EIR is not viable, as it would require the permanent conversion of a working area of the MRF facility.

As discussed in the Master Response, the Project applicant is seeking approval of the Planned Development Permit as proposed in Alternative 5: Existing MRF Access. The Existing MRF Access Alternative does not include the emergency entrance/exit as shown on Exhibit 3-7. The Existing MRF Access Alternative's site plan can be found in Exhibit 5-1, included in Section 4, Errata.

Response to WCI-2

The commenter stated that the Project includes fill soils consuming MRF property on the north side of the MRF facility and requested that a retaining wall be provided instead.

The implementation of fill soils or a retaining wall along the MRF facility's northern boundary will be coordinated with WCI.

Response to WCI-3

The commenter stated that the proposed reconfiguration of the MRF entrance off Lime Kiln Road is not viable and requested that the Project be conditioned such that the reconfiguration be implemented to the satisfaction of Waste Connections. The commenter also indicated that turning radii shown on the project plan are insufficient for MRF traffic and existing parking stalls would likely need to be relocated as a result of the access realignment.

As discussed in the Master Response, the Project applicant is seeking approval of the Planned Development Permit as proposed in Alternative 5: Existing MRF Access, thereby eliminating turning radii issues and the need to remove or replace parking stalls. The Existing MRF Access Alternative's site plan can be found in Exhibit 5-1, included in Section 4, Errata.

Response to WCI-4

The commenter stated that it should be noted that stormwater from the MRF is directed to a stormwater pond located on the northeast corner of the MRF property that discharges to the drainage located along the western boundary of the project site.

As noted in the analysis of the Existing MRF Access Alternative contained in Section 4, Errata, should it be required that the MRF's stormwater pond be modified, such modifications would be implemented so that the existing capacity and outfall would be maintained at current levels.

Response to WCI-5

The commenter stated that the proposed signal at the intersection of Lime Kiln Road and Diamond Road (SR-49) would need to allow MRF vehicles to turn north and south on Diamond Road (SR-49)

and provide a left-turn lane for north bound Diamond Road (SR-49) traffic waiting to turn left onto Lime Kiln Road.

The intersection of Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road is currently a two-way stop controlled intersection, with stop signs located on the Lime Kin Road and Black Rice Road approaches. Implementation of the separately proposed and approved Diamond Springs Parkway includes modifications to this intersection that would result in the restriction of left turns from Diamond Road (SR-49). In addition, a barrier improvement would be included at the intersection of Lime Kiln/Black Rice to prevent the left turn and through movements from the local roads.

The Diamond Dorado Retail Center would be constructed after the completion of the Diamond Springs Parkway and the previously mentioned restricted-access changes to the Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road intersection. Implementation of the Proposed Project as analyzed in the Draft EIR would realign the MRF access point from Throwita Way to Lime Kiln Road. Accordingly, the Proposed Project included removal of access restrictions and construction of a traffic signal at the Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road intersection to allow for full turning movements.

Furthermore, under Cumulative (2025) Plus Project conditions, the Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road intersection would operate at LOS F in the PM peak hour. As a result, Mitigation Measure TRANS-3c required the addition of a northbound through lane and a southbound through lane.

While Mitigation Measure TRANS-3c reduced impacts resulting from the Proposed Project to a less than significant level, MRF traffic on Lime Kiln Road remains a concern as noted by the commenter. As such, the Project applicant seeks approval of the Planned Development Permit as proposed in Alternative 5: Existing MRF Access, which maintains the MRF's access point at Throwita Way and would not require the redirection of MRF traffic to Lime Kiln Road. Implementation of Alternative 5 would eliminate the need for MRF traffic to make left turns at the Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road intersection and, therefore, would eliminate the need for removal of access restrictions and construction of a traffic signal at the intersection as well as the need for Mitigation Measure TRANS-3c. Alternative 5 has been fully analyzed in Section 4, Errata of this Final EIR.

Response to WCI-6

The commenter stated that a three-way stop should be provided at the intersection of the MRF entrance on Lime Kiln Road.

As discussed in the Master Response, the Project applicant seeks approval of the Planned Development Permit as proposed in Alternative 5: Existing MRF Access, which maintains the MRF's existing access point at Throwita Way. As such, the commenter's concerns regarding the intersection of the MRF access and Lime Kiln Road are no longer an issue.

Response to WCI-7

The commenter stated that the caption for Photograph 4 on Exhibit 4.1.1 of the Draft EIR mistakenly identifies the gate at the entrance to old Lime Plant Road as the proposed entrance to the MRF from Lime Kiln Road and requested clarification.

As discussed in the Master Response, the Project applicant seeks approval of the Planned Development Permit as proposed in Alternative 5: Existing MRF Access, which maintains the MRF's existing access point at Throwita Way. As such, the commenter's concerns regarding the location of the proposed MRF access off Lime Kiln Road is no longer an issue.

February 3, 2012

TO: El Dorado County Development Services Department

Planning Services

RE: Diamond Dorado Retail Center DEIR response

Attn: Mel Pabalinas rommel.pabalinas@edcgov.us

Dear Mr Pabalinas;

We wish to notify El Dorado County Planning Department that there has been a very serious oversight regarding connecting existing sewer lines to the Diamond Springs Main line adjoining this proposed project.

We request a petition of E.I.D., the provider of sewer for this project, to expand their study area. This public agency needs to prepare Capital Improvement Plans to address major infrastructure improvements to include tying together this sewer line. It is a very short distance, see map. Over 30 years ago sewer lines and T's to parcels were installed to adjoining parcels North and West of this project in Bradley and Throwita Way Streets, see attached map.

Because Diamond Dorado Retail EIR shows, see inserts below from DEIR, this project and the entire hilltop area N. & W., including all Truck street **drains into "Jurisdictional Water's", Weber Creek.** The developer of Bradley, Truck and Throwita Way Streets, 20+ parcels, was required by the county to install the sewer lines. However 30+ years later, today, those lines are still dead end lines and E.I.D. has never connected them to the D.S. Main line, see attached map. 1

The volume of people traffic into Waste Connections/Material Recycling Facility APN 051-250-47 & mini storage's, propane business's, construction material yard, garbage company, RV/boat storage, body shop etc on these streets are ALL ON/USING SEPTIC TANKS! One parcel business said, they tell people the toilet is out of order because the lines don't leach and back up. Another business said they can't hardly get liquid waste to disappear, another has to have the tanks pumped several times a year. Who knows what Waste Connections is doing with the amt of people needing a bathroom. Please have E.I.D. connect this whole area's installed sewer lines to their main sewer system.

The biggest over sight was last years County project E.I.R study for the Diamond Springs Parkway. The study area did not include all the parcels that will be affected by this Parkway, see attached map. Which this Diamond Dorado Retail project has already dedicated the road easements necessary for the Parkway. If you will look at the Parkway EIR and engineered plans, ONLY WATER lines will be increased in size and installed from Bradley South on Hwy 49 during construction-NO SEWER LINES MENTIONED TO TIE BRADLEY DEAD END INDUSTRIAL PARK SEWER LINES TO E.I.D's Diamond Springs SEWER MAIN AT DIAMOND DORADO RETAIL CENTER PROJECT S TIE IN! 2

It is not good planning for the county to design and build and beautiful new Parkway to be torn up later to tie the Bradley/Throwita Way/ Truck Street dead end sewer lines South on 49 across a major new intersection to where E.I.D. is stopping at the retail center project. That is waste and irritation to the public to not get it all done at same time.

Why would this country not petition E.I.D. to install the connection from Bradley and Throwita Way dead end lines to E.I.D's main sewer line being brought up to the Diamond Dorado Retail project on Hwy 49. The Throwita Way S. end of now installed sewer line, at the dump, could cross this projects road donation to the main the retail center is hooking on. Then when the Parkway is under construction E.I.D. should connect Bradley St dead end sewer line South on 49 to this projects connection to main line. It was shocking to see in the Parkway's E.I.R. only included water line improvements. 3

CRITICAL: 5.3.1.1. OF THE GENERAL PLAN STIPULATES: "In the Diamond Springs/El Eldorado Region Plan, Commercial & Industrial projects shall be required to connect to the sewer"!

This G.P. stipulation now burdens all these centrally located prime area's properties to not have to potential for a higher and better use without the sewer main connected to our existing lines. When demand returns and the county builds the D.S. Parkway all this Industrial area could have more profitable uses for the county tax base looking 20 years out. That's why this DEIR project is on your table. 4

If this Diamond Dorado Retail Center and the D.S. Parkway are developed, it only makes good planning to furnish sewer when the General Plan stipulates that it is a must for any other uses.

Because of the watershed all to Weber Creek, septic tanks with leach lines on all these developed parcels need public sewer.

See inserts from DEIR below, all these studies & reports are for the parcel South of above referred to parcels so runs through all the septic/leach field parcels to the referred to Weber Creek. Also 2 maps attached. 5

Thank You

Regards

Martin and Diane Murillo

Owners of North parcel adjoining the nice proposed Retail Center project.

dianeandmartin8@gmail.com

"Diamond Dorado Retail Center Project

Delineation of Jurisdictional Waters and Wetlands – April 15, 2008 Summary Michael Brandman Associates 3

C:\Documents and Settings\MBA\My Documents\3 El Dorado County Projects\3337.0001.0 Diamond Dorado Retail Center\wetlands\3337.0001_JD_DraftFinal2_EL.doc

The delineation of waters of the U.S. identified four (4) features that are U.S. Army Corps of Engineers (USACE) jurisdictional. These include two (2) ephemeral drainages, one (1) riparian wetland, and one (1) seasonal wetland. These features together exhibit a "significant nexus" to Weber Creek, a Traditionally Navigable Water (TNW). As such, these features are subject to regulation by the USACE. Total acreage of USACE jurisdictional features is 0.400 acres (1,444 linear feet)". 6

“3.4.2 - Watershed Description

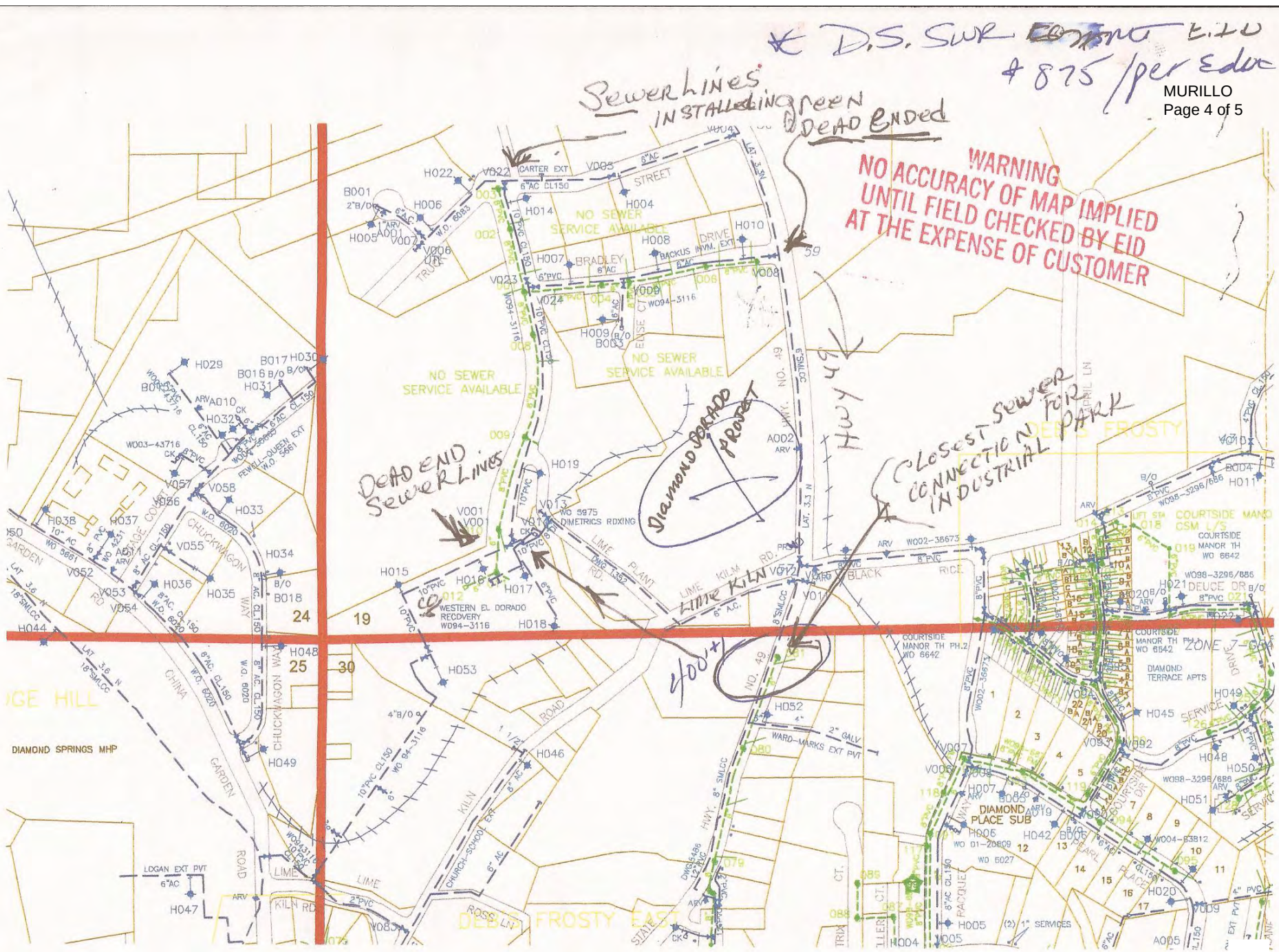
The Project Site is located within the west-central portion of the +7,950-acre Ringold Creek watershed-planning unit (Calwater ID 5144.310203), which is part of the larger Weber Creek Sub-Hydrologic Area (Calwater, 2004). Weber Creek is the principle drainage feature within the Project vicinity. Weber Creek flows west-northwest appropriately 12 miles prior to discharging into the South Fork of the American River Watershed (Hydrologic Unit 18020129). Weber Creek is a combination of step-pool and cascade alluvial-channel morphologies (Montgomery and Buffington 1998) and drains a total watershed area of approximately 97 square miles’

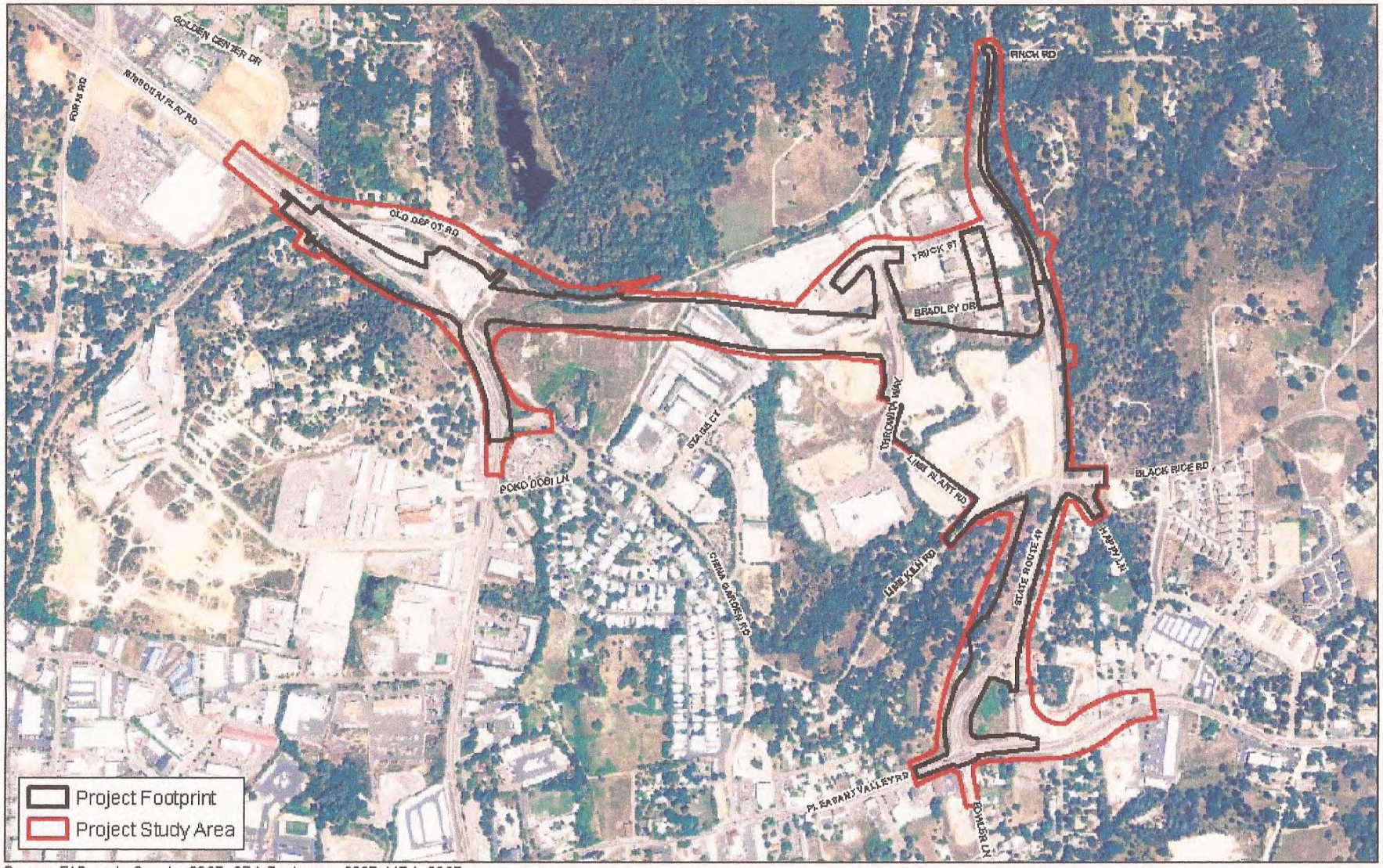
3.4.3 - Drainage Pattern

Drainage patterns within the Project vicinity have been altered completely by historical industrial mining activity and by adjacent development (Exhibit 3). Storm water runoff from the western portion of the Project site ultimately enters an ephemeral drainage at the western boundary (ED1). ED1 is depicted as a dashed blue line on the USGS *Placerville, CA* 7.5-minute topographic quadrangle and ultimately discharges into Weber Creek. The drainage feature appears to receive and convey runoff from a majority of the Project Site, and from properties adjacent to the west. The drainage feature continues to the north of the Project Site where it is diverted to the east for approximately 50 feet before entering a 36-inch culvert where flows are conveyed back to the north, underneath existing railroad tracks (no longer in use), and outfalls into a low-gradient meadow.

6
CONT

This is only a few reasons for E.I.D. to be petitioned to connect their main sewer lines in the future North to all the Industrial Parks lines already in.


* D.S. SWR EXT E.I.D
+875/per Edu
Sewer Lines INSTALLED in Green
Dead Ended
WARNING
NO ACCURACY OF MAP IMPLIED
UNTIL FIELD CHECKED BY EID
AT THE EXPENSE OF CUSTOMER
NO SEWER SERVICE AVAILABLE
DEAD END SEWER LINES
DIAMOND SPRINGS MHP
DIAMOND PLACE SUB
DIAMOND TERRACE APTS
COURTSIDE MANOR TH
DEBS FROSTY
DEBS FROSTY EAST
CHUCKWAGON WAY
CHINA GARDEN ROAD
LIME KILN RD.
HWY. 49
CLOSEST SEWER CONNECTION FOR INDUSTRIAL PARK
400'+
DIAMOND SPRINGS PROJECT
24
19
25
30



Source: El Dorado County, 2007; CTA Engineers, 2007; MBA, 2007

NORTH

800 400 0 800

Feet

Michael Brandman Associates

11730025 • 11/2009 | 3-2_project_aerial.mxd

Diamond Springs Parkway

Exhibit 3-2

Project Study Area - Aerial Overview

COUNTY OF EL DORADO DEPARTMENT OF TRANSPORTATION
TRAFFIC INFORMATION REISSUANCE FOR THE DIAMOND SPRINGS PARKWAY PROJECT
ENVIRONMENTAL IMPACT REPORT

Individuals

Martin and Diane Murillo (MURILLO)

Response to MURILLO-1

The commenter requested that the El Dorado Irrigation District (EID) prepare a Capital Improvement Plan that would include connection of existing dry sewer lines located in Bradley Drive and Throwita Way to the operating EID sewer line located in the Diamond Road (SR-49) right-of-way. The commenter states that existing businesses located in the vicinity of the DDRC are currently utilizing septic systems for wastewater disposal.

As noted in Section 4.10, Public Services and Utilities of the Draft EIR, the Project would be served by wastewater collection services provided by EID. As a part of the Project, a sewer line would be constructed and would connect to an existing, EID, 6-inch gravity sewer line located in the Diamond Road (SR-49) right-of-way, approximately 400 feet southeast of the project site.

Section 15121(a) of the CEQA Guidelines state that an EIR is an informational document that serves to inform decisions makers and the general public of the significant environmental effects of a proposed project and potential mitigation for significant environmental effects. Section 15064(d) of the CEQA Guidelines states that in evaluating the significance of an environmental effect of a project, the Lead Agency (in this case, El Dorado County) shall consider direct and reasonably foreseeable indirect physical changes in the environment which may be caused by the Project. The existing lack of public sewer service to properties outside the DDRC project site is not a direct or indirect physical change in the environment related to or resulting from Project implementation; is not a significant environmental effect of the Project; and, therefore, does not require mitigation. While the installation of sewer lines may be considered by EID in coordination with the implementation of the Project, requiring EID to prepare a Capital Improvement Plan or extend sewer services north of the DDRC is beyond the purview of this EIR.

Response to MURILLO-2

The commenter states that the previously prepared Diamond Springs Parkway Project EIR (SCH# 2007122033) did not consider all parcels affected by the Parkway. The commenter states that the Diamond Springs Parkway Project EIR did not consider the construction of sewer lines in the Parkway or Diamond Road (SR-49) rights-of-way. The commenter indicated that constructing sewer lines after the completion of the Parkway would be wasteful.

The Project considered in this EIR consists of the Diamond Dorado Retail Center and related infrastructure. Comments regarding the Diamond Springs Parkway Project were accepted during the public review period of the Diamond Springs Parkway Project EIR (SCH# 2007122033). As such, comments regarding the Diamond Springs Parkway Project are beyond the purview of this EIR.

Response to MURILLO-3

The commenter indicates that El Dorado County should petition EID to connect existing dry sewer lines in Bradley Drive and Throwita Way to the sewer line located in Diamond Road (SR-49) and to construct sewer lines in the DSP right-of-way.

Refer to Response to MURILLO-2 and MURILLO-3.

Response to MURILLO-4

The commenter states that General Plan Policy 5.3.1.1 requires that commercial and industrial project shall be required to connect to public wastewater collection facilities. The DDRC would be connected to EID's public wastewater collection facilities.

The commenter also states that properties near the DDRC that are not served by public wastewater collection facilities may not be fully developed as a result of lack of wastewater service. The development of lands outside the DDRC project site is not a part of the Project; therefore, the assessment of lack of sewer services is beyond the purview of this EIR.

Response to MURILLO-5

The commenter states that sewer services should be provided the Bradley Drive/Throwita Way area if the DDRC and DSP are developed. The commenter indicated that the existing watershed drains to Weber Creek and, therefore, the septic tanks with leach lines should be replaced by public sewer facilities. The commenter made reference to an attached EID service map for the project area and excerpts from the Draft EIR.

The status of wastewater service outside the project site is not under the purview of this EIR. Refer to MURILLO-2 and MURILLO-3.

Response to MURILLO-6

The commenter quoted text from the Draft EIR regarding jurisdictional waters and wetlands, watershed description, and drainage pattern, and indicated that the quoted text supported the installation of sewer lines to the north of the DDRC . No further comments were made regarding the content of the quoted text. No response is necessary.

---------- Forwarded message ----------
From: Lee Dobbs <LDobbs@kampspropane.com>
Date: Mon, Feb 6, 2012 at 5:01 PM
Subject: FW: Diamond Dorado Retail Center Project DEIR response
To: "rommel.pabalinas@edcgov.us" <rommel.pabalinas@edcgov.us>, "
roger.trout@edcgov.us" <roger.trout@edcgov.us>
Cc: "dianeandmartin8@gmail.com" <dianeandmartin8@gmail.com>, barry brewer <
bdbrew@yahoo.com>

To Whom it may concern:****

It only makes sense to make this sewer connection at this time rather than wait until the Diamond Dorado shopping center and the Missouri Flat Parkway are completed. Then create additional expense on rate/tax payers****

Lee Dobbs****

** **

From: Diane [mailto:dianeandmartin8@gmail.com]
Sent: Monday, February 06, 2012 1:36 PM
To: rommel.pabalinas@edcgov.us; roger.trout@edcgov.us
Cc: Lee Dobbs; dianeandmartin8@gmail.com; dawson8484@sbcglobal.net
Subject: Diamond Dorado Retail Center Project DEIR response
Importance: High****

** **

Mr. Mel Pabalinas;****

****

Please accept this response to the Draft Environmental Impact Report for the Diamond Dorado Retail Center****

(SCH No. 2008012004). ****

****

Let me know if my attachments do not come through correctly:****

3 page written response Word document****

2-pdf attachements of sewer line map and Parkway study area map.****

****

Thank you****

Diane Murillo****

1

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Rommel (Mel) Pabalinas, Senior Planner
El Dorado County Development Services Department- Planning Division
2850 Fairlane Court
Placerville, CA 95667
Main Line 530-621-5355
Direct line 530-621-5363
Fax 530-642-0508

Lee Dobbs (DOBBS)

Response to DOBBS-1

The commenter stated that sewer connections should be made prior to the completion of the DDRC and DSP. The commenter forwarded the comment letter and attachments originally submitted by Martin and Diane Murillo (MURILLO). Refer to Response to Comment MURILLO-1 through MURILLO-6.

SECTION 4: ERRATA

The following are revisions to the Draft EIR. Each revision is listed by section and page number as it appeared in the Draft EIR. All additions to the text are underlined (underlined) and all deletions from the text are stricken (~~stricken~~). In some cases, revisions are minor modifications that rectify typos or grammatical errors. In other cases, the revisions are more extensive and include new text and changes to existing text. However, as explained in the paragraphs preceding revisions herein, the larger revisions serve the purpose of clarification of the Draft EIR's text and do not negatively change the significance of any of the environmental issue conclusions within the Draft EIR. For example, several mitigation measures have been revised or re-written. However, in each case, the intent and requirements of the original mitigation measure is maintained and implementation of the revised mitigation measure would continue to ensure impacts are reduced to less than significant as concluded in the Draft EIR. The revisions act to clarify and amplify the requirements of the mitigation measure and the conditions under which it must occur.

Consistent with CEQA Guidelines Section 15088.5, and as discussed in Section 1, Introduction, none of the revisions herein constitutes significant new information and, therefore, recirculation of the Draft EIR is not required. As required by CEQA Guidelines Section 15088.5, revisions herein do not result in new significant environmental impacts or the increase in the severity of an environmental impact, and all revisions to mitigation measures and alternatives will be adopted by the Project applicant as conditioned by El Dorado County.

SECTION 1: INTRODUCTION

Page 1-8, Seventh Bullet

The paragraph of the seventh bullet on page 1-8 has been revised to reflect the addition of the Existing MRF Access Alternative.

- **Section 5: Alternatives to the Proposed Project.** This section compares the impacts of the Proposed Project with five ~~four~~ land-use project alternatives: the No Project Alternative, the Industrial Alternative, the Reduced Density Alternative, ~~and~~ the Mixed-Use Center Alternative, and the Existing MRF Access Alternative. An environmentally superior alternative is identified. In addition, alternatives initially considered but rejected from further consideration are discussed.

SECTION 2: EXECUTIVE SUMMARY

Page 2-4, Heading 2.4, Summary of Project Alternatives

The following paragraph was added to the list under heading 2.4, Summary of Project Alternatives, to reflect the addition of the Existing MRF Access Alternative.

2.4.5 Existing MRF Access Alternative

The project site would be developed with 241,415 square feet of retail space to accommodate the retention of the existing MRF access on Throwita Way. Throwita Way would be slightly realigned and widened to four lanes. The existing MRF scale and scale house would be maintained, and additional MRF-entry queuing space would be provided via the widening of adjacent portions of Throwita Way. The DDRC would be developed in two distinct portions: the eastern portion, containing a single building of 160,572 square feet, and the western portion, containing seven building pads ranging in area from 3,300 square feet to 38,843 square feet.

Page 2-13, Queuing (Impact TRANS-5)

As a result of revisions to Mitigation Measure TRANS-3a, the significant unavoidable impact at the southbound left-turn lane from the Missouri Flat Road/Eastbound US 50 Ramp intersection would no longer occur. Accordingly, identification of this impact has been deleted.

- ~~Queuing (Impact TRANS-5). The Proposed Project would result in unacceptable queuing at the Missouri Flat Road/Eastbound US-50 ramp and Missouri Flat Road/Westbound US-50 ramp intersections. Mitigation is proposed; however, minor queuing issues would remain at the southbound left turn lane from the Missouri Flat Road/Eastbound US 50 Ramp intersection. No acceptable mitigation is available to resolve the remaining queuing issue. Therefore, the residual significance would be significant and unavoidable.~~

Page 2-19, Table 2-1

Mitigation Measure BIO-2c has been revised to better characterize the need for appropriate setbacks consistent with the USACE and CDFG. These changes clarify the mitigation measure and do not represent significant new information. Accordingly, recirculation is not required.

MM BIO-2c All grading plans shall include ~~adequate~~ setbacks in accordance with USACE and CDFG requirements for preserved seasonal and perennial drainages. Measures to minimize erosion and runoff into seasonal and perennial drainages that are preserved shall also be included in all grading plans. Appropriate runoff controls such as berms, storm gates, detention basins, overflow collection areas, filtration systems, and sediment traps shall be

implemented to control siltation and the potential discharge of pollutants into preserved drainages.

Page 2-19, Table 2-1

As discussed in Section 4, Response to Comments, litigation involving the County's Oak Woodland Management Plan, has eliminated the use of Option B (Conservation Fund In-Lieu Fee) as a viable option for oak woodland mitigation. As such, the mitigation measure for onsite impacts has been revised to remove Option B. This change does not alter any of the environmental impact conclusions contained in the Draft EIR and maintains the intent of the mitigation measure. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM BIO-3a Prior to the approval of the Final Development Plan, ~~issuance of grading permits,~~ the applicant shall provide a final grading plan to El Dorado County. The final grading plan shall indicate the size and location of all onsite oak trees and will indicate which trees are to be removed or retained as a part of the ~~Proposed~~ Project. Approval of the Final Development Plan and issuance of grading permits shall not occur unless the County has adopted an offsite oak tree mitigation program that fully complies with General Plan Policies 7.4.4.4 and 7.4.2.8 and the applicant has submitted a project-specific oak tree mitigation plan which the County finds fully compliant with the adopted offsite oak tree mitigation program. Should the County fail to adopt an offsite oak tree mitigation program, the project must be redesigned to allow for onsite retention. This redesign shall be subject to subsequent environmental review.

~~The applicant shall comply with the Oak Woodland Management Plan (OWMP) by mitigating for oak woodland canopy removed in accordance with either Option A (On-Site Mitigation, Replanting and Replacement), Option B (Conservation Fund In-Lieu Fee), or a combination of both options. As outlined in the OWMP, a 1:1 mitigation ratio shall be applied to the oak canopy removed that falls below the threshold in Table 1 of the El Dorado County General Plan Policy 7.4.4.4, while a 2:1 mitigation ratio shall be applied to the remaining oak canopy removed.~~

Page 2-32, Table 2-1

As discussed in Section 4, Response to Comments, litigation involving the County's Oak Woodland Management Plan, has eliminated the use of Option B (Conservation Fund In-Lieu Fee) as a viable option for oak woodland mitigation. As such, the mitigation measure for onsite impacts has been revised to remove Option B. This change does not alter any of the environmental impact conclusions

contained in the Draft EIR and maintains the intent of the mitigation measure. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM BIO-3a Prior to the approval of the Final Development Plan, ~~issuance of grading permits,~~ the applicant shall provide a final grading plan to El Dorado County. The final grading plan shall indicate the size and location of all onsite oak trees and will indicate which trees are to be removed or retained as a part of the ~~Proposed~~ Project. Approval of the Final Development Plan and issuance of grading permits shall not occur unless the County has adopted an offsite oak tree mitigation program that fully complies with General Plan Policies 7.4.4.4 and 7.4.2.8 and the applicant has submitted a project-specific oak tree mitigation plan which the County finds fully compliant with the adopted offsite oak tree mitigation program. Should the County fail to adopt an offsite oak tree mitigation program, the project must be redesigned to allow for onsite retention. This redesign shall be subject to subsequent environmental review.

~~The applicant shall comply with the Oak Woodland Management Plan (OWMP) by mitigating for oak woodland canopy removed in accordance with either Option A (On-Site Mitigation, Replanting and Replacement), Option B (Conservation Fund In-Lieu Fee), or a combination of both options. As outlined in the OWMP, a 1:1 mitigation ratio shall be applied to the oak canopy removed that falls below the threshold in Table 1 of the El Dorado County General Plan Policy 7.4.4.4, while a 2:1 mitigation ratio shall be applied to the remaining oak canopy removed.~~

~~The applicant shall comply with the Oak Woodland Management Plan (OWMP) by mitigating for oak woodland canopy removed in accordance with either Option A (On-Site Mitigation, Replanting and Replacement), Option B (Conservation Fund In-Lieu Fee), or a combination of both options. As outlined in the OWMP, a 1:1 mitigation ratio shall be applied to the oak canopy removed that falls below the threshold in Table 1 of the El Dorado County General Plan Policy 7.4.4.4, while a 2:1 mitigation ratio shall be applied to the remaining oak canopy removed.~~

Page 2-53, Table 2-1

Mitigation Measure TRANS-1a as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program or are included in the 20-year Capital Improvement Program at the time of building permit issuance. For simplification purposes, the mitigation measure

has also been revised to incorporate the requirements of Mitigation Measure TRANS-3d, which required improvements at the same intersection. In addition, the mitigation measure has been revised to reflect coordination with Mitigation Measure TRANS-5f improvements, which require improvements at the same intersection. Finally, the mitigation measure has been revised to indicate that improvements must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1a Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, pursuant to General Plan Policy TC-Xg and TC-Xf, and upon approval from Caltrans, shall be responsible for the addition of an eastbound left-turn lane from Pleasant Valley Road (SR-49) onto Forni Road, left- and right-turn pockets on Forni Road onto Pleasant Valley Road (SR-49), and a traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. The intersection shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) and SR-49 (South) intersection. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed road improvements simultaneously and in conjunction with MM TRANS-5f improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for the addition of an eastbound left-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. Because of the close proximity, this intersection shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) intersection with SR-49~~

~~(South). The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans~~.

Page 2-54, Table 2-1

Mitigation Measure TRANS-1b as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a westbound left-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Patterson Road. The applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct ~~Build~~ the needed improvements and enter into a reimbursement agreement with El Dorado County;
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 2-54, Table 2-1

Mitigation Measure TRANS-1c as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or is included in the 20-year Capital Improvement Program at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1c Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a traffic signal at the intersection of Pleasant Valley Road (SR-49) and SR-49 (South). ~~Because of the close proximity, this intersection~~ The traffic signal shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) and Forni Road intersection. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 2-55, Table 2-1

Mitigation Measure TRANS-3a as it appears in Table 2-1 of the Draft EIR, has been revised to ensure impacts at the US-50/Missouri Flat Road interchange, including the intersections of Missouri Flat Road/Mother Lode Drive and Missouri Flat Road/Plaza Drive, would be less than significant, thereby eliminating the significant unavoidable queuing impacts. Because the revised mitigation will eliminate a significant unavoidable impact and will be adopted by the Project applicant as required by El Dorado County, the revision is not considered significant new information and would not require recirculation.

MM TRANS-3a Prior to the issuance of building permits, the County, in coordination with Caltrans, shall determine the available traffic capacity at the Missouri Flat Road/Highway 50 Interchange.

If the County, in coordination with Caltrans, determine that there is adequate traffic capacity available at the Missouri Flat Road/Highway 50 Interchange for the Project, then issuance of building permits by the County may proceed. The amount of square footage permitted to be constructed per building permit shall not result in an exceedance of the identified available capacity.

Payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the Project's cumulative effects.

If there is not adequate traffic capacity at the Missouri Flat Road/Highway 50 Interchange for the Project, then building permits will not be issued until the County, in coordination with Caltrans, awards the construction contract for the necessary additional traffic capacity for Missouri Flat Road/Highway 50 Interchange improvements. The implementation date for the necessary additional traffic capacity improvements with the subsequent issuance of building permits shall be determined at the sole discretion of the County.

The amount of square footage permitted to be constructed per building permit shall not result in an exceedance of the identified additional capacity implemented improvements. Payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the additional traffic capacity mitigation improvements.

The Missouri Flat/Highway 50 Interchange consists of the following intersections that are impacted by the Project:

- Missouri Flat Road/Plaza Drive
- Missouri Flat Road/US-50 Westbound Ramps
- Missouri Flat Road/US-50 Eastbound Ramps
- Missouri Flat Road/Mother Load Drive.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for upgrades to the Missouri Flat Road/Mother Lode Drive consisting of the conversion of the southbound right-turn lane to a through-right turn lane, and the addition of a southbound through lane south of Mother Lode Drive. In addition, the dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road should be converted into a single free right-turn lane. The exclusive right-turn lane exiting eastbound US-50 shall channel vehicles destined for southbound Missouri Flat Road into the proposed southbound through-right lane at Mother Lode Drive.~~

Page 2-56, Table 2-1

Mitigation Measure TRANS-3b has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Program at the time of building permit issuance.

MM TRANS-3b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a southbound through lane at the intersection Missouri Flat Road and Forni Road. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation in one of the following ways:~~.~~

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 2-56, Table 2-1

Mitigation Measure TRANS-3c as it appears in Table 2-1, on page 2-56 of the Draft EIR, erroneously referred to Diamond Road (SR-49) as Diamond Road (SR-29). The text has been revised to correctly reflect the roadway's name.

MM TRANS-3c Prior to the issuance of building permits, the Project applicant shall be responsible for the addition of a northbound through lane and a southbound through lane at the intersection Diamond Road (SR-49) and Lime Kiln Road/Black Rice Road. In addition, the re-optimization of the signal timing along the signal corridor (including the following intersections: Diamond Springs Parkway and Throwita Way, Diamond Springs Parkway and Diamond Road (SR-49~~29~~), and Diamond Road (SR-49~~29~~) and Lime Kiln Road/Black Rice Road) shall be completed. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.

Page 2-56, Table 2-1

Mitigation Measure TRANS-3d has been deleted because of revisions made to Mitigation Measure TRANS-1a. Mitigation Measure TRANS-1a now includes the requirements formerly embodied in Mitigation Measure Trans 3d. Accordingly, these revisions do not represent significant new information and do not require recirculation.

~~**MM TRANS-3d** Prior to the issuance of building permits, and upon approval from Caltrans, the Project applicant shall be responsible for the addition of a southbound right-turn lane, an eastbound left-turn lane, and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. Additionally, the intersection shall be coordinated with the signalized Pleasant Valley Road (SR-49) intersection with SR-49 (South).~~

Page 2-56 and 2-57, Table 2-1

Mitigation Measure TRANS-3e as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Plan at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM TRANS-3e Prior to the issuance of building permits, and upon approval from Caltrans, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a northbound right-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and SR-49 (South). ~~Additionally, the intersection~~ The traffic signal shall be coordinated with the signalized Pleasant Valley Road (SR-49) and Forni Road intersection ~~intersection with Forni Road~~. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 2-57, Table 2-1

Mitigation Measure TRANS-3f as it appears in Table 2-1 has been revised to reflect that the required improvement is included in the 20-year Capital Improvement Plan, and that the applicant would be required to pay Traffic Impact Mitigation fees as mitigation. These changes maintain the original objectives of the mitigation measure while clarifying required actions based on existing conditions. This revision does not change alter any of the conclusions contained in the Draft EIR and continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM TRANS-3f Prior to the issuance of building permits, the Project applicant shall pay Traffic Impact Fees to El Dorado County, which constitute their fair-share fees for the Project mitigation improvements for the conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road and US-50 Eastbound Ramps. The Project mitigation measure is part of the County U.S. 50/Ponderosa/So. Shingle Rd. Interchange Capital Improvement Program Project (CIP#71333). ~~and in the event that the conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road and the US-50 Eastbound Ramps has not yet occurred, the Project applicant shall fund and implement said improvements and shall enter into a reimbursement agreement with El Dorado County for the improvements as applicable. If said improvements have been implemented prior to the issuance of building permits, the Project applicant shall pay fair-share fees for the intersection improvements. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.~~

Page 2-57, Table 2-1

Mitigation Measure TRANS-3g as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Program at the time of building permit issuance.

MM TRANS-3g Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a westbound right-turn lane at the intersection of Missouri Flat Road and China Garden Road. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation in one of the following ways:

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 2-57, Table 2-1

Mitigation Measure TRANS-3h has been revised to reflect the conditions under which updates to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road would occur. The intent of the mitigation measure remains the same but now allows for either the payment of Traffic Impact Mitigation fees or the implementation of improvements as appropriate to existing conditions at the time building permits are issued. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-3h Prior to the issuance of building permits, the Project applicant shall provide an updated Traffic Impact Report for the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49). The Traffic Impact Report shall include the consideration of any improvements made to this roadway segment by the County (such as implementation of Phase I of the Diamond Springs Parkway Project, which would include the two-lane upgrade to Diamond Road (SR-49) with Pleasant Valley Road/SR-49 intersection improvements); any additionally approved development projects that would affect traffic levels on this roadway segment; any additional traffic/safety related capital improvements in the traffic impact area constructed by the County; and, updated Level of Service (LOS) and intersection queuing data that are in place at the time the issuance of building permits are sought. Based on the conclusions of the updated Traffic Impact Analysis, the Project applicant shall implement improvements to this segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49) to the satisfaction of the El Dorado County Department of Transportation and Caltrans under one of the following two scenarios.

Scenario One:

If the updated Traffic Impact Analysis concludes that the Project would not result in significant LOS and queuing impacts to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49), then the Project applicant shall do one of the following based on existing conditions and the approval of El Dorado County Department of Transportation and Caltrans:

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion is not constructed by the County, then the Project applicant shall design and construct the Diamond Road (SR-49) portion of Phase I, enter into a reimbursement agreement with the County, obtain a Caltrans-approved improvement agreement, and pay equitable traffic impact fees, which represent their fair-share for cumulative effects pursuant to the Caltrans document entitled "Guide for the Preparation of Traffic Impact Studies."
- If Phase I of the Diamond Springs Parkway has been constructed by the County, the applicant shall pay their equitable traffic impact fees, which represent their fair-share for cumulative effects pursuant to the Caltrans fee calculations within the document entitled "Guide for the Preparation of Traffic Impact Studies."

Scenario Two:

If the updated Traffic Impact Analysis concludes that the Project would result in significant LOS and queuing impacts to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49), then the Project applicant shall do one of the following based on existing conditions and the approval of El Dorado County Department of Transportation and Caltrans:

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion is not constructed by the County, the Project applicant shall design and construct the Diamond Road (SR-49) portion of both Phase I (2-lanes) and Phase II (4-lanes), shall enter into a reimbursement agreement with the County only for Phase I, and obtain a Caltrans approved improvement agreement.
- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion has been constructed by the County, the Project applicant shall design and construct the Phase II (4-Lane Diamond Road [SR-49])

portion of the Project and obtain a Caltrans-approved improvement agreement.

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion has been constructed and the Phase II project has been added to the County's 20-year Capital Improvement Program, the Project applicant shall construct the Diamond Road (SR-49) portion of Phase II, enter into a reimbursement agreement with the County, and obtain a Caltrans approved improvement agreement.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for upgrading Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road (SR-49) to a four-lane multilane highway. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.~~

Page 2-58, Table 2-1

Mitigation Measure TRANS-3i as it appears in Table 2-1, on page 2-58 of the Draft EIR erroneously referred to Diamond Road (SR-49) as Diamond Road (SR-29). The text has been revised to correctly reflect the roadway's name.

MM TRANS-3i Prior to the issuance of building permits, the Project applicant shall be responsible for upgrading Diamond Springs Parkway between Throwita Way and Diamond Road (SR-49~~29~~) to a four-lane divided arterial and shall enter into a reimbursement agreement with El Dorado County for the improvements as applicable. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation.

Page 2-61, Table 2-1

Mitigation Measure TRANS-5a as it appears in Table 2-1, has been deleted because changes made to Mitigation Measure TRANS-3a would ensure impacts would be reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

~~**MM TRANS-5a** Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the modification of lane assignments on the Missouri Flat Road/US-50 interchange bridge structure to provide for a continuous northbound left turn lane at Missouri Flat Road/Westbound US-50 Ramp intersection thereby removing one of the southbound left-turn lanes at the Missouri Flat Road/Eastbound US-50 Ramp~~

~~intersection. The applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:~~

- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 2-59, Table 2-1

Mitigation Measure TRANS-5b has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Program Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the westbound left-turn lane to a total length of 500 feet and for extension of the dual northbound left-turn lanes to a total length of 440 feet at the intersection of Diamond Springs Parkway and Missouri Flat Road ~~to a total length of 440 feet~~. The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations simultaneously and in conjunction with MM TRANS-1e (County's Diamond Springs Parkway Capital Improvement Program Project #72334); or,
- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project

mitigation cost obligations associated with MM TRANS-5b shall be provided to the County upon demand, which will constitute the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5b shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer

- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County~~.

Page 2-59, Table 2-1

Mitigation Measure TRANS-5c has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The mitigation measure has also been revised to require the extension of the westbound left-turn lane to a total of 375 feet instead of 350 feet. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5c Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the eastbound left-turn lane to a total length of 240 feet and for extension of the westbound left-turn lane to a total of 375 feet at the intersection of Diamond Springs Parkway and Throwita Way ~~to a total of 350 feet~~. The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations simultaneously and in conjunction with MM TRANS-1e and MM TRANS-3i (County's Diamond Springs Parkway Capital Improvement Program Project #72334); or,

- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project mitigation cost obligations associated with MM TRANS-5c shall be provided to the County upon demand, which will constitute the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5c shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer
- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 2-60, Table 2-1

Mitigation Measure TRANS-5d has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5d Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the dual northbound left-turn lanes to a total length of 375 feet at the intersection of Diamond Springs Parkway and Diamond Road (SR-49). The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations simultaneously and in conjunction with MM TRANS-1d and MM TRANS-3i (County's

Diamond Springs Parkway Capital Improvement Program Project #72334); or,

- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project mitigation cost obligations associated with MM TRANS-5d shall be provided to the County upon demand, which will constitute the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5d shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer.
- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 2-61, Table 2-1

Mitigation Measure TRANS-5e has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program at the time of building permit issuance. The mitigation measure has also been revised to indicate that work occurring at the intersection of Diamond Road (SR-49) and Pleasant Valley Road must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5e Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County and Caltrans, shall be responsible for the conversion of the northbound right-turn lane to a shared through-right lane, and the modification of signal phasing as appropriate at the intersection of Diamond Road (SR-49) and Pleasant Valley Road. The applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct ~~Build~~ the needed improvements and enter into a reimbursement agreement with El Dorado County; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 2-61, Table 2-1

Mitigation Measure TRANS-5f has been updated to indicate that work occurring at the intersection of Pleasant Valley Road (SR 49) and Forni Road must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. In addition, the mitigation measure has been updated to reflect coordination with Mitigation Measure TRANS-1a improvements, which require improvements at the same intersection. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5f Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, pursuant to General Plan Policy TC-Xg and TC-Xf, and upon ~~and upon receiving the~~ approval of Caltrans, shall be responsible ~~the Project applicant shall provide fair-share fees to El Dorado County~~ for the eastern realignment of the Forni Road approach at the Pleasant Valley Road (SR-49)/Forni Road intersection. The realignment shall ~~Fair-share fees shall be used by the County to realign the Forni Road approach to the east to~~ improve the southbound intersection approach angle and maximize the spacing between the Pleasant Valley Road (SR-49) and Forni Road intersection and the Pleasant Valley Road (SR-49) and SR-49 (South) intersection. The ultimate intersection configuration shall be completed to the satisfaction of the ~~be at the discretion of Caltrans and~~ El Dorado County Department of Transportation ~~DOT~~ and Caltrans in one of the following ways:

- Construct the needed road improvements simultaneously and in conjunction with MM TRANS-1a improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or.
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

SECTION 3: PROJECT DESCRIPTION

Page 3-24, Paragraph 3

The existing sewer line within the Diamond Road (SR 49) right-of-way was incorrectly referenced as a trunk line on page 3-24 of the Draft EIR. The text has been revised as follows:

> All wastewater generated from the Project would be conveyed to, and processed at, EID's Deer Creek Wastewater Treatment Plant. The Project would require the extension of a sanitary sewer collection line from an existing ~~trunk~~ sewer line located within the Diamond Road (SR-49) right-of-way south of the Lime Kiln Road intersection. The Project applicant would coordinate the pipeline extension with EID.

SECTION 4.3: BIOLOGICAL RESOURCES

Page 4.3-28 through 4.3-29, Impact BIO-2 and Mitigation Measure MM BIO-2c

The analysis discussion for Impact BIO-2 and Mitigation Measure BIO-2c have been revised to better characterize onsite drainage features and the need for appropriate setbacks. These changes clarify the existing analysis and mitigation measure and do not represent significant new information. Accordingly, recirculation is not required.

> ***Impact Analysis***
> *Onsite Improvements*
> The project site contains 0.14 acre of drainage feature that collects the existing runoff from a portion of the project site and neighboring parcels to the south and transmits it to a low-lying area to the north. The drainage feature is likely to be considered a wetland by the USACE and fall under its jurisdiction There are also 1.39 acres of riparian habitat surrounding the

drainage feature that is under the jurisdiction of the CDFG. CEQA identifies that any impacts to wetlands subject to jurisdiction of USACE and/or CDFG are potentially significant. Mitigation Measure BIO-2a would ensure project compliance with all agencies regulating assessment and mitigation of impacts to wetlands. Implementation of Mitigation Measure BIO-2b would protect water quality of avoided wetlands and other Waters of the U.S. that occur inside the project study area, as well as those that occur in proximity to the project study area, such as Weber Creek. As such, implementation of Mitigation Measure BIO-2a and BIO-2b would ensure compliance with applicable USACE and CDFG regulations, thereby reducing these impacts to less than significant.

General Plan Policy 7.3.3.4 requires buffers and special setbacks for the protection of riparian areas and wetlands including such features as the onsite drainage feature. However, the intent of the policy, as shown in the General Plan EIR page 5.12-101 to 5.12-114, is to protect water features that have important natural resources value. As part of the separate Diamond Springs Parkway Project, the construction of which must precede the construction of the Project, the drainage feature will be piped or culverted, allowing stormwater to be conveyed beneath the Diamond Springs Parkway. By bisecting the drainage feature, its functionality and habitat value are diminished. The drainage feature would have limited resource value due to its disturbed nature. This is not the type of drainage feature that General Plan Policy 7.3.3.4 was intended to protect and there is no benefit to requiring the implementation of a setback beyond those that may be required by the USACE or CDFG. Accordingly, setbacks from the onsite drainage feature will be required to be consistent with the requirements of the USACE and CDFG, if applicable, but will not be required to be consistent with setbacks as described in General Plan Policy 7.3.3.4. Instead, implementation of Mitigation Measure Bio-2c would require applicable setbacks in accordance with USACE and CDFG standards and the protection of water quality for preserved seasonal and perennial drainages. Implementation of Mitigation Measures BIO-2a, BIO-2b, and Bio-2c would reduce impacts to less than significant.

~~The project site contains 0.141 acre of drainage feature that are likely under the jurisdiction of the USACE. There are also 1.39 acres under the jurisdiction of the CDFG. Clearing and grading activities required for construction of the Proposed Project could result in the removal of up to 1.8 acres of valley foothill riparian habitat. Accordingly, impacts to drainage features under the jurisdiction of the USACE and CDFG are considered potentially significant. Implementation of Mitigation Measure BIO-2a would ensure project compliance with all agencies regulating assessment and mitigation of impacts to wetlands. Implementation of Mitigation Measure BIO-2b would protect water quality of avoided wetlands and other Waters of the U.S. that occur inside the project study area, as well as those that occur in proximity to the project study area, such as Weber Creek. Implementation~~

~~of Mitigation Measure Bio-2c would require adequate setback and the protection of water quality for preserved seasonal and perennial drainages.~~

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM BIO-2a Riparian habitat shall be avoided to the maximum extent feasible. Drainage features at the project site identified as jurisdictional Waters of the U. S., including wetlands, would be filled as a result of the Project and would require authorization of a Section 404 Permit from the United States Army Corps of Engineers (USACE), and a Steam Bed Alteration Agreement shall be obtained from California Department of Fish and Game (CDFG), as appropriate. Prior to initiation of any ground clearing or other construction activities, the Project applicant shall obtain authorization of a Section 404 Permit from USACE and a CDFG Section 1602 Lake and Streambed Alteration Agreement shall be prepared and approved by both USACE and CDFG. Mitigation required for direct and indirect impacts to all areas under the jurisdiction of federal and state resource agencies shall be carried out in accordance with the conditions of the Section 404 Permit and Lake and Streambed Alteration Agreement.

MM BIO-2b As part of the permitting process, mitigation of impacts to jurisdictional Waters of the U.S., including wetlands, shall be identified and implemented, as described below. The acreage shall be replaced or rehabilitated on a "no-net-loss" basis in accordance with United States Army Corps of Engineers (USACE) regulations. Habitat restoration, rehabilitation, and/or replacement shall be at a location and by methods agreeable to USACE. Habitat compensation shall also be in accordance with El Dorado County which has adopted a "no-net-loss" policy under General Plan Policy 7.3.3.2; this policy allows wetland habitat compensation on- or offsite, but at a minimum 1:1 ratio. Also in accordance with General Plan Policy 7.3.3.2, a wetland study and mitigation monitoring program shall be submitted to the County and concerned state and federal agencies (e.g., USACE, California Department of Fish and Game) for review prior to permit approval.

MM BIO-2c All grading plans shall include ~~adequate~~ setbacks in accordance with USACE and CDFG requirements for preserved seasonal and perennial drainages. Measures to minimize erosion and runoff into seasonal and perennial drainages that are preserved shall also be included in all grading plans. Appropriate runoff controls such as berms, storm gates, detention basins,

overflow collection areas, filtration systems, and sediment traps shall be implemented to control siltation and the potential discharge of pollutants into preserved drainages.

Level of Significance After Mitigation

Less than significant impact.

Offsite Improvements

In general, the offsite roadway improvement areas are abutted by unlined drainage ditches that are not hydrologically connected to natural drainages and are not likely under the jurisdiction of the USACE. Accordingly, there would be no impacts to drainage features under the jurisdiction of the USACE and CDFG.

Level of Significance Before Mitigation

No impact.

Mitigation Measures

No mitigation is necessary.

Level of Significance After Mitigation

No impact.

Page 4.3-30 through 4.3-34, Impact BIO-3 and Mitigation Measure MM BIO-3a

As discussed in Section 3, Response to Comments, on January 20, 2012, the Third District Court of Appeals issued a ruling in the case of Center for Sierra Nevada Conservation v. County of El Dorado. The ruling indicated that the County shall not utilize Option B (payment of a conservation fund in-lieu fee) of General Plan Policy 7.4.4.4 until and unless the County has done additional CEQA analysis on the off-site mitigation program and its fee ordinance. Therefore, at this time, Option B as included in Mitigation Measure BIO-3a of the Draft EIR is no longer a viable option. Therefore, the analysis discussion for Impact BIO-3 and Mitigation Measure BIO-3a has been revised to remove Option B. Revisions to the analysis and the mitigation measure provide clarification of this issue and ensure that the Project's impacts would continue to be reduced to less than significant with the implementation of mitigation. Accordingly, recirculation is not required.

Impact Analysis

Onsite Improvements

General Plan Polices 7.4.4.4, 7.4.4.5, and 7.4.5.2 govern the removal of oak tress within El Dorado County. General Plan Policy 7.4.4.4 contains two options for mitigation: Option A, consisting of onsite tree canopy retention and replacement and, Option B, consisting of payment of mitigation fees in accordance with the Oak Woodland Management Plan (OWMP). However, as a result of the judgment issued by the Third District Court of Appeals of California in the case of Center for Sierra Nevada Conservation v. County of El Dorado,

the County's OWMP has been rescinded, and its mitigation options, which previously allowed for a conservation fund in-lieu fee are no longer available. The OWMP, was rescinded based on the fact that the OWMP's negative declaration, as tiered off of the General Plan's 2004 EIR, was in violation of CEQA because it did not adequately study the potential impacts of the OWMP and in-lieu fee program. Accordingly, only Option A, onsite retention and replacement, is currently available.

To determine the acreage of oak woodland canopy cover on the project site subject to General Plan Policy 7.4.4.4, a qualified biologist has conducted an oak woodland survey based on aerial photography of the project site (Exhibit 4.3-4). Based on aerial photography, the 30.63-acre project site (27.61-acre DDRC site and 3.02-acre Material Recovery Facility (MRF) site combined) appears to contain approximately 4.30 acres of oak woodland. Accordingly, 14 percent (4.30 acres of oak woodland ÷ 30.63-acre project site) of the Project site contains oak woodland canopy cover subject to General Plan Policy 7.4.4.4 and the mitigation requirements set forth therein. As outlined by Table 1 of the General Plan Policy 7.4.4.4, under Option A, projects containing between 10 and 19 percent of existing canopy must retain at least 90 percent of that canopy cover, and implement a 1:1 replacement ratio for oak woodland removed. Accordingly, the Project would be required to retain 3.87 acres of oak woodland onsite and provide a 1:1 onsite replacement ratio for the remaining 0.43 acres.

Based on the proposed site plan, a significant portion of the 4.30 acres of onsite oak trees are in the center of the project area. The Project is designed such that the entire site will likely require grading resulting in the removal of the majority, if not all, of the existing oak woodland canopy. Because of this, the Project as proposed cannot comply with the onsite retention requirements (90 percent or 3.87 acres) of General Plan Policy 7.4.4.4.

Prior to the approval of the Final Development Plan for the Project, it is expected that the County will adopt a new mitigation program as an alternative to retention of onsite oaks as directed by General Play Policy 7.4.2.8 and Measure CO-M. Accordingly, although there are a number of potential feasible and reasonable mitigation measures that may be available for the removal of oaks at the time the Final Development Plan is approved, it is impossible to articulate the precise approach to mitigation until such time as the County has adopted its response to the lawsuit and how it intends to implement Policy 7.4.4.4. As such, Mitigation Measure BIO-3a indicates that a grading permit cannot be issued until such time as the County has adopted a mitigation program that is compliant with CEQA and provides for a feasible alternative to retention of onsite oaks. Should the County fail to adopt an alternative to onsite retention of oaks, the project would be required to be redesigned prior to approval of the Final Development Plan and would be subject to additional environmental review.

Additional mitigation is proposed to ensure that if any oak trees are preserved onsite they would be properly protected during construction activities and a mitigation monitoring plan for any oak trees replanted onsite would be implemented. Implementation of these mitigation measures would reduce potential impacts to less than significant.

~~Construction of the Project would result in the loss of oak woodland canopy, and, therefore, is subject to the General Plan Policies 7.4.4.4, 7.4.4.5, and 7.4.5.2 governing removal of 4.3 acres of oaks and the County's Oak Woodland Management Plan (OWMP). The OWMP outlines the County's strategy for conservation of oak woodlands, and implements and provides additional guidance on General Plan Policy 7.4.4.4. Direct and indirect impacts to oak woodland canopy are considered a potentially significant impact.~~

~~Two categories of projects are covered by the OWMP: (1) parcels/projects 1 acre in size or less having at least 10 percent oak woodland canopy cover, and (2) parcels/projects greater than 1 acre in size with at least 1 percent oak woodland canopy cover. The project site is greater than 1 acre in size. To determine the percentage of oak woodland canopy cover on the project site, a qualified biologist has conducted an oak woodland survey based on aerial photography of the project site (Exhibit 4.3-4). Based on aerial photography, the 30.63-acre project site (27.61-acre DDRC site and 3.02-acre Material Recovery Facility (MRF) site combined) appears to contain approximately 4.30 acres of oak woodland. Accordingly, 14 percent of the Project contains oak woodland canopy cover subject to the OWMP. The Proposed Project, therefore, meets the criteria described in the second category of the OWMP. As such, removal of oak trees associated with construction of the Proposed Project, including Lime Kiln Road, is subject to the OWMP and the mitigation requirements set forth therein.~~

~~Actual impacts to the 4.30 acres of oak woodland canopy subject to the OWMP policies is unknown at this time. The Project is designed such that the entire site will likely require grading resulting in the removal of existing oak woodland canopy. Accordingly, for conservative purposes, it is assumed that all 4.30 acres of oak woodland canopy subject to the OWMP would be removed and require mitigation as outlined in the OWMP.~~

~~As outlined by Table 1 of the General Plan Policy 7.4.4.4, for projects containing between 10 and 19 percent of existing canopy cover that retain more than 90 percent of that canopy cover, a 1:1 mitigation ratio is required. Any canopy cover removed beyond the 90 percent threshold must be mitigated at a 1:2 ratio. Since the Proposed Project may remove the entire 4.30 acres (187,308 square feet) of canopy, it is assumed that zero percent will be retained.~~

~~Accordingly, 10 percent (18,731 square feet) of the canopy removed would require a 1:1 mitigation ratio and 90 percent (168,577 square feet) would require a 2:1 mitigation ratio.~~

~~Currently, no oak trees are proposed to be retained. Without proper mitigation, impacts would be potentially significant.~~

~~Additional mitigation is proposed to ensure that if any oak trees are preserved onsite they would be properly protected during construction activities and a mitigation monitoring plan for any oak trees replanted onsite would be implemented. Implementation of these mitigation measures would reduce potential impacts to less than significant.~~

Level of Significance Before Mitigation

Potentially significant impact.

Mitigation Measures

MM BIO-3a Prior to the approval of the Final Development Plan, ~~issuance of grading permits,~~ the applicant shall provide a final grading plan to El Dorado County. The final grading plan shall indicate the size and location of all onsite oak trees and will indicate which trees are to be removed or retained as a part of the ~~Proposed~~ Project. Approval of the Final Development Plan and issuance of grading permits shall not occur unless the County has adopted an offsite oak tree mitigation program that fully complies with General Plan Policies 7.4.4.4 and 7.4.2.8 and the applicant has submitted a project-specific oak tree mitigation plan which the County finds fully compliant with the adopted offsite oak tree mitigation program. Should the County fail to adopt an offsite oak tree mitigation program, the project must be redesigned to allow for onsite retention. This redesign shall be subject to subsequent environmental review.

~~The applicant shall comply with the Oak Woodland Management Plan (OWMP) by mitigating for oak woodland canopy removed in accordance with either Option A (On-Site Mitigation, Replanting and Replacement), Option B (Conservation Fund In-Lieu Fee), or a combination of both options. As outlined in the OWMP, a 1:1 mitigation ratio shall be applied to the oak canopy removed that falls below the threshold in Table 1 of the El Dorado County General Plan Policy 7.4.4.4, while a 2:1 mitigation ratio shall be applied to the remaining oak canopy removed.~~

MM BIO-3b Any oak trees on the project site that are not removed, and any oak trees on adjacent properties that are within 200 feet of grading activity shall be protectively fenced 5 feet beyond the dripline and root zone of each tree (as determined by a certified arborist). This fence, which is meant to prevent activities that result in soil compaction beneath the canopy or over the root zone, shall be maintained until all construction activities are complete. No

grading, trenching, or movement of construction equipment shall be allowed to occur within fenced areas. Protection for oak trees on slopes and hillsides will include installation of a silt fence. A silt fence shall be installed at the upslope base of the protective fence to prevent any soil drifting down over the root zone.

MM BIO-3c To ensure that proposed onsite replacement trees survive, a mitigation monitoring plan, including provisions for necessary replacement of trees, shall be incorporated into the preservation and replacement plan. Detailed performance standards shall be included to ensure that an 80 percent survival rate is achieved over a 5-year period. Annual reports identifying planting success and monitoring efforts shall be submitted to El Dorado County Planning Services and California Department of Fish and Game. During monitoring, the following information shall be evaluated: average tree height, percent of tree cover, tree density, percent of woody shrub cover, seedling recruitment, and invasion by non-native species. Temporary irrigation equipment shall be installed to facilitate sapling survival during the first several years of growth. During the revegetation process, tree survival will be maximized by using deer screens or other maintenance measures as recommended by a certified arborist.

Level of Significance After Mitigation
Less than significant impact.

Offsite Improvements
Construction of offsite roadway improvements may result in the loss of oak trees, and, therefore, is subject to the General Plan ~~and OWMP~~ policies regarding oaks.

Level of Significance Before Mitigation
Potentially significant impact.

Mitigation Measures
Implement Mitigation Measures BIO-3a through BIO-3c.

Level of Significance After Mitigation
Less than significant impact.

SECTION 4.11: TRANSPORTATION

Page 4.11-34, Paragraph 3

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-1a, which now incorporates the requirements of Mitigation Measure TRANS-3d, and allows for the

option of payment of fair-share fees only if the intersection's improvements are included in the County's Capital Improvement Plan or have already been constructed. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

> Improvements to this intersection are not currently contained in El Dorado County's 2~~1~~0-Year Capital Improvement Plan and are not included in the County fee program. Accordingly, Mitigation Measure TRANS-1a would require the Project applicant to be responsible for improvements to this intersection. However, should the improvements be included in the County's 20-year Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Implementation of Mitigation Measure TRANS-1a would ~~to~~ ensure impacts would be reduced to a less than significant level.

Page 4.11-35, Paragraph 2

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-1c, which now allows for the option of payment of fair-share fees only if the intersection's improvements are included in the County's Capital Improvement Plan or have already been constructed. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

> This improvement is not currently contained in El Dorado County's 2~~1~~0-Year Capital Improvement Plan and is not a part of the County fee program. Accordingly, Mitigation Measure TRANS-1c would require the Project applicant to be responsible for improvements to this intersection. However, should the improvements be included in the County's 20-year Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Implementation of Mitigation Measure TRANS-1c would ~~to~~ ensure impacts would be reduced to a less than significant level.

Page 4.11-37, MM TRANS 1a

Mitigation Measure TRANS-1a 1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program or are included in the 20-year Capital Improvement Program at the time of building permit issuance. For simplification purposes, the mitigation measure has also been revised to incorporate the requirements of Mitigation Measure TRANS-3d, which required improvements at the same intersection. In addition, the mitigation measure has been revised to reflect coordination with Mitigation Measure TRANS-5f improvements, which require improvements at the same intersection. Finally, the mitigation measure has been revised to indicate that improvements must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. These changes

maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1a Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, pursuant to General Plan Policy TC-Xg and TC-Xf, and upon approval from Caltrans, shall be responsible for the addition of an eastbound left-turn lane from Pleasant Valley Road (SR-49) onto Forni Road, left and right-turn pockets on Forni Road onto Pleasant Valley Road (SR-49), and a traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. The intersection shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) and SR-49 (South) intersection. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed road improvements simultaneously and in conjunction with MM TRANS-5f improvements;

- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,

- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for the addition of an eastbound left-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. Because of the close proximity, this intersection shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) intersection with SR-49 (South). The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans~~.

Page 4.11-37 through 4.11.38, Mitigation Measure TRANS-1b

Mitigation Measure TRANS-1b has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a westbound left-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Patterson Road. The applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct ~~Build~~ the needed improvements and enter into a reimbursement agreement with El Dorado County; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 4.11-38, Mitigation Measure TRANS-1c

Mitigation Measure TRANS-1c as it appears in Table 2-1 has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or is included in the 20-year Capital Improvement Program at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information requiring recirculation.

MM TRANS-1c Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a traffic signal at the intersection of Pleasant Valley Road (SR-49) and SR-49 (South). ~~Because of the close proximity, this~~

~~intersection~~ The traffic signal shall be coordinated with the proposed signalized Pleasant Valley Road (SR-49) and Forni Road intersection. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 4.11-46, Table 4.11-16

Table 4.11-16 has been updated to reflect impacts resulting from the reanalysis of the US-50/Missouri Flat Road interchange as requested by Caltrans. Implementation of Mitigation Measure TRANS-3a as required of the Project applicant by El Dorado County would ensure these impacts are reduced to less than significant. Accordingly, these revisions do not represent significant new information requiring recirculation.

Table 4.11-16: Cumulative (2025) Plus Proposed Project Intersection Levels of Service

No.	Intersection	Control Type	Cumulative (2025)				Cumulative (2025) Plus Proposed Project			
			AM Peak-Hour		PM Peak-hour		AM Peak-Hour		PM Peak-Hour	
			Delay (Seconds)	LOS	Delay (Seconds)	LOS	Delay (Seconds)	LOS	Delay (Seconds)	LOS
1	Missouri Flat Road/Plaza Drive	Signal	50.3 ~~54.5~~	D	**152.3 ~~57.9~~**	**F ~~E~~**	51.9 ~~54.6~~	D	**171.7 ~~59.4~~**	**F ~~E~~**
2	Missouri Flat Road/US-50 Westbound Ramps	Signal	**82.4 ~~38.5~~**	**F ~~D~~**	**214.1 ~~37.6~~**	**F ~~E~~**	61.9 ~~38.8~~	E ~~D~~	**304.5 ~~49.5~~**	**F ~~D~~**
3	Missouri Flat Road/US-50 Eastbound Ramps	Signal	**286.0 ~~29.7~~**	**F ~~C~~**	**461.3 ~~51.9~~**	**F ~~D~~**	**269.5 ~~29.4~~**	**F ~~C~~**	**495.7 ~~70.4~~**	**F ~~E~~**
4	Missouri Flat Road/Mother Lode Drive	Signal	**184.4 ~~27.3~~**	**F ~~C~~**	**210.6 ~~62.1~~**	**F ~~E~~**	**203.5 ~~26.1~~**	**F ~~C~~**	**227.7 ~~94.7~~**	**F**

Page 4.11-49, Paragraph 1

The following paragraph has been revised to reflect changes made in Table 4.11-16 as a result of the reanalysis of the US-50/Missouri Flat Road interchange. Implementation of Mitigation Measure TRANS-3a as required of the Project applicant by El Dorado County would ensure the impacts are reduced to less than significant. Accordingly, these revisions do not represent significant new information requiring recirculation.

> As shown in Table 4.11-16, two intersections would operate at an unacceptable LOS in the PM peak hour as a direct result of the Proposed Project. In addition, the Proposed Project would contribute more than 10 trips to ten ~~seven~~ intersections that operate at LOS F without the Proposed Project.

Page 4.11-49, Paragraph 2

The following changes and additions have been made to reflect changes made in Table 4.11-16 as a result of the reanalysis of the US-50/Missouri Flat Road interchange. Implementation of Mitigation Measure TRANS-3a as required of the Project applicant by El Dorado County would ensure these impacts are reduced to less than significant. Accordingly, these revisions do not represent significant new information requiring recirculation.

> ***Intersection 1 - Missouri Flat Road/Plaza Drive***
> This intersection operates at an unacceptable LOS F during the PM peak hour with the addition of the Proposed Project. Accordingly, this is a potentially significant impact. The significant impact at this intersection during the PM peak hour can be mitigated by delaying implementation of the Proposed Project until additional capacity is identified.
>
> Improvements at the intersection are not currently listed in El Dorado County's 10-Year Capital Improvement Plan and are therefore not eligible for fair-share payments by the Project applicant. However, El Dorado County has made it a priority to implement Phase II of the MC&FP, which would implement improvements at the affected intersection. Accordingly, Mitigation Measure TRANS-3a would require that the Proposed Project is constructed only if adequate capacity is identified.
>
> ***Intersection 2 - Missouri Flat Road/US-50 Westbound Ramps***
> This intersection operates at an unacceptable LOS F during the AM and PM peak hours with the addition of the Proposed Project. Addition of the Proposed Project would contribute more than 10 peak-hour trips to the intersection during the PM peak hour, thereby worsening the already unacceptable LOS. Accordingly, this is a potentially significant impact. The significant impact at this intersection during the AM and PM peak hours can be mitigated by delaying implementation of the Proposed Project until additional capacity is identified.

Improvements at the intersection are not currently listed in El Dorado County's 10-Year Capital Improvement Plan and are therefore not eligible for fair-share payments by the Project applicant. However, El Dorado County has made it a priority to implement Phase II of the MC&FP, which would implement improvements at the affected intersection. Accordingly, Mitigation Measure TRANS-3a would require that the proposed project be constructed only if adequate capacity is identified. Refer to Impact TRANS-5 for further discussion regarding the remaining queuing impacts.

Intersection 3 - Missouri Flat Road/US-50 Eastbound Ramps

This intersection operates at an unacceptable LOS F during the AM and PM peak hours with the addition of the Proposed Project. Addition of the Proposed Project would contribute more than 10 peak-hour trips to the intersection during the AM and PM peak hour, thereby worsening the already unacceptable LOS. Accordingly, this is a potentially significant impact. The significant impact at this intersection during the AM and PM peak hours can be mitigated by delaying implementation of the Proposed Project until additional capacity is identified.

Improvements at the intersection are not currently listed in El Dorado County's 10-Year Capital Improvement Plan and are therefore not eligible for fair-share payments by the Project applicant. However, El Dorado County has made it a priority to implement Phase II of the MC&FP, which would implement improvements at the affected intersection. Accordingly, Mitigation Measure TRANS-3a would require that the Proposed Project be constructed only if adequate capacity is identified. Refer to Impact TRANS-5 for further discussion regarding the remaining queuing impacts.

Intersection 4 - Missouri Flat Road/Mother Lode Drive

This intersection operates at an unacceptable LOS F during the AM and PM peak hours with the Proposed Project. Addition of the Proposed Project would contribute more than 10 peak-hour trips to the intersection during the AM and PM peak hours, thereby worsening the already unacceptable LOS. Accordingly, this is a potentially significant impact. The significant impact at this intersection during the AM and PM peak hours can be mitigated ~~with the~~ by delaying implementation of the Proposed Project until additional capacity is identified. ~~conversion of the southbound right-turn lane to a through-right turn lane, and the addition of a southbound through lane south of Mother Lode Drive. In addition, the dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road should be converted into a single, free right-turn lane. As shown Table 4.11-17, the added southbound capacity and ramp intersection improvements would result in the intersection operating at an acceptable LOS D during the PM peak hour~~.

Improvements at the intersection are ~~This improvement is~~ not currently listed in El Dorado County's 10-Year Capital Improvement Plan and are ~~is~~ therefore not eligible for fair-share

payments by the Project applicant. However, El Dorado County has made it a priority to implement Phase II of the MC&FP, which would implement improvements at the affected intersection. Accordingly, Mitigation Measure TRANS-3a would require that the Proposed Project be constructed only if adequate capacity is identified. ~~the Project applicant to be responsible for improvements. While the implementation of this mitigation would create an acceptable LOS at the intersection, it would also result in queuing greater than the available storage pockets at the US-50 ramp intersections.~~ Refer to Impact TRANS-5 for further discussion regarding the remaining queuing impacts.

Page 4.11-49, Paragraph 5

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-3b, which now allows for the option to pay Traffic Impact Mitigation fees only if the intersection improvements are included in the County's Capital Improvement Plan or have already been constructed.

This improvement is not currently listed in El Dorado County's 20~~10~~-Year Capital Improvement Plan and is therefore not eligible for fair-share payments by the Project applicant. However, should the improvements be included in the County's Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Accordingly, Mitigation Measure TRANS-3b would require the Project applicant to be responsible for improvements to this intersection to ensure impacts would be reduced to a less than significant level.

Page 4.11-50, Paragraph 4

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-1a, which now incorporates the requirements of Mitigation Measure TRANS-3d, and allows for the option of payment of fair-share fees only if the intersection's improvements are included in the County's Capital Improvement Plan or have already been constructed. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

This improvement is not currently listed in El Dorado County's 20~~10~~-Year Capital Improvement Plan and is therefore not eligible for fair-share payments by the Project applicant. Accordingly, Mitigation Measure TRANS-1a ~~3d~~ would require the Project applicant to be responsible for improvements to this intersection. However, should the improvements be included in the County's Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Implementation of Mitigation Measure TRANS-1a would ~~to~~ ensure impacts would be reduced to a less than significant level.

Page 4.11-51, Paragraph 2

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-3e, which incorporates the option of payment of fair-share fees only if the intersection's improvements are included in the County's Capital Improvement Plan or have already been constructed. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

> This improvement is not currently listed in El Dorado County's 20~~10~~-Year Capital Improvement Plan and is therefore not eligible for fair-share payments by the Project applicant. Accordingly, Mitigation Measure TRANS-3e would require the Project applicant to be responsible for improvements to this intersection. However, should the improvements be included in the County's 20-year Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Implementation of Mitigation Measure TRANS-3e would ~~to~~ ensure impacts would be reduced to a less than significant level.

Page 4.11-51, Paragraph 4

The paragraph has been revised to reflect that the required improvement is included in the Capital Improvement Plan and that the applicant would be required to pay fair-share fees as mitigation. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

> Improvements necessary to reduce impacts to less than significant at this intersection are included in El Dorado County's 20~~10~~-Year Capital Improvement Plan under project number 71333, U.S. 50/Ponderosa Road/South Shingle Road Interchange Improvements and, therefore, is ~~may be~~ eligible for fair-share payments by the Project applicant. ~~However, construction is not scheduled to occur until sometime between 2014 and 2019.~~ As such, Mitigation Measure TRANS-3f would require the Project applicant to ~~either complete improvements to the intersection or~~ pay fair-share fees~~, dependent upon whether or not the improvements have already occurred~~. Implementation of TRANS-3f would ensure impacts are reduced to a less than significant level.

Page 4.11-52, Paragraph 3

The paragraph has been revised to reflect clarifications made to Mitigation Measure TRANS-3g, which incorporates the option of payment of fair-share fees only if the intersection's improvements are included in the County's Capital Improvement Plan or have already been constructed. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

This improvement is not currently listed in El Dorado County's 2010 ~~10~~-Year Capital Improvement Plan and is therefore not eligible for fair-share payments by the Project applicant. Accordingly, Mitigation Measure TRANS-3g would require the Project applicant to be responsible for improvements to this intersection. However, should the improvements be included in the County's 20-year Capital Improvement Plan, or if the improvements are already constructed at the time building permits are sought, the mitigation measure allows for the payment of fair-share fees. Implementation of Mitigation Measure TRANS-3g would ~~to~~ ensure impacts would be reduced to a less than significant level.

Page 4.11-55, Paragraph 2

The paragraph has been revised to reflect the conditions under which updates to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road would occur. These changes do not alter any of the conclusions contained in the Draft EIR and do not require recirculation.

Improvements to this segment are not currently contained in El Dorado County's 2010 ~~10~~-Year Capital Improvement Plan and are not included in the County fee program. As indicated by the Traffic Impact Analysis, the Proposed Project is solely responsible for the impact to this roadway segment. Accordingly, Mitigation Measure TRANS-3h would require the Project applicant to prepare an updated Traffic Impact Report for the roadway segment to determine existing conditions at the time of building permit issuance and if the Project applicant will be required to construct the improvements, enter into a reimbursement agreement, pay fair-share traffic fees, or a combination thereof. Implementation of Mitigation Measure TRANS-3h would ensure impacts would be reduced to a less than significant level. ~~be responsible for improvements to this segment to ensure impacts would be reduced to a less than significant level.~~

Page 4.11-55 through 4.11-56, Mitigation Measure TRANS-3a

Mitigation Measure TRANS-3a has been revised to ensure impacts at the US-50/Missouri Flat Road interchange, including the intersections of Missouri Flat Road/Mother Lode Drive and Missouri Flat Road/Plaza Drive, would be less than significant, thereby eliminating the significant unavoidable queuing impacts. Because the revised mitigation will eliminate a significant unavoidable impact and will be adopted by the Project applicant as required by El Dorado County, the revision is not considered significant new information and would not require recirculation.

MM TRANS-3a Prior to the issuance of building permits, the County, in coordination with Caltrans, shall determine the available traffic capacity at the Missouri Flat Road/Highway 50 Interchange.

If the County, in coordination with Caltrans, determine that there is adequate traffic capacity available at the Missouri Flat Road/Highway 50 Interchange for the Project, then issuance of building permits by the County may proceed. The amount of square footage permitted to be constructed per building permit shall not result in an exceedance of the identified available capacity. Payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the Project's cumulative effects.

If there is not adequate traffic capacity at the Missouri Flat Road/Highway 50 Interchange for the Project, then building permits will not be issued until the County, in coordination with Caltrans, awards the construction contract for the necessary additional traffic capacity for Missouri Flat Road/Highway 50 Interchange improvements. The implementation date for the necessary additional traffic capacity improvements with the subsequent issuance of building permits shall be determined at the sole discretion of the County.

The amount of square footage permitted to be constructed per building permit shall not result in an exceedance of the identified additional capacity implemented improvements. Payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the additional traffic capacity mitigation improvements.

The Missouri Flat/Highway 50 Interchange consists of the following intersections that are impacted by the Project:

- Missouri Flat Road/Plaza Drive
- Missouri Flat Road/US-50 Westbound Ramps
- Missouri Flat Road/US-50 Eastbound Ramps
- Missouri Flat Road/Mother Load Drive.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for upgrades to the Missouri Flat Road/Mother Lode Drive consisting of the conversion of the southbound right-turn lane to a through-right turn lane, and the addition of a southbound through lane south of Mother Lode Drive. In addition, the dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road should be converted into a single free right-turn lane. The exclusive right-turn lane exiting eastbound US-50 shall channel vehicles destined for southbound Missouri Flat Road into the proposed southbound through-right lane at Mother Lode Drive.~~

Page 4.11-56, Mitigation Measure TRANS-3b

Mitigation Measure TRANS-3b has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Program at the time of building permit issuance.

MM TRANS-3b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a southbound through lane at the intersection Missouri Flat Road and Forni Road. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation in one of the following ways: ~~.~~

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 4.11-56, Mitigation Measure TRANS-3c

Mitigation Measure TRANS-3c erroneously referred to Diamond Road (SR-49) as Diamond Road (SR-29). The text has been revised to correctly reflect the roadway's name.

MM TRANS-3c Prior to the issuance of building permits, the Project applicant shall be responsible for the addition of a northbound through lane and a southbound through lane at the intersection Diamond Road (SR-49) and Lime Kiln Road/Black Rice Road. In addition, the re-optimization of the signal timing along the signal corridor (including the following intersections: Diamond Springs Parkway and Throwita Way, Diamond Springs Parkway and Diamond Road (SR-49~~29~~), and Diamond Road (SR-49~~29~~) and Lime Kiln Road/Black Rice Road) shall be completed. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.

Page 4.11-56, Mitigation Measure TRANS-3d

Mitigation Measure TRANS-3d has been deleted because of revisions made to Mitigation Measure TRANS-1a. Mitigation Measure TRANS-1a now includes the requirements formerly embodied in Mitigation Measure Trans 3d. Accordingly, these revisions do not represent significant new information and do not require recirculation.

~~**MM TRANS-3d** Prior to the issuance of building permits, and upon approval from Caltrans, the Project applicant shall be responsible for the addition of a southbound right-turn lane, an eastbound left-turn lane, and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and Forni Road. Additionally, the intersection shall be coordinated with the signalized Pleasant Valley Road (SR-49) intersection with SR-49 (South).~~

Page 4.11-56, Mitigation Measure TRANS-3e

Mitigation Measure TRANS-3e has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Plan at the time of building permit issuance. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM TRANS-3e Prior to the issuance of building permits, and upon approval from Caltrans, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a northbound right-turn lane and traffic signal control at the intersection of Pleasant Valley Road (SR-49) and SR-49 (South). ~~Additionally, the intersection~~ The traffic signal shall be coordinated with the signalized Pleasant Valley Road (SR-49) and Forni Road intersection ~~intersection with Forni Road~~. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to

the County will constitute the fair-share fees for the needed mitigation improvements.

Page 4.11-56 and 4.11-57, Mitigation Measure TRANS-3f

Mitigation Measure TRANS-3f has been revised to reflect that the required improvement is included in the 20-year Capital Improvement Plan and that the applicant would be required to pay a Traffic Impact Mitigation fee as mitigation. These changes maintain the original objectives of the mitigation measure while clarifying required actions based on existing conditions. This revision does not alter any of the conclusions contained in the Draft EIR and continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM TRANS-3f Prior to the issuance of building permits, the Project applicant shall pay Traffic Impact Fees to El Dorado County, which constitute their fair-share fees for the Project mitigation improvements for the conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road and US-50 Eastbound Ramps. The Project mitigation measure is part of the County U.S. 50/Ponderosa/So. Shingle Rd. Interchange Capital Improvement Program Project (CIP#71333). ~~and in the event that the conversion of the westbound right-turn lane to a free-right turn lane at the intersection of Ponderosa Road and the US-50 Eastbound Ramps has not yet occurred, the Project applicant shall fund and implement said improvements and shall enter into a reimbursement agreement with El Dorado County for the improvements as applicable. If said improvements have been implemented prior to the issuance of building permits, the Project applicant shall pay fair-share fees for the intersection improvements. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.~~

Page 4.11-57, Mitigation Measure TRANS-3g

Mitigation Measure TRANS-3g has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed or are included in the 20-year Capital Improvement Program at the time of building permit issuance.

MM TRANS-3g Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County General Plan Policy TC-Xg, shall be responsible for the addition of a westbound right-turn lane at the intersection of Missouri Flat Road and China Garden Road. The improvements shall be

completed to the satisfaction of the El Dorado County Department of Transportation in one of the following ways:~~.~~

- Construct the needed improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 4.11-57, Mitigation Measure TRANS-3h

Mitigation Measure TRANS-3h has been revised to reflect the conditions under which updates to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road would occur. The intent of the mitigation measure remains the same but now allows for either the payment of Traffic Impact Mitigation fees or the implementation of improvements as appropriate to existing conditions at the time building permits are issued. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and would not require recirculation.

MM TRANS-3h Prior to the issuance of building permits, the Project applicant shall provide an updated Traffic Impact Report for the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49). The Traffic Impact Report shall include the consideration of any improvements made to this roadway segment by the County (such as implementation of Phase I of the Diamond Springs Parkway Project, which would include the two-lane upgrade to Diamond Road (SR-49) with Pleasant Valley Road/SR-49 intersection improvements); any additionally approved development projects that would affect traffic levels on this roadway segment; any additional traffic/safety related capital improvements in the traffic impact area constructed by the County; and updated Level of Service (LOS) and intersection queuing data that are in place at the time the issuance of building permits are sought. Based on the conclusions of the updated Traffic Impact Analysis, the Project applicant shall implement improvements to this segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant

Valley Road/(SR-49) to the satisfaction of the El Dorado County Department of Transportation and Caltrans under one of the following two scenarios.

Scenario One:

If the updated Traffic Impact Analysis concludes that the Project would not result in significant LOS and queuing impacts to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49), then the Project applicant shall do one of the following based on existing conditions and the approval of El Dorado County Department of Transportation and Caltrans:

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion is not constructed by the County, then the Project applicant shall design and construct the Diamond Road (SR-49) portion of Phase I, enter into a reimbursement agreement with the County, obtain a Caltrans-approved improvement agreement, and pay equitable traffic impact fees, which represent their fair-share for cumulative effects pursuant to the Caltrans document entitled "Guide for the Preparation of Traffic Impact Studies."
- If Phase I of the Diamond Springs Parkway has been constructed by the County, the applicant shall pay their equitable traffic impact fees, which represent their fair-share for cumulative effects pursuant to the Caltrans fee calculations within the document entitled "Guide for the Preparation of Traffic Impact Studies."

Scenario Two:

If the updated Traffic Impact Analysis concludes that the Project would result in significant LOS and queuing impacts to the segment of Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road/(SR-49), then the Project applicant shall do one of the following based on existing conditions and the approval of El Dorado County Department of Transportation and Caltrans:

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion is not constructed by the County, the Project applicant shall design and construct the Diamond Road (SR-49) portion of both Phase I (2-lanes) and Phase II (4-lanes), shall enter into a reimbursement agreement with the County only for Phase I, and obtain a Caltrans approved improvement agreement.

- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion has been constructed by the County, the Project applicant shall design and construct the Phase II (4-Lane Diamond Road [SR-49]) portion of the Project and obtain a Caltrans-approved improvement agreement.
- If Phase I of the Diamond Springs Parkway, Diamond Road (SR-49) portion has been constructed and the Phase II project has been added to the County's 20-year Capital Improvement Program, the Project applicant shall construct the Diamond Road (SR-49) portion of Phase II, enter into a reimbursement agreement with the County, and obtain a Caltrans approved improvement agreement.

~~Prior to the issuance of building permits, the Project applicant shall be responsible for upgrading Diamond Road (SR-49) between Lime Kiln Road and Pleasant Valley Road (SR-49) to a four-lane multilane highway. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans.~~

Page 4.11-57, Mitigation Measure TRANS-3i

Mitigation Measure TRANS-3i erroneously referred to Diamond Road (SR-49) as Diamond Road (SR-29). The text has been revised to correctly reflect the roadway's name.

MM TRANS-3i Prior to the issuance of building permits, the Project applicant shall be responsible for upgrading Diamond Springs Parkway between Throwita Way and Diamond Road (SR-49~~29~~) to a four-lane divided arterial and shall enter into a reimbursement agreement with El Dorado County for the improvements as applicable. The improvements shall be completed to the satisfaction of the El Dorado County Department of Transportation.

Page 4.11-62, Table 4.1-21

The portion of Table 4.11-21 on page 4.11-62 has been revised to reflect the reanalysis of the US-50/Missouri Flat Road interchange. Implementation of Mitigation Measure TRANS-3a as required of the Project applicant by El Dorado County would ensure these impacts are reduced to less than significant. Accordingly, these revisions do not represent significant new information requiring recirculation.

Table 4.11-21: Intersection Queuing Evaluation Results for Select Locations

Intersection	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (ft)	95th% Queue (ft)	Available Storage (ft)	95th% Queue (ft)
#2, Missouri Flat Rd at WB US-50 Ramps	**WBLT**				
Cumulative (2025) No SPUI		600*	2611 ~~620~~	600*	3521 ~~561~~
Cumulative (2025) No SPUI Plus DDRC			**1962** ~~608~~		**3536** ~~645~~
~~Cumulative (2025) No SPUI Plus DDRC (LOS Mitigated)~~			~~560~~		~~593~~
	NBLT				
Cumulative (2025) No SPUI		125+	264 ~~310~~	125+	253 ~~241~~
Cumulative (2025) No SPUI Plus DDRC			**263** ~~331~~		**254** ~~273~~
~~Cumulative (2025) No SPUI Plus DDRC (LOS Mitigated)~~			~~307~~		~~372~~
#3, Missouri Flat Rd at EB US-50 Ramps	**EBRT**				
Cumulative (2025) No SPUI		545	646 ~~374~~	545	593 ~~615~~
Cumulative (2025) No SPUI Plus DDRC			**668** ~~370~~		**661** ~~716~~
~~Cumulative (2025) No SPUI Plus DDRC (LOS Mitigated)~~			~~0 (Free)~~		~~0 (Free)~~
	SBLT				
Cumulative (2025) No SPUI		100+	232 ~~132~~	100+	267 ~~150~~
Cumulative (2025) No SPUI Plus DDRC			**244** ~~134~~		**266** ~~130~~
~~Cumulative (2025) No SPUI Plus DDRC (LOS Mitigated)~~			~~120~~		~~107~~

Page 4.11-64 through 4.11-65

Pages 4.11-64 through 4.11-65 have been updated to reflect the reanalysis of the US-50/Missouri Flat Road interchange. Implementation of Mitigation Measure TRANS-3a as required of the Project applicant by El Dorado County would ensure these impacts are reduced to less than significant. Accordingly, these revisions do not represent significant new information requiring recirculation.

As indicated in Table 4.11-21, the Proposed Project would result in vehicle queues exceeding available queue length at several intersections resulting in significant impacts at the following turning movements:

- Missouri Flat Road/Westbound US-50 Ramps – Westbound left.
- Missouri Flat Road/Westbound US-50 Ramps – Northbound left.
- Missouri Flat Road/Eastbound US-50 Ramps – Eastbound right.

- Missouri Flat Road/Eastbound US-50 Ramps – Southbound left.
- Diamond Springs Parkway/Missouri Flat Road – Westbound left and northbound left.
- Diamond Springs Parkway/Throwita Way – Eastbound left and westbound left.
- Diamond Springs Parkway/Diamond Road (SR-49) – Northbound left.
- Diamond Road (SR-49)/Pleasant Valley Road – Eastbound left.
- Pleasant Valley Road (SR-49)/Forni Road – Eastbound left.
- Pleasant Valley Road (SR-49)/SR-49 (South) – Westbound left.

Mitigation for each of these queue lanes was recommended by the Traffic Impact Analysis, ~~and~~ the Supplemental Traffic Analysis, and the reanalysis of the US-50/Missouri Flat Road interchange (Appendix L) and is included below. Implementation of Mitigation Measures TRANS-3a, and TRANS-5b~~a~~ through TRANS-5f would ensure queuing impacts would be reduced to a less than significant level at the respective intersections.

~~Implementation of Mitigation Measure TRANS-5a (Option 1 from the Supplemental Traffic Analysis in Appendix L) would result in the occasional blocking of the inside southbound through lane on the Missouri Flat Road/Eastbound US-50 ramp intersection, while accommodating nearly all of the northbound left-turn queue at the Missouri Flat Road/Westbound US-50 Ramp intersection. While acceptable delay and LOS are maintained, left-turn spill-back in excess of that experienced with the LOS mitigation would persist (refer to Table 5 of the Supplemental Traffic Analysis in Appendix L). As such, minor queuing issues remain at the southbound left turn from the Missouri Flat Road/Eastbound US-50 Ramp intersection. No acceptable mitigation is available to resolve the remaining queuing issue. As such, significant unavoidable impacts would remain.~~

Page 4.11-65, Mitigation Measure TRANS-5a

Mitigation Measure TRANS-5a has been deleted because changes made to Mitigation Measure TRANS-3a would ensure impacts would be reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

~~**MM TRANS-5a** Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the modification of lane assignments on the Missouri Flat Road/US-50 interchange bridge structure to provide for a continuous northbound left turn lane at Missouri Flat Road/Westbound US-50 Ramp intersection thereby removing one of the southbound left-turn lanes at the Missouri Flat Road/Eastbound US-50 Ramp intersection. The applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:~~

- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 4.11-65 through Page 4.11-66, Mitigation Measure TRANS-5b

Mitigation Measure TRANS-5b has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Program Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5b Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the westbound left-turn lane to a total length of 500 feet and for extension of the dual northbound left-turn lanes to a total length of 440 feet at the intersection of Diamond Springs Parkway and Missouri Flat Road ~~to a total length of 440 feet~~. The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations simultaneously and in conjunction with MM TRANS-1e (County's Diamond Springs Parkway Capital Improvement Program Project #72334); or,
- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5b as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project mitigation cost obligations associated with MM TRANS-5b shall be provided to the County upon demand, which will constitute

the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5b shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer

- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County~~.

Page 4.11-66, Mitigation Measure TRANS-5c

Mitigation Measure TRANS-5c has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The mitigation measure has also been revised to require the extension of the westbound left-turn lane to a total of 375 feet instead of 350 feet. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5c Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the eastbound left-turn lane to a total length of 240 feet and for extension of the westbound left-turn lane to a total of 375 feet at the intersection of Diamond Springs Parkway and Throwita Way ~~to a total of 350 feet~~. The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations simultaneously and in conjunction with MM TRANS-1e and MM TRANS-3i (County's Diamond Springs Parkway Capital Improvement Program Project #72334); or,

- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5c as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project mitigation cost obligations associated with MM TRANS-5c shall be provided to the County upon demand, which will constitute the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5c shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer
- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 4.11-66, Mitigation Measure TRANS-5d

Mitigation Measure TRANS-5d has been revised to clarify the options under which the required improvements may be implemented. The intent of the mitigation measure remains the same but now allows for the option to coordinate the required improvements with the County's Capital Improvement Project #72334 (Diamond Springs Parkway) and defines what constitutes the applicant's fair-share fees should such fees be implemented as mitigation. The revised mitigation measure continues to ensure that the impact is reduced to a less than significant level. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5d Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, shall be responsible for the extension of the dual northbound left-turn lanes to a total length of 375 feet at the intersection of Diamond Springs Parkway and Diamond Road (SR-49). The Project applicant, at the discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations;
- Construct the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations

simultaneously and in conjunction with Mitigation Measures MM TRANS-1d and MM TRANS-3i (County's Diamond Springs Parkway Capital Improvement Program Project #72334); or,

- The Project applicant may request that the County include the needed Project mitigation improvements associated with MM TRANS-5d as non-reimbursable Project obligations into the Diamond Springs Parkway Capital Improvement Program Project #72334 prior to bid advertisement. Should the County agree with this request, then payment of the Project mitigation cost obligations associated with MM TRANS-5d shall be provided to the County upon demand, which will constitute the fair-share fees for the needed Project mitigation improvements. The fair-share fees for MM TRANS-5d shall be based on the estimated cost of the needed Project mitigation improvements as determined by the County Engineer.
- ~~Build the needed improvements and enter into a reimbursement agreement with El Dorado County;~~
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 4.11-66, Mitigation Measure TRANS-5e

Mitigation Measure TRANS-5e has been revised to include the option of paying a Traffic Impact Mitigation fee if the needed improvements are already constructed as part of the 20-year Capital Improvement Program at the time of building permit issuance. The mitigation measure has also been revised to indicate that work occurring at the intersection of Diamond Road (SR-49) and Pleasant Valley Road must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5e Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County and Caltrans, shall be responsible for the conversion of the northbound right-turn lane to a shared through-right lane, and the modification of signal phasing as appropriate at the intersection of Diamond Road (SR-49) and Pleasant Valley Road. The applicant, at the

discretion of El Dorado County, shall be responsible for the improvements in one of the following ways:

- Construct Build the needed improvements and enter into a reimbursement agreement with El Dorado County; or
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.
- ~~If the needed improvement is already built, pay a fair-share fee to El Dorado County; or~~
- ~~If the needed improvement is not yet built, but the Project results in only marginal cause (as determined by the Director of El Dorado County Department of Transportation) and is included in the 10-year Capital Improvement Plan, pay fair-share fees to El Dorado County.~~

Page 4.11-67, Mitigation Measure TRANS-5f

Mitigation Measure TRANS-5f has been updated to indicate that work occurring at the intersection of Pleasant Valley Road (SR 49) and Forni Road must be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans. In addition, the mitigation measure has been updated to reflect coordination with Mitigation Measure TRANS-1a improvements, which require improvements at the same intersection. These changes maintain the original objectives of the mitigation measure while clarifying and strengthening its intent. Accordingly, these revisions do not represent significant new information and do not require recirculation.

MM TRANS-5f Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, pursuant to General Plan Policy TC-Xg and TC-Xf, and upon ~~and upon receiving the~~ approval of Caltrans, shall be responsible ~~the Project applicant shall provide fair-share fees to El Dorado County~~ for the eastern realignment of the Forni Road approach at the Pleasant Valley Road (SR-49)/Forni Road intersection. The realignment shall ~~Fair-share fees shall be used by the County to realign the Forni Road approach to the east to~~ improve the southbound intersection approach angle and maximize the spacing between the Pleasant Valley Road (SR-49) and Forni Road intersection and the Pleasant Valley Road (SR-49) and SR-49 (South) intersection. The ultimate intersection configuration shall be completed to the satisfaction of the ~~be at the discretion of Caltrans and~~ El Dorado County Department of Transportation ~~DOT~~ and Caltrans in one of the following ways:

- Construct the needed road improvements simultaneously and in conjunction with MM TRANS-1a improvements;
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

Page 4.11-67, Paragraph 4

The level of significance conclusion for Impact TRANS-5 has been changed from significant and unavoidable to less than significant, because the implementation of Mitigation Measure TRANS-3a as revised in this Final EIR would ensure that queuing impacts at the US-50/Missouri Flat Road Interchange would not occur. Because the significant unavoidable impact has been removed, thereby decreasing the severity of an environmental impact, recirculation is not required.

Level of Significance After Mitigation

Less than significant impact. ~~Significant and unavoidable impact.~~

SECTION 5: ALTERNATIVES TO THE PROPOSED PROJECT

Page 5-2, Queuing (Impact TRANS-5)

As a result of revisions to Mitigation Measure TRANS-3a, the significant unavoidable impact at the southbound left-turn lane from the Missouri Flat Road/Eastbound US 50 Ramp intersection would no longer occur. Accordingly, description of the significant unavoidable impact has been removed.

- ~~Queuing (Impact TRANS-5). The Proposed Project would result in unacceptable queuing at the Missouri Flat Road/Eastbound US-50 ramp and Missouri Flat Road/Westbound US-50 ramp intersections. Mitigation is proposed; however, minor queuing issues would remain at the southbound left-turn lane from the Missouri Flat Road/Eastbound US-50 Ramp intersection. No acceptable mitigation is available to resolve the remaining queuing issue. Therefore, the residual significance would be significant and unavoidable.~~

Page 5-2, Alternatives to the Proposed Project

The first sentence under the heading 5.2, Alternatives to the Proposed Project has been updated to reflect the addition of Alternative 5, Existing MRF Access.

> The five ~~four~~ alternatives to the Proposed Project analyzed in this section are as follows:

Page 5-2, Alternatives to the Proposed Project

A fifth bullet to the list under the heading 5.2, Alternatives to the Proposed Project has been added to reflect the addition of Alternative 5, Existing MRF Access.

- **Existing MRF Access Alternative:** The project site would be developed with 241,415 square feet of retail space to accommodate the retention of the existing MRF access on Throwita Way. Throwita Way would be slightly realigned and widened to four lanes. The existing MRF scale and scale house would be maintained, and additional MRF-entry queuing space would be provided via the widening of adjacent portions of Throwita Way. The DDRC would be developed in two distinct portions: the eastern portion, containing a single building of 160,572 square feet, and the western portion, containing seven building pads ranging in area from 3,300 square feet to 38,843 square feet.

Page 5-3, Paragraph 2

The second paragraph on page 5-3 has been updated to reflect the addition of the Existing MRF Access Alternative

> The five ~~three~~ alternatives to the Proposed Project are analyzed below. These analyses compare the Proposed Project and each individual project alternative. In several cases, the description of the impact may be the same under each alternative when compared with the CEQA Thresholds of Significance (i.e., both the Project and the alternative would result in a less than significant impact). The actual degree of impact may be slightly different between the Proposed Project and each alternative, and this relative difference is the basis for a conclusion of greater or lesser impacts.

Page 5-24, Alternative 5 – Existing MRF Access Alternative

In response to comments made on the Draft EIR regarding the MRF access, an additional alternative has been added. Alternative 5 – Existing MRF Access, maintains the MRF's access from Throwita Way and reduces the overall square footage of the retail center. Alternative 5 is not substantially different from the Proposed Project analyzed in the Draft EIR, does not increase any previously identified impacts, eliminates the need for some mitigation required of the Proposed Project, and

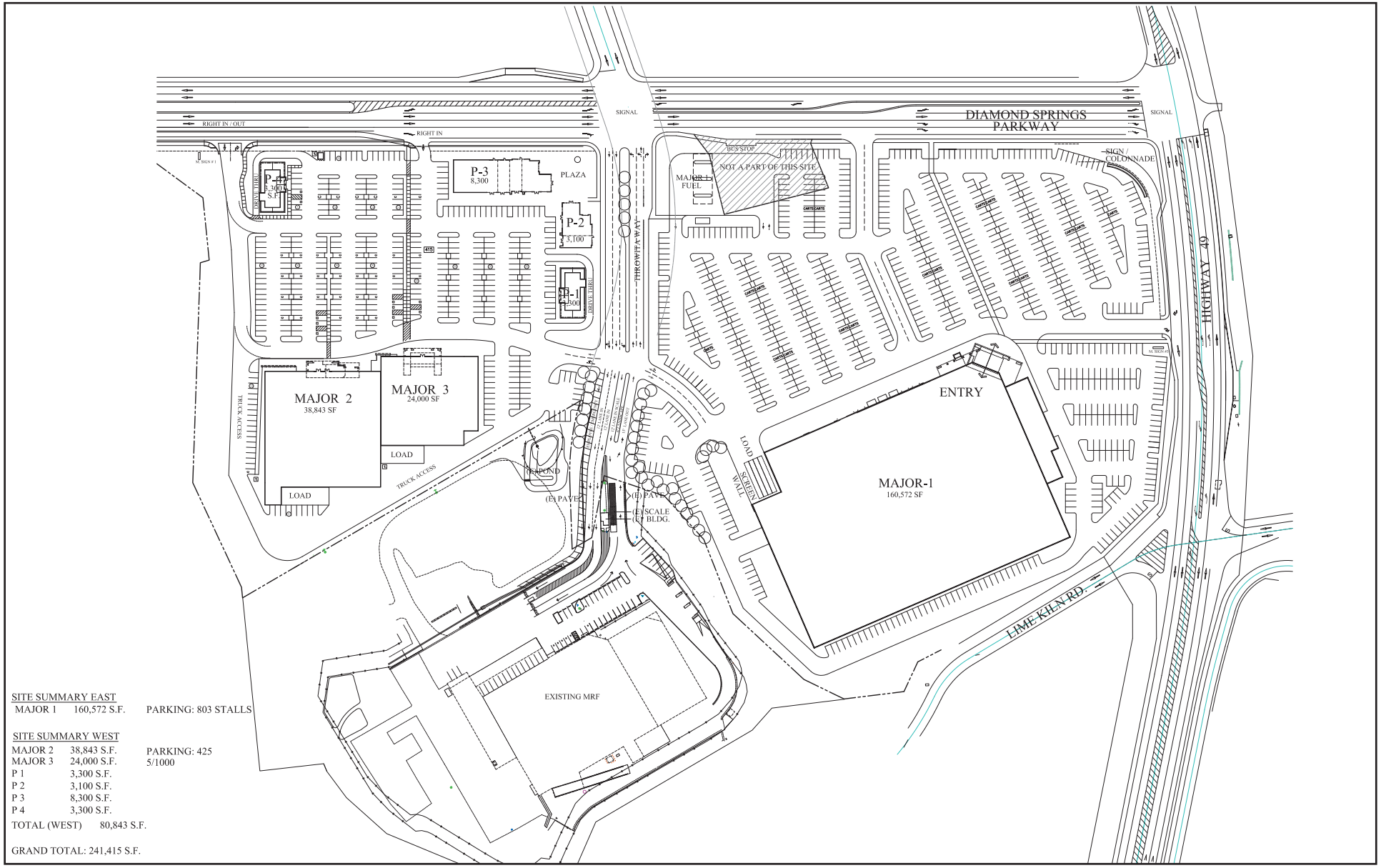
therefore, does not constitute significant new information or result in new significant impacts. Furthermore, the applicant seeks approval of the Project under the Existing MRF Access Alternative. Accordingly, addition of the alternative does not require recirculation.

5.8 - Alternative 5 - Existing MRF Access

As shown in Exhibit 5-1, the Existing MRF Access Alternative maintains the existing MRF entrance on Throwita Way. Throwita Way would be slightly realigned and widened to four lanes. The existing MRF scale and scale house would be maintained, and additional MRF-entry queuing space would be provided via the widening of adjacent portions of Throwita Way. The DDRC would be developed in two distinct portions: the eastern portion, containing a single building of 160,572 square feet, and the western portion, containing seven building pads ranging in area from 3,300 square feet to 38,843 square feet. Table 5-6 provides a summary of the Existing MRF Access Alternative's components compared with the Proposed Project. Similar to Table 3-1 of Section 3, Project Description, Table 5-7 provides a summary of the Proposed Project's building square footage compared with that of this alternative.

Table 5-6: Comparison of Site Plans

Component	Proposed Project	Existing MRF Access Alternative	Difference
Square Footage	280,515	241,415	(-39,100)
Building Pads	9	7	(-2)
Parking Spaces	1,279	1,228	(-51)
Source: Brian Wickert, 2012.			



SITE SUMMARY EAST

MAJOR 1	160,572 S.F.	PARKING: 803 STALLS

SITE SUMMARY WEST

MAJOR 2	38,843 S.F.	PARKING: 425
MAJOR 3	24,000 S.F.	5/1000
P 1	3,300 S.F.	
P 2	3,100 S.F.	
P 3	8,300 S.F.	
P 4	3,300 S.F.	
TOTAL (WEST)	80,843 S.F.	

GRAND TOTAL: 241,415 S.F.

Source: Brian Wickert Architect.

NORTH

Michael Brandman Associates

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Exhibit 5-1
Existing MRF Access Alternative

Table 5-7: Square Footage Summary

Building	Proposed Project	Existing MRF Access Alternative	Difference
	Retail Area (square feet)		
Major 1	160,572	160,572	0
Major 2	38,843	38,843	0
Major 3	—	24,000	24,000
Building P1	21,000	3,300	(-17,700)
Building P2	19,300	3,100	(-16,200)
Building P3	10,000	8,300	(-1,700)
Building P4	3,300	3,300	0
Building P5	2,500	—	(-2,500)
Building P6 (multi-tenant)	13,500	—	(-13,500)
Building P7 (multi-tenant)	11,500	—	(-11,500)
Total	**280,515**	**241,415**	**(-39,100)**

Source: Brian Wickert, 2012.

The Existing MRF Access Alternative's reduced square footage would result in a Floor Area Ratio of 0.20 (241,415 square feet ÷ 27.61 acres [1,202,691.6 square feet]). As a part of this alternative, the Major 1 building has been shifted approximately 100 feet to the west and the loading dock has been relocated from the southern façade of Major 1 to the northwest corner of the building. No buildings would be constructed adjacent to the intersection of DSP and Diamond Road (SR-49), and, as shown on Exhibit 5-1, building locations west of Throwita Way would be reconfigured.

Site Access

Similar to the Proposed Project, the Existing MRF Access Alternative's main entrance would be from one signalized intersection situated along the separately proposed Parkway at its intersection with the existing Throwita Way. The Existing MRF Access Alternative includes two right-in/right-out access points, albeit with slightly shifted locations from that of the Proposed Project, and adds a third right-in-only access point on the Parkway. In addition, two full access driveways forming a four-way intersection on Throwita Way are provided. The right-in/right-out on Diamond Road (SR-49) as included in the Proposed Project is maintained under this alternative. This alternative would not implement the MRF's emergency-only access point as included in the Proposed Project, since sufficient emergency ingress and egress would be provided via the expanded Throwita Way. Refer to Exhibit 5-1 for a depiction of this alternative's access points.

Truck Routes

Truck routes for the Existing MRF Access Alternative would be similar to those of the Proposed Project. However, because of the relocation of the Major 1 loading dock, the truck turning area located adjacent to the southern facade of the Major 1 building has been removed. Unlike the Proposed Project, delivery trucks would not be required to access the rear of Major 1, as all Major 1 deliveries would take place at the loading dock in its location at the northwest corner of Major 1. Accordingly, delivery trucks for Major 1 would enter and exit the site via the intersection of DSP and Throwita Way, negating the need for trucks to travel south of Major 1.

Drainage

Similar to the Proposed Project, the grading and drainage plan for the Existing MRF Access Alternative would include infrastructure facilities to attenuate post-development stormwater levels to pre-development levels. Under this alternative, the MRF's stormwater detention pond may be altered, but its capacity and outflow would be maintained. Furthermore, under this alternative, the project would be approved under a Preliminary Development Plan. As such, a final grading and drainage plans would be provided prior to the approval of the Final Planned Development.

Offsite Roadway Improvements

Similar to the Proposed Project, the Existing MRF Access Alternative would result in the need for offsite roadway improvements. However, under this alternative, overall vehicular trips would be reduced. Offsite roadway mitigation would still be required and, as such, offsite roadway impacts would still occur. Accordingly, offsite roadway improvements for the Proposed Project would also be required for the Existing MRF Access Alternative.

Project Construction, Scheduling and Phasing

Project construction, scheduling, and phasing for the Existing MRF Access Alternative would be substantially similar to that of the Proposed Project; however, the need to reroute the MRF traffic would no longer be needed. Access to the MRF would be maintained on Throwita Way throughout the construction of the DDRC. Lane closures may occur during the realignment and widening of Throwita Way, but coordination with the MRF would ensure that appropriate ingress and egress to the MRF would be provided throughout the construction of the DDRC.

Project Components Remaining Unchanged

Other than the changes outlined above, the Existing MRF Access Alternative would be constructed similar to the Proposed Project. No substantial changes would occur to design features, hours of operation, site perimeter barriers, infrastructure, truck loading, pedestrian and bicycle amenities, water supply, wastewater services, dry utilities, landscaping, lighting,

or signage. The rough grading, site staking, excavation, structural facility construction, paving and striping and electrical, mechanical, and instrumentation installation would be implemented as described for the Proposed Project. Also similar to the Proposed Project, this alternative would implement energy and water efficiency measures.

Project Applications

Similar to the Proposed Project, the Existing MRF Access Alternative would require a General Plan Amendment to Commercial, rezone to General Commercial-Planned Development (CG-PD), a Planned Development (PD) Permit, and a Tentative Parcel Map (TPM). However, this alternative would be approved under a Preliminary Development Plan, whereas the Proposed Project would be approved under a Final Development Plan. Prior to the issuance of building permits Alternative 5's Preliminary Development Plan would be finalized.

Summary

In summary, the Existing MRF Access Alternative maintains the existing MRF access via Throwita Way. To accommodate this, the square footage of the retail center has been reduced. As described above, this alternative would be constructed similar to the Proposed Project, albeit with modifications to account for the preservation of Throwita Way traversing through the site plan, a reduction of 39,100 square feet of building space, the removal of two building pads, and a reduction of 51 parking spaces.

5.8.1 - Impact Analysis

Aesthetics, Light, and Glare

The Proposed Project's visual character impacts would be less than significant with the implementation of mitigation. The Proposed Project's light and glare impacts would be less than significant.

Implementation of the Existing MRF Access Alternative would result in a reduction in square footage, FAR, and number of buildings. However, the overall appearance, architectural theme, design, building heights, signage and landscaping would remain the same.

Because the MRF access would no longer be relocated along Lime Kiln Road, visual character impacts to the adjacent residential property would be reduced in this regard. Nonetheless, because Major 1 has been relocated approximately 100 feet further to the southwest and closer to the adjacent resident on Lime Kiln Road, Mitigation Measure AES-1 shall still be implemented albeit with modifications to account for the removal of the Lime Kiln Road MRF access route. To account for this, the text of Mitigation Measure AES-1 has been updated for this alternative as follows:

MM AES-1 The Project applicant shall complete a final landscaping plan for review and approval by County staff that includes vegetation that appropriately screens views of the Diamond Dorado Retail Center as seen from the residence at the corner of Lime Kiln Road and Lime Plant Road. Screening vegetation shall be located along the project site's boundary to the southwest of Major 1 and be of a type and species that shall provide year-round visual screening.

Light and glare emanating from the Existing MRF Access Alternative would be substantially similar to that of the Proposed Project. As such, aesthetic, light, and glare impacts would be similar but reduced in magnitude and would remain less than significant with the implementation of mitigation as required for the Proposed Project and as revised in this alternative analysis. Because this alternative would result in an overall visual change comparable to that of the Proposed Project, impacts to aesthetics, light, and glare would be similar to those of the Proposed Project.

Air Quality and Greenhouse Gases

The Proposed Project would result in significant unavoidable impacts related to air quality plan consistency, regional air quality impact contribution, greenhouse gas generation, and greenhouse gas plan consistency even after the implementation of mitigation. The Proposed Project's impacts to air quality would be less than significant regarding localized air quality standards, sensitive receptors, and odors.

Implementation of the Existing MRF Access Alternative and its reduction in square footage would result in a reduction of vehicle trip generation and, therefore, would reduce vehicle emissions. The reduction in vehicle emissions would result in fewer operational regional air quality impacts and greenhouse gas generation than the Proposed Project. However, under this alternative, these impacts, as well as air quality plan consistency and greenhouse gas plan consistency, would still require the implementation of Mitigation Measures AIR-3a, AIR-3b, AIR-3c, AIR-3d, AIR-3e, AIR-3f, AIR-7, PSU-3a, PSU-3b, PSU-6a, and PSU-6b. Similar to the Proposed Project, impacts would remain significant and unavoidable even after the implementation of mitigation.

Although implementation of this alternative would reduce overall square footage of buildings, construction and operational emissions affecting localized air quality standards would remain substantially similar to that of the Proposed Project. Similar to the Proposed Project, this alternative's impacts related to localized air quality standard violations would be less than significant and, and no mitigation would be necessary.

The nearest sensitive receptors to the Project site are existing residences located near the southwest corner of the proposed Major 1 building. Implementation of the Existing MRF Access Alternative would include the relocation of the truck loading dock from the southern

facade of Major 1 to the northwest corner, and removal of the truck turning area previously located to the southwest of Major 1. Compared to the Proposed Project, these changes would reduce the potential exposure of nearby residences to toxic air contaminants (TACs) by moving truck traffic emissions further from the receptor. As such, it can be concluded this alternative's impacts related to sensitive receptors would be slightly less than those of the Proposed Project and impacts would remain less than significant.

Similar to the Proposed Project, implementation of the Existing MRF Access Alternative would result in the construction of a retail center adjacent to the MRF. Also similar to the Proposed Project, impacts related to objectionable odors would be less than significant and no mitigation is necessary.

In summary, air quality and greenhouse gas impacts of the Existing MRF Access Alternative would be similar to those of the Proposed Project but reduced in magnitude and would require the implementation of the same mitigation. Also similar to the Proposed Project, air quality impacts would remain significant and unavoidable even after the implementation of mitigation; however, this alternative would lessen the severity of this impact. Therefore, this alternative would have fewer air quality impacts than the Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would not result in significant air quality impacts and no mitigation is necessary. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number of offsite improvements would be reduced; therefore, the less than significant impact would be reduced in magnitude.

Biological Resources

The Proposed Project would result in impacts related to special-status species, protected wetlands, and oak woodland removal that would be less than significant with the implementation of mitigation.

Implementation of the Existing MRF Access Alternative would result in ground disturbance similar to that of the Proposed Project, with the exception of the MRF access realignment area, which would no longer be disturbed. As such, it can be concluded that impacts to biological resources resulting from the implementation of this alternative would be similar to those of the Proposed Project but reduced in magnitude. Similar to the Proposed Project, implementation of Mitigation Measures BIO-1, BIO-2a, BIO-2b, BIO-2c, BIO-3a, BIO-3b, and BIO-3c would be necessary to reduce impacts to a less than significant level. However, as compared to the Proposed Project, ground-disturbing activities would be reduced. Therefore, this alternative would have fewer biological resource impacts than the Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures BIO-1, BIO-3a, BIO-3b, BIO-3c. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number of offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

Cultural Resources

The Proposed Project would result in less than significant impacts related to paleontological resources, geologic features, and human remains. The Proposed Project would result in impacts related to historic and archaeological resources that would be reduced to less than significant with the implementation of mitigation.

Implementation of the Existing MRF Access Alternative would result in ground disturbance similar to that of the Proposed Project, with the exception of the MRF access realignment area, which would no longer be disturbed. As such, it can be concluded that impacts to cultural resources resulting from this alternative would be similar to those of the Proposed Project but reduced in magnitude. Similar to the Proposed Project, implementation of Mitigation Measures CUL-1 and CUL-4 would be necessary to reduce impacts to a less than significant level. However, as compared to the Proposed Project, ground-disturbing activities would be reduced. Therefore, this alternative would have fewer cultural resource impacts than the Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures CUL-1 and CUL-4. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number of offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

Geology, Soils, and Seismicity

The Proposed Project would result in less than significant impacts related to earthquake faults, seismic ground shaking, ground failure/liquefaction, landslides, and expansive soils. The Proposed Project would result in impacts related to soil erosion or topsoil loss and unstable geologic locations that would be reduced to less than significant after the implementation of mitigation.

Implementation of the Existing MRF Access Alternative would result in ground disturbance similar to that of the Proposed Project, with the exception of the MRF access realignment area, which would no longer be disturbed. As such, it can be concluded that impacts related to geology, soils and seismicity would be similar to those of the Proposed Project but reduced in magnitude. Similar to the Proposed Project, implementation of Mitigation Measures HYD-1, GEO-6a, and GEO-6b, would be necessary to reduce impacts to a less than

significant level. However, as compared to the Proposed Project, ground-disturbing activities would be reduced. Therefore, this alternative would have fewer geology, soils, and seismicity impacts than the Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures HYD-1. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number of offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

Hazards and Hazardous Materials

The Proposed Project would result in impacts related to routine use or upset of hazardous materials, past and present site usage, and other hazards that would be reduced to less than significant with the implementation of mitigation. The Proposed Project would result in less than significant impacts related to emergency plan consistency and wildfires and no impact would occur related to hazardous material sites.

Implementation of the Existing MRF Access Alternative would result in ground disturbance similar to that of the Proposed Project, with the exception of the MRF access realignment area, which would no longer be disturbed. In addition, this alternative would result in construction and operation activities similar to those of the Proposed Project albeit at a slightly smaller scale because of the reduction in square footage. As such, it can be concluded that impacts related to hazards and hazardous materials would be the similar to those of the Proposed Project but reduced in magnitude. Similar to the Proposed Project, implementation of Mitigation Measures HYD-1, HAZ3a, HAZ-3b, HAZ-3c, HAZ-3d, and HAZ-6 would be necessary to reduce impacts to a less than significant level. However, as compared to the Proposed Project, ground-disturbing activities would be reduced. Therefore, this alternative would have fewer hazards and hazardous materials impacts than the Proposed Project.

Hydrology and Water Quality

The Proposed Project would result in impacts related to water quality standards and discharge requirements would be less than significant with the implementation of mitigation. The Proposed Project would result in less than significant impacts related to groundwater supplies and recharge, drainage, and drainage capacity.

Implementation of the Existing MRF Access Alternative would result in the construction of impervious surface areas capable of producing stormwater flows similar to that of the Proposed Project. Construction activities potentially affecting water quality would also be substantially similar to those of the Proposed Project. Similar to the Proposed Project, Alternative 5 would include infrastructure facilities to attenuate post-development stormwater

levels to ensure pre-development flows are maintained. Stormwater discharge points and flows would be the same as those for the Proposed Project. However, unlike the Proposed Project, this alternative would require a slightly smaller area of ground disturbance and would construct a slightly smaller amount of impervious surfaces. Nonetheless, similar to the Proposed Project, implementation of Mitigation Measure HYD-1 would be necessary to reduce impacts to a less than significant level. As a part of the implementation of this alternative, the MRF's stormwater detention pond may be altered, but its capacity and outflow would be maintained. Furthermore, under this alternative, the project would be approved under a Preliminary Development Plan. As such, a final grading and drainage plans would be provided prior to the approval of the Final Planned Development. If at that time, drainage impacts are identified beyond those concluded in the this Draft EIR, additional analysis and CEQA documentation would be completed. In summary, this alternative would reduce overall disturbance and impervious surface area, but may result in necessary alterations to the MRF's stormwater detention pond. On balance, it can be concluded that impacts related to hydrology and water quality would be the similar to those of Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures HYD-1. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

Land Use

The Proposed Project would result in less than significant impacts related to the division of an established community, General Plan consistency, Ordinance Code consistency, and Missouri Flat Design Guidelines consistency would be less than significant.

Implementation of the Existing MRF Access Alternative would result in a reduction in square footage, Floor Area Ratio, and number of buildings. This alternative would implement signs, parking, architectural character, pedestrian amenities, and landscaping similar to those of the Proposed Project. Also similar to the Proposed Project, this alternative would require a General Plan Amendment, rezone, Planned Development overlay, and adoption of a Development Plan. Unlike the Proposed Project, this alternative would be approved under a preliminary Development Plan, which would be finalized prior to the issuance of building permits. This difference would not result in any different environmental impacts from those concluded for the Proposed Project.

Accordingly, the Existing MRF Access Alternative would be consistent with applicable policies, regulations, or standards as outlined in the General Plan, Ordinance Code, and Missouri Flat Design Guidelines. In addition, this alternative would not result in any changes

that would result in the division of an established community. As such, it can be concluded that impacts related to land use would be the substantially similar to those of the Proposed Project and no mitigation is necessary.

Noise

The Proposed Project would result in impacts related to the exceedance of noise standards, increase in ambient noise, and temporary or periodic increase in ambient noise that would be less than significant with the implementation of mitigation. These impacts were specific to residences adjacent to the formerly proposed MRF access route off Lime Kiln Road. The Proposed Project's impacts related to groundborne vibrations would be less than significant and no mitigation would be required.

Implementation of the Existing MRF Access Alternative's reduction in square footage would result in a reduction of vehicle trip generation, and therefore, would reduce associated vehicle noise. Because this alternative maintains the MRF access point at Throwita Way, potential noise impacts resulting from the Proposed Project's Lime Kiln Road MRF access route would be eliminated. Furthermore, this alternative's relocation of the Major 1 building's loading dock from the southwest to the northwest corner of the building would relocate a substantial source of noise away from the sensitive receptor. All other noise-producing features of this alternative would remain similar to those of the Proposed Project.

Bollard Acoustical Consultants (BAC) prepared an Environmental Noise Assessment for the Proposed Project, which was used to determine the noise impacts. Similarly, BAC provided an assessment of the Existing MRF Access Alternative.[1] As indicated by BAC, all noise impacts would be reduced or eliminated under implementation of the Existing MRF Access Alternative. Below is a summary of each potentially significant impact concluded for the Proposed Project and changes that would result from the implementation of the Existing MRF Access Alternative.

Exceedance of Noise Standards: Onsite Operational Noise

The Proposed Project would result in noise related to onsite truck circulation and the Major 1 loading dock that would exceed noise standards at the adjacent residence; therefore, the implementation of Mitigation Measure NOI-1 was required. However, implementation of the Existing MRF Access Alternative would eliminate this impact, because the Major 1 loading dock would be relocated to the northwest corner of the building, substantially increasing its distance from the affected residence. Because of this relocation, onsite truck traffic would be able to enter and exit the loading dock area from Throwita Way, negating the need for truck traffic to traverse south of Major 1 near the affected residence. The Existing MRF Access Alternative would also eliminate the truck-turning area directly adjacent to the affected

[1] Bollard, Paul. President, Bollard Acoustical Consulting, Inc. (BAC). Personal communication: telephone. May 17, 2012.

residence. As such, under this alternative, the onsite operational noise impacts related to truck circulation and the Major 1 loading dock would not occur and Mitigation Measure NOI-1 would not be needed. Accordingly, this impact would have fewer onsite noise standard impacts compared to the Proposed Project.

Exceedance of Noise Standards: Offsite Operational Noise

The Proposed Project would result in noise related to offsite traffic on Lime Kiln Road between Diamond Road (SR-49) and the Proposed Project's Lime Kiln Road MRF access point that would exceed acceptable standards; therefore, the implementation of Mitigation Measure NOI-1 was required. However, the Existing MRF Access Alternative would eliminate this impact, because MRF traffic would no longer be routed along Lime Kiln Road or along the Proposed Project's Lime Kiln Road MRF access route. As such, under this alternative, the operation noise impact related to offsite traffic would not occur and Mitigation Measure NOI-1 would no longer be needed. Accordingly, this impact would have fewer offsite noise standard impacts compared to the Proposed Project.

Permanent Increase in Ambient Noise Levels

The Proposed Project would result in long-term impacts from both on- and off-site operational noises. These impacts are a result of the Major 1 loading dock, onsite truck routes, and offsite MRF traffic causing a permanent increase in ambient noise levels; therefore, implementation of Mitigation Measure NOI-1 was required. However, as previously discussed, implementation of the Existing MRF Access Alternative would eliminate these impacts because the Major 1 loading dock would be relocated and MRF traffic would not be routed along Lime Kiln Road or the Proposed Project's Lime Kiln Road MRF access route. As such, under this alternative, impacts related to the permanent increase in ambient noise levels would not occur and Mitigation Measure NOI-1 would not be needed. Accordingly, this impact would have fewer permanent ambient noise level impacts compared to the Proposed Project.

Temporary or Periodic Increases in Ambient Noise Levels

The Proposed Project's parking lot sweeping activities would result in temporary or periodic increases in ambient noise levels above established standards and would require the implementation of Mitigation Measure NOI-1. However, as previously discussed, the Existing MRF Access Alternative does not include the relocation of the MRF access along Lime Kiln Road, thereby eliminating the need for Mitigation Measure NOI-1. Noise from sweeper trucks was determined to exceed the applicable evening and nighttime noise exposure criteria. Since Mitigation Measure NOI-1 is no longer needed, it would not provide the added benefit of eliminating impacts from evening or nighttime parking lot sweeping. Accordingly, as a condition of approval of this alternative, parking lot sweeping conducted by sweeper trucks would only be allowed during daytime hours (7 a.m. to 7 p.m.). As such,

impacts related to temporary or periodic increases in ambient noise levels related to sweeper trucks would be less than significant under this alternative.

The Proposed Project's construction noise would result in temporary or periodic increases in ambient noise levels above established standards and would require the implementation of Mitigation Measure NOI-4a. Because implementation of the Existing MRF Access Alternative would result in similar construction activities, albeit without the construction of the relocated MRF access route, this potentially significant impact would still occur. Accordingly, Mitigation Measure NOI-4a, requiring a temporary noise barrier, would still be required but with modifications to account for removal of the relocated MRF access route and subsequent elimination of the need for Mitigation Measure NOI-1. The text of Mitigation Measure NOI-4a has been updated for this alternative as follows:

MM NOI-4a Prior to start of construction the Project applicant shall retain a qualified noise consultant to design an appropriate temporary noise barrier to be constructed along the northern property line of APN 054-341-04 that is shared with the Project applicant's adjoining property. The temporary noise barrier shall remain in place until all construction activities have been completed. The design shall be submitted to El Dorado County Planning Services for review and shall be implemented by the Project applicant or its contractors. Within the first week of the start of project construction, noise monitoring shall be conducted by a qualified noise consultant to determine if the temporary noise barrier is providing appropriate noise attenuation. If the appropriate level of noise attenuation is not being provided by the temporary noise barrier, it shall be revised and/or augmented to achieve the required noise attenuation as recommended by the qualified noise consultant. This temporary barrier shall remain in place until all construction activities have been completed or until a qualified noise consultant indicates that any possible further construction activities would not result in noise levels exceeding standards as outlined by El Dorado County.

In summary, this alternative would generate less onsite operational and offsite vehicular noise than the Proposed Project and, therefore, would have fewer noise impacts compared to the Proposed Project.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures NOI-4b. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

Public Services and Utilities

The Proposed Project's impacts related to fire protection, police protection, potable water, and solid waste would be less than significant with the implementation of mitigation. The Proposed Project's impacts related to wastewater, storm drainage, and energy would be less than significant.

Implementation of the Existing MRF Access Alternative would result in a retail center similar to that of the Proposed Project, but with reduced square footage to accommodate the existing MRF access. Consequently, this alternative's need for public services and utilities would be reduced (for example, reduced water consumption, reduced wastewater production) as compared to the Proposed Project. As such, it can be concluded that impacts to public services and utilities resulting from this alternative would be the similar to those of the Proposed Project but reduced in magnitude. Similar to the Proposed Project, implementation of Mitigation Measures PSU-1a, PSU-1b, PSU-2a, PSU-3a, PSU-3b, PSU-6a, and PSU-6b would be necessary to reduce impacts to a less than significant level. However, because service and utility demands would be reduced, this alternative would have fewer impacts on public services and utilities than the proposed project.

Transportation

The Proposed Project would result in impacts related to intersections, roadway segments, and queuing under the Cumulative (2025) conditions that would be significant and unavoidable after the implementation of mitigation. The Proposed Project would result in impacts related to intersection and roadway segments under the Existing Plus Approved Projects (2015) Plus Proposed Project conditions; safety and road hazards; and construction traffic, staging and parking, that would be less than significant with the implementation of mitigation. The Proposed Project would result in impacts related to freeway and ramp conditions under the Existing Plus Approved Projects (2015) Plus Proposed Project conditions and Cumulative (2025) conditions—as well as impacts related to emergency access, parking, and alternative transportation—that would be less than significant.

Implementation of the Existing MRF Access Alternative would result in a retail center similar to that of the Proposed Project, albeit with a reduced square footage and the retention of the existing Throwita Way MRF access point. The reduced square footage would result in a reduced generation of vehicle trips. The retention of the existing MRF access point eliminates the need for MRF traffic to utilize Lime Kiln Road. All other traffic and transportation related features, including road safety measures, construction traffic, staging, and parking, and alternative transportation, would remain similar to that of the Proposed Project.

Kimley-Horn and Associates (KHA) prepared the traffic analysis information for the DDRC, which was used to determine the traffic impacts as concluded for the Proposed Project.

Accordingly, KHA provided an assessment of traffic impacts that would result from the implementation of the Existing MRF Access Alternative. KHA's analysis of the Existing MRF Access Alternative is summarized herein and provided in Appendix L.

As previously noted, the Proposed Project would result in less than significant impacts related to freeway and ramp conditions in the Existing Plus Approved Projects (2015) Plus Proposed Project and the Cumulative (2025) Plus Proposed Project conditions, as well as impacts related to emergency access, parking, and alternative transportation. Implementation of the Existing MRF Access Alternative would not alter these conclusions; therefore, these topics are not discussed further.

The Proposed Project would result in potentially significant impacts requiring mitigation, some of which remained significant and unavoidable after the implementation of mitigation. Below is a summary of each potentially significant impact and changes that would result from implementation of the Existing MRF Access Alternative.

Existing Plus Approved Projects (2015) Plus Proposed Project Intersection and Roadway Conditions

The Proposed Project would result in potentially significant impacts under the Existing Plus Approved Projects (2015) Plus Proposed Project conditions at the following three intersections and two roadway segments:

- Intersection 19 – Pleasant Valley Road (SR-49) and Forni Road
- Intersection 20 – Pleasant Valley Road (SR-49) and Patterson Road
- Intersection 21 – Pleasant Valley Road (SR-49) and SR-49 (South)
- Segment 5 – Diamond Road (SR-49): Diamond Springs Parkway to Lime Kiln Road
- Segment 7 – Diamond Springs Parkway: Missouri Flat Road to Throwita Way

As indicated by the analysis prepared by KHA, the implementation of the Existing MRF Access Alternative would result in the reduction of average delay at eight of the 13 study intersections and reduction of segment volume at seven of the eight study segments compared with the original traffic impact analysis for the Proposed Project. However, these reductions would not eliminate the potentially significant impacts at the intersections and segments identified above. Accordingly, the Existing MRF Access Alternative would result in impacts that would be similar but reduced in magnitude at the same intersections and roadway segments as the Proposed Project. Similarly, implementation of Mitigation Measures TRANS-1a, TRANS-1b, TRANS-1c, TRANS-1d, and TRANs-1e would be required to reduce impacts to a less than significant level. Overall, the impacts resulting from implementation of this alternative would be fewer than the Proposed Project, but would still require the implementation of mitigation. The traffic analysis of the Existing MRF Access Alternative, including data supporting this conclusion, can be found in Appendix L.

Cumulative (2025) Plus Project Intersection and Roadway Conditions

The Proposed Project would result in potentially significant impacts under the Cumulative (2025) Plus Project Intersection and Roadway conditions at the following nine intersections and four roadway segments:

- Intersection 4 – Missouri Flat Road/Mother Lode Drive
- Intersection 5 – Missouri Flat Road and Forni Road
- Intersection 12 – Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road
- Intersection 19 – Pleasant Valley Road (SR-49) and Forni Road
- Intersection 20 – Pleasant Valley Road (SR-49) and Patterson Road
- Intersection 21 – Pleasant Valley Road (SR-49) and SR-49 (South)
- Intersection 23 – Ponderosa Road and US-50 Eastbound Ramps
- Intersection 28 – Missouri Flat Road and Enterprise Drive
- Intersection 29 – Missouri Flat Road and China Garden Road
- Segment 5 – Diamond Road (SR-49): Diamond Springs Parkway to Lime Kiln Road
- Segment 6 – Diamond Road (SR-49): Lime Kiln Road to Pleasant Valley Road (SR-49)
- Segment 7 – Diamond Springs Parkway: Missouri Flat Road to Throwita Way
- Segment 8 – Diamond Springs Parkway: Throwita Way to Diamond Road (SR-49)

As indicated by the analysis prepared by KHA, the implementation of the Existing MRF Access Alternative would result in the reduction of average delay at eight of the 13 study intersections and reduction of segment volume at seven of the eight study segments compared with the original traffic impact analysis for the Proposed Project. Implementation of the Existing MRF Access Alternative would result in the elimination of the following impacts of the Proposed Project and the addition of a single mitigation measure for Intersection 15:

Intersection 12 – Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road

With the implementation of the Existing MRF Access Alternative, impacts to Intersection 12, Diamond Road (SR-49)/Lime Kiln Road/Black Rice Road would be eliminated. The LOS at Intersection 12 would remain at the acceptable LOS E, which meets the acceptable LOS standards as established by El Dorado General Plan Policy TC-Xd and impacts would be less than significant. As such, implementation of Mitigation Measure TRANS-3c would not be needed under the Existing MRF Access Alternative.

Segment 8: Diamond Springs Parkway: Throwita Way to Diamond Road (SR-49)

With the implementation of the Existing MRF Access Alternative, impacts to Roadway Segment 8, Diamond Springs Parkway from Throwita Way to Diamond Road (SR-49) would be eliminated. The LOS at Roadway Segment 8 would remain at LOS E, with the addition of only 18 trips at the PM peak hour, which is within the acceptable thresholds as outlined by El Dorado County General Plan Policy TC-Xd. As such, implementation Mitigation Measure TRANS-3i would no longer be needed.

Intersection 15 – Pleasant Valley Road (SR-49) and China Garden Road

With the implementation of the Existing MRF Access Alternative, impacts to Intersection 15 – Pleasant Valley Road (SR-49) and China Garden Road, would occur under the Cumulative (2025) Plus Project conditions. This impact would not occur under implementation of the Proposed Project and is therefore not included in the bulleted list above. However, this impact and mitigation was originally identified in the original Traffic Impact Analysis[2] completed for the Proposed Project and included in Appendix L. Accordingly, the following mitigation, reflected in the original Traffic Impact Analysis, would be required:

MM TRANS-3j Prior to the issuance of building permits, the Project applicant, at the discretion of El Dorado County, pursuant to General Play Policy TC-Xg and TC-Xf, and upon approval from Caltrans, shall be responsible for the addition of a 50-foot southbound right-turn lane at the intersection of Pleasant Valley Road (SR-49) and China Garden Road. The improvement shall be completed to the satisfaction of the El Dorado County Department of Transportation and Caltrans in one of the following ways:

- Construct the needed road improvements:
- If the needed improvements are not yet constructed, and should the County include the needed improvements for the Project within a 20-year Capital Improvement Program project, payment of the Traffic Impact Mitigation fees to El Dorado County will constitute the fair-share fees for the needed mitigation improvements; or,
- If the needed improvements are already constructed by the El Dorado County Department of Transportation as part of the 20-year Capital Improvement Program, payment of the Traffic Impact Mitigation fees to the County will constitute the fair-share fees for the needed mitigation improvements.

In summary, implementation of the Existing MRF Access Alternative would result in potentially significant impacts under the Cumulative (2025) Plus Project Intersection and Roadway conditions at the nine intersections and three roadway segments. Similar to the Proposed Project, implementation of Mitigation Measures TRANS-1a, TRANS-1b, TRANS-1d, TRANS-1e, TRANS-3a TRANS-3b, TRANS-3e, TRANS-3f, TRANS-3g, and TRANS-3h would be required to reduce impacts to less than significant. Mitigation Measure TRANS-3c and TRANS-3i would no longer be needed. In addition, implementation of Mitigation Measure TRANS-3j (above) as reflected in the original Traffic Impact Analysis

[2] Kimley-Horn and Associates, Inc. 2010. Traffic Impact Analysis for the Diamond Dorado Retail Center (WO#14) El Dorado County, California. July 21.

would be required to reduce impacts to a less than significant level at Intersection 15 – Pleasant Valley Road (SR-49) and China Garden Road. Similar to the Proposed Project, the significant unavoidable impact at Intersection 28 – Missouri Flat Road and Enterprise Drive would remain, and no feasible mitigation is available to reduce impacts to a less than significant level. Overall, the cumulative traffic impacts resulting from implementation of the Existing MRF Access Alternative would be fewer than those of the Proposed Project as two mitigation measures required of the Proposed Project would not be required; however, this alternative would still require the implementation of mitigation to reduce impacts and the significant unavoidable impact would remain. The traffic analysis of the Existing MRF Access Alternative, including data supporting this conclusion, can be found in Appendix L.

Queuing

The Proposed Project would result in potentially significant queuing impacts at the following six locations:

- Missouri Flat Road/Westbound US-50 Ramps – Westbound left.
- Missouri Flat Road/Westbound US-50 Ramps – Northbound left.
- Missouri Flat Road/Eastbound US-50 Ramps – Eastbound right.
- Missouri Flat Road/Eastbound US-50 Ramps – Southbound left.
- Diamond Springs Parkway/Missouri Flat Road – Westbound left and northbound left
- Diamond Springs Parkway/Throwita Way – Eastbound left and westbound left
- Diamond Springs Parkway/Diamond Road (SR-49) – Northbound left
- Diamond Road (SR-49)/Pleasant Valley Road – Eastbound left
- Pleasant Valley Road (SR-49)/Forni Road – Eastbound left
- Pleasant Valley Road (SR-49)/SR-49 (South) – Westbound left

As indicated by the analysis prepared by KHA, the implementation of the Existing MRF Access Alternative would result in similar but reduced impacts to those concluded for the Proposed Project:

Diamond Springs Parkway/Diamond Road (SR-49) – Northbound Left

With the implementation of the Existing MRF Access Alternative, impacts to the northbound left turn queue at the Diamond Springs Parkway/Diamond Road (SR-49) intersection would not occur. Because the northbound left-turn lane configuration from Diamond Road (SR-49) to DSP consists of a single storage pocket (350 feet in length) as well as a left-turn lane the length of the roadway segment, the expected vehicle queuing lengths can be reasonably expected to be contained within the capacity provided by these lanes. As such, implementation of Mitigation Measure TRANS-5d is not needed for the Existing MRF Access Alternative.

Diamond Road (SR-49)/Pleasant Valley Road – Eastbound left

With the implementation of the Existing MRF Access Alternative, impacts to the eastbound left-turn queue at the Diamond Road (SR-49)/Pleasant Valley Road intersection would not occur. The eastbound left-turn queue is anticipated to exceed the available storage by 92 feet under the Cumulative (2025) Plus Proposed Project conditions. Because storage is measured to the back of striping delineation, it is presumed that the additional 92 feet required can be accommodated within the existing turn pocket bay taper without adversely affecting adjacent traffic flow. Furthermore, if the left-turn queue does spill out of the left-turn pocket and taper, the existing roadway width is approximately 20 feet plus a shoulder at the beginning of the taper. This large eastbound lane width would provide the space for vehicles to queue on the left side of the lane, while the eastbound through vehicles would be provided space to reasonably bypass the queue. As such, implementation of Mitigation Measure TRANS 5e is not needed for the Existing MRF Access Alternative.

In summary, implementation of the Existing MRF Access Alternative would result in fewer potentially significant queuing impacts compared to the Proposed Project. Mitigation Measures TRANS-5d, and TRANS-5e as required for the Proposed Project would not be needed for this alternative. Implementation of Mitigation Measures TRANS-3a, TRANS-5b, TRANS-5c, and TRANS-5f as required for the Proposed Project would still be required for this alternative. Overall, the queuing impacts resulting from implementation of this alternative would be fewer compared with those of the Proposed Project, but would still require the implementation of mitigation.

The traffic analysis of the Existing MRF Access Alternative, including data supporting this conclusion, can be found in Appendix L.

Safety and Road Hazards

The Proposed Project would result in impacts related to safety and road hazards that would be less than significant with the implementation of mitigation.

Implementation of the Existing MRF Access Alternative would result in a retail center similar to that of the Proposed Project but with the retention of the MRF Throwita Way entry point. Similar to the Proposed Project, the Existing MRF Access Alternative would result in less than significant impacts related to internal circulation, truck access, and roadway safety, and no mitigation would be required.

The Proposed Project may result in impacts from the potential for onsite vehicle queuing to extend to Diamond Spring Parkway from the Project's main entrance at Throwita Way. The Proposed Project would also result in potential pedestrian/vehicle conflicts as a result of onsite pedestrian movement across the main site entrance.

Implementation of the Existing MRF Access Alternative would reconfigure the site's main access point to maintain and widen Throwita Way to a four-lane roadway with turn lanes. Access to the DDRC from Throwita Way would be via a full-access intersection on Throwita Way, between the Diamond Springs Parkway and the entrance to the MRF. While Throwita Way would be widened, and additional queuing space would be provided for the MRF, the potential for queuing and pedestrian impacts would still occur, similar to that of the Proposed Project. Accordingly, Mitigation Measure TRANS-6 would still be required for this alternative, but with modifications to account for the retention of Throwita Way and the modified site access. The text of Mitigation Measure TRANS-6 has been updated for this alternative as follows:

MM TRANS-6 Prior to approval of Improvement Plans and in conjunction with the Project's approved traffic study, the Project applicant shall consult with a qualified traffic engineer to identify and implement measures to reduce potential queuing and pedestrian conflicts at the project site's main access points on Throwita Way. The potential measures may include but are not limited to, provision of stop signs for DDRC exit points on Throwita Way,–and proper identification of crosswalks. Any measures implemented as a result of this mitigation shall not cause traffic queuing on Throwita Way to back up onto Diamond Springs Parkway. No stop sign shall be allowed on the southbound leg of Throwita Way prior to the MRF entrance.

Construction Traffic, Staging, and Parking

The Proposed Project would result in impacts related to construction traffic, staging, and parking that would be less than significant with the implementation of mitigation.

Implementation of the Existing MRF Access Alternative would not require the relocation of the MRF access point to Lime Kiln Road but would result in similar construction traffic, staging, and parking needs. As such, it can be concluded that impacts related to construct traffic, staging, parking would be similar to those of the Proposed Project. Similarly, implementation of Mitigation Measure TRANS-9, as required of the Proposed Project, would be necessary to reduce this alternative's impacts to a less than significant level.

Offsite Improvements

The Proposed Project's offsite improvements would require the implementation of Mitigation Measures TRANS-9. Implementation of the Existing MRF Access Alternative would not alter this conclusion. However, it is noted that the number offsite improvements would be reduced; therefore, the impact would be reduced in magnitude.

5.8.2 – Conclusion

Impacts resulting from the implementation of the Existing MRF Access Alternative would be similar to those of the Proposed Project for Aesthetics, Light and Glare; Hydrology and Water Quality; and Land use. Impacts of this alternative would be fewer with regards to Air Quality and Greenhouse Gases; Biological Resources; Cultural Resources; Geology, Soils, and Seismicity; Hazards and Hazardous Materials; Noise; Public Services and Utilities; and, Transportation. Impacts related to Noise and Traffic would be reduced in magnitude to the point that Mitigation Measure NOI-1, TRANS-3c, TRANS-3i, TRANS-5d, and TRANS-5e would no longer be needed. However, implementation of Mitigation Measure TRANS-3j would be added. Similar to the Proposed Project, the significant unavoidable transportation impact at the intersection of Missouri Flat Road and Enterprise Drive would occur under this alternative. Table 5-8 provides a summary of the changes to mitigation needed for the Existing MRF Access Alternative compared to the Proposed Project.

Table 5-8: Summary of Mitigation Changes

Impact	Mitigation Required	
	Proposed Project	Alternative 5: Existing MRF Access
AES-1	AES-1	AES-1 (as modified for alternative)
AES-2	No mitigation necessary	No mitigation necessary
AIR-1	AIR-3a	AIR-3a
	AIR-3b	AIR-3b
	AIR-3c	AIR-3c
	AIR-3d	AIR-3d
AIR-2	No mitigation necessary	No mitigation necessary
AIR-3	AIR-3a	AIR-3a
	AIR-3b	AIR-3b
	AIR-3c	AIR-3c
	AIR-3d	AIR-3d
	AIR-3e	AIR-3e
	AIR-3f	AIR-3f
AIR-4	No mitigation necessary	No mitigation necessary
AIR-5	No mitigation necessary	No mitigation necessary
AIR-6	PSU-3a	PSU-3a
	PSU-3b	PSU-3b
	PSU-6a	PSU-6a
	PSU-6b	PSU-6b

Table 5-8 (cont.): Summary of Mitigation Changes

Impact	Mitigation Required	
	Proposed Project	Alternative 5: Existing MRF Access
AIR-6 (*cont.*)	AIR-3b	AIR-3b
	AIR-3c	AIR-3c
	AIR-3d	AIR-3d
AIR-7	AIR-7	AIR-7
	AIR-3d	AIR-3d
	PSU-3a	PSU-3a
	PSU-3b	PSU-3b
	PSU-6a	PSU-6a
	PSU-6b	PSU-6b
BIO-1	BIO-1	BIO-1
BIO-2	BIO-2a	BIO-2a
	BIO-2b	BIO-2b
	BIO-2c	BIO-2c
BIO-3	BIO-3a	BIO-3a
	BIO-3b	BIO-3b
	BIO-3c	BIO-3c
CUL-1	CUL-1	CUL-1
CUL-2	CUL-1	CUL-1
CUL-3	No mitigation necessary	No mitigation necessary
CUL-4	CUL-4	CUL-4
GEO-1	No mitigation necessary	No mitigation necessary
GEO-2	No mitigation necessary	No mitigation necessary
GEO-3	No mitigation necessary	No mitigation necessary
GEO-4	No mitigation necessary	No mitigation necessary
GEO-5	HYD-1	HYD-1
GEO-6	GEO-6a	GEO-6a
	GEO-6b	GEO-6b
GEO-7	No mitigation necessary	No mitigation necessary
HAZ-1	HYD-1	HYD-1
HAZ-2	No mitigation necessary	No mitigation necessary
HAZ-3	HAZ-3a	HAZ-3a
	HAZ-3b	HAZ-3b

Table 5-8 (cont.): Summary of Mitigation Changes

Impact	Mitigation Required	
	Proposed Project	Alternative 5: Existing MRF Access
	HAZ-3c	HAZ-3c
	HAZ-3d	HAZ-3d
	HYD-1	HYD-1
HAZ-4	No mitigation necessary	No mitigation necessary
HAZ-5	No mitigation necessary	No mitigation necessary
HAZ-6	HAZ-6	HAZ-6
HYD-1	HYD-1	HYD-1
HYD-2	No mitigation necessary	No mitigation necessary
HYD-3	No mitigation necessary	No mitigation necessary
HYD-4	No mitigation necessary	No mitigation necessary
HYD-5	HYD-1	HYD-1
LU-1	No mitigation necessary	No mitigation necessary
LU-2	No mitigation necessary	No mitigation necessary
LU-3	No mitigation necessary	No mitigation necessary
LU-4	No mitigation necessary	No mitigation necessary
NOI-1	NOI-1	Mitigation no longer necessary.
NOI-2	No mitigation necessary	No mitigation necessary
NOI-3	NOI-1	Mitigation no longer necessary.
NOI-4	NOI-4a	NOI-4a (as modified for alternative)
	NOI-4b	NOI-4b
PSU-1	PSU-1a	PSU-1a
	PSU-1b	PSU-1b
PSU-2	PSU-2	PSU-2
PSU-3	PSU-3a	PSU-3a
	PSU-3b	PSU-3b
PSU-4	No mitigation necessary	No mitigation necessary
PSU-5	No mitigation necessary	No mitigation necessary
PSU-6	PSU-6a	PSU-6a
	PSU-6b	PSU-6b
PSU-7	No mitigation necessary	No mitigation necessary
TRANS-1	TRANS-1a	TRANS-1a
	TRANS-1b	TRANS-1b

Table 5-8 (cont.): Summary of Mitigation Changes

Impact	Mitigation Required	
	Proposed Project	Alternative 5: Existing MRF Access
	TRANS-1c	TRANS-1c
	TRANS-1d	TRANS-1d
	TRANS-1e	TRANS-1e
TRANS-2	No mitigation necessary	No mitigation necessary
TRANS-3	TRANS-1a	TRANS-1a
	TRANS-1b	TRANS-1b
	TRANS-1d	TRANS-1d
	TRANS-1e	TRANS-1e
	TRANS-3a	TRANS-3a
	TRANS-3b	TRANS-3b
	TRANS-3c	No longer needed
	TRANS-3e	TRANS-3e
	TRANS-3f	TRANS-3f
	TRANS-3g	TRANS-3g
	TRANS-3h	TRANS-3h
	TRANS-3i	No longer needed
	—	TRANS-3j
TRANS-5	TRANS-3a	TRANS-3a
	TRANS-5b	TRANS-5b
	TRANS-5c	TRANS-5c
	TRANS-5d	No longer needed
	TRANS-5e	No longer needed
	TRANS-5f	TRANS-5f
TRANS-6	TRANS-6	TRANS-6 (as modified for alternative)
TRANS-7	No mitigation necessary	No mitigation necessary
TRANS-8	No mitigation necessary	No mitigation necessary
TRANS-9	MM TRANS-9	MM TRANS-9
TRANS-10	No mitigation necessary	No mitigation necessary
Source: MBA, 2012.		

The Existing MRF Access Alternative would not further all project objectives to the same degree as the Proposed Project, because it would result in a smaller amount of retail space and provide fewer employment opportunities. However, this alternative would result in the reduction of traffic and noise related impacts and would accommodate the existing MRF access point on Throwita Way, which is preferable compared to the Proposed Project. In conclusion, implementation of the Existing MRF Access Alternative would reduce, and in some cases eliminate, impacts related to the Proposed Project.

Page 5-25, Table 5-8

Table 5-8, Alternatives Impact Comparison Summary, has been revised to reflect the addition of Alternative 5: Existing MRF Access.

Table 5-8: Alternatives Impact Comparison Summary

Environmental Topic Area	No Project Alternative	Industrial Alternative	Reduced Density Alternative	Mixed-Use Center Alternative	Existing MRF Access
Aesthetics, Light, and Glare	Fewer -1	Similar 0	Similar 0	Similar 0	Similar 0
Air Quality	Fewer -1	Fewer -1	Fewer -1	Fewer -1	Fewer -1
Biological Resources	Fewer -1	Similar 0	Similar 0	Fewer -1	Fewer -1
Cultural Resources	Fewer -1	Similar 0	Similar 0	Similar 0	Fewer -1
Geology, Soils, and Seismicity	Fewer -1	Similar 0	Similar 0	Similar 0	Fewer -1
Hazards and Hazardous Materials	Fewer -1	Greater +1	Similar 0	Fewer -1	Fewer -1
Hydrology and Water Quality	Fewer -1	Greater +1	Similar 0	Similar 0	Similar 0
Land Use	Fewer -1	Fewer -1	Similar 0	Greater +1	Similar 0
Noise	Fewer -1	Fewer -1	Fewer -1	Greater +1	Fewer -1
Public Services and Utilities	Fewer -1	Greater +1	Fewer -1	Greater +1	Fewer -1
Transportation	Fewer -1	Fewer -1	Fewer -1	Fewer -1	Fewer -1
Score	**-11**	**-1**	**-4**	**-1**	**-8**
Source: MBA, 2010.					

Page 5-25, Last Paragraph

The last paragraph on page 5-25 has been updated to reflect the addition of Alternative 5, Existing MRF Access, and its status as the environmentally superior alternative. In addition, a typographical error has been corrected.

> Section 15126(d)(2) of the CEQA Guidelines states, "if the environmentally superior alternative is the "no project" alternative, the EIR shall also identify an environmentally superior alternative among the other alternatives." Accordingly, the Existing MRF Access Alternative ~~Reduced Density Alternative~~ would be the environmentally superior alternative among the other alternatives because it would result in eight fewer impacts and no greater impacts than the Proposed Project. The Existing MRF Access Alternative ~~Reduced Density Alternative~~ would not further all of the project objectives to the same degree as the Proposed Project. For example, the smaller square footage would create fewer job opportunities for local residents and would result in fewer sales; therefore, it would have less positive economic benefit.

SECTION 6: OTHER CEQA REQUIRED SECTIONS

Page 6-2, Queuing (Impact TRANS-5)

As a result of revisions to Mitigation Measure TRANS-3a, the significant unavoidable impact at the southbound left-turn lane from the Missouri Flat Road/Eastbound US 50 Ramp intersection would no longer occur.

- ~~Queuing (Impact TRANS-5). The Proposed Project would result in unacceptable queuing at the Missouri Flat Road/Eastbound US-50 ramp and Missouri Flat Road/Westbound US-50 ramp intersections. Mitigation is proposed; however, minor queuing issues would remain at the southbound left turn lane from the Missouri Flat Road/Eastbound US 50 Ramp intersection. No acceptable mitigation is available to resolve the remaining queuing issue. Therefore, the residual significance would be significant and unavoidable.~~

Page 6-10, Paragraph 2

The cumulative impact analysis for biological resources has been updated to properly reflect revisions to Impact BIO-3 and Mitigation Measure BIO-3a.

> Development projects in the project vicinity may result in oak tree removal activities that would be subject to the County's General Plan Policy 7.4.4.4.~~Oak Woodland Management Plan (OWMP).~~ These projects would be required to comply with General Play Policy 7.4.4.4 as applicable, including onsite replanting and replacement. The Proposed Project would

remove portions of the existing onsite oak woodland canopy. Mitigation is proposed requiring that Project will not be constructed until the County adopts an offsite oak tree mitigation program that the Project will comply with or, alternatively, would require that the Project be redesigned to accommodate onsite retention as required by General Play Policy 7.4.4.4.~~the project applicant to comply with the OWMP.~~ Therefore, the Proposed Project, in conjunction with other projects in the vicinity would not have cumulatively considerable conflicts with local biological ordinances and policies.

Page 6-19, Paragraph 4

The Draft EIR incorrectly states on page 6-19 that all transportation impacts resulting from the Proposed Project would be fully mitigated to a level of less than significant. The Draft EIR concludes that one significant and unavoidable impacts related to LOS would occur as a result of the Proposed Project. As such, the text on page 6-19 has been updated to properly reflect this conclusion. Note that this text update does not change the conclusions regarding the Proposed Project's significant and unavoidable impacts.

Planned and approved development projects listed in Table 6-1 and Table 6-2 would generate new vehicle trips that may trigger or contribute to unacceptable intersection, roadway segment, freeway facility, or queuing operations. All projects would be required to mitigate for their fair share of impacts, in accordance with County requirements. The Proposed Project would generate 296 trips during the weekday morning (AM) peak hour and 435 trips during the weekday afternoon (PM) peak hour. The Proposed Project would contribute vehicle trips to intersections, roadway segments, and queuing that would operate at unacceptable levels under Year 2015 and 2025 conditions. ~~Mitigation is proposed that would fully mitigate all impacts to a level of less than significant.~~ Mitigation is proposed that would mitigate impacts to a level of less than significant, with the exception of LOS impacts at the eastbound approach of the Missouri Flat Road and Enterprise Drive intersection. Because no feasible or acceptable mitigation is available to reduce these impacts to less than significant, the resulting roadway LOS and queuing impacts are significant and unavoidable. Therefore, the Proposed Project would have a cumulatively considerable contribution to cumulative impacts to the Missouri Flat Road and Enterprise Drive intersection.

Additionally, the Proposed Project would be required to implement a construction traffic and parking plan to minimize impacts to surrounding roadways and land uses. Other planned and approved projects would also be required to implement similar plans during construction to mitigate impacts. Therefore, the Proposed Project, in conjunction with other planned and approved projects, would not have a cumulatively considerable impact ~~on transportation~~ concerning construction traffic and parking.

APPENDICES

Appendix I

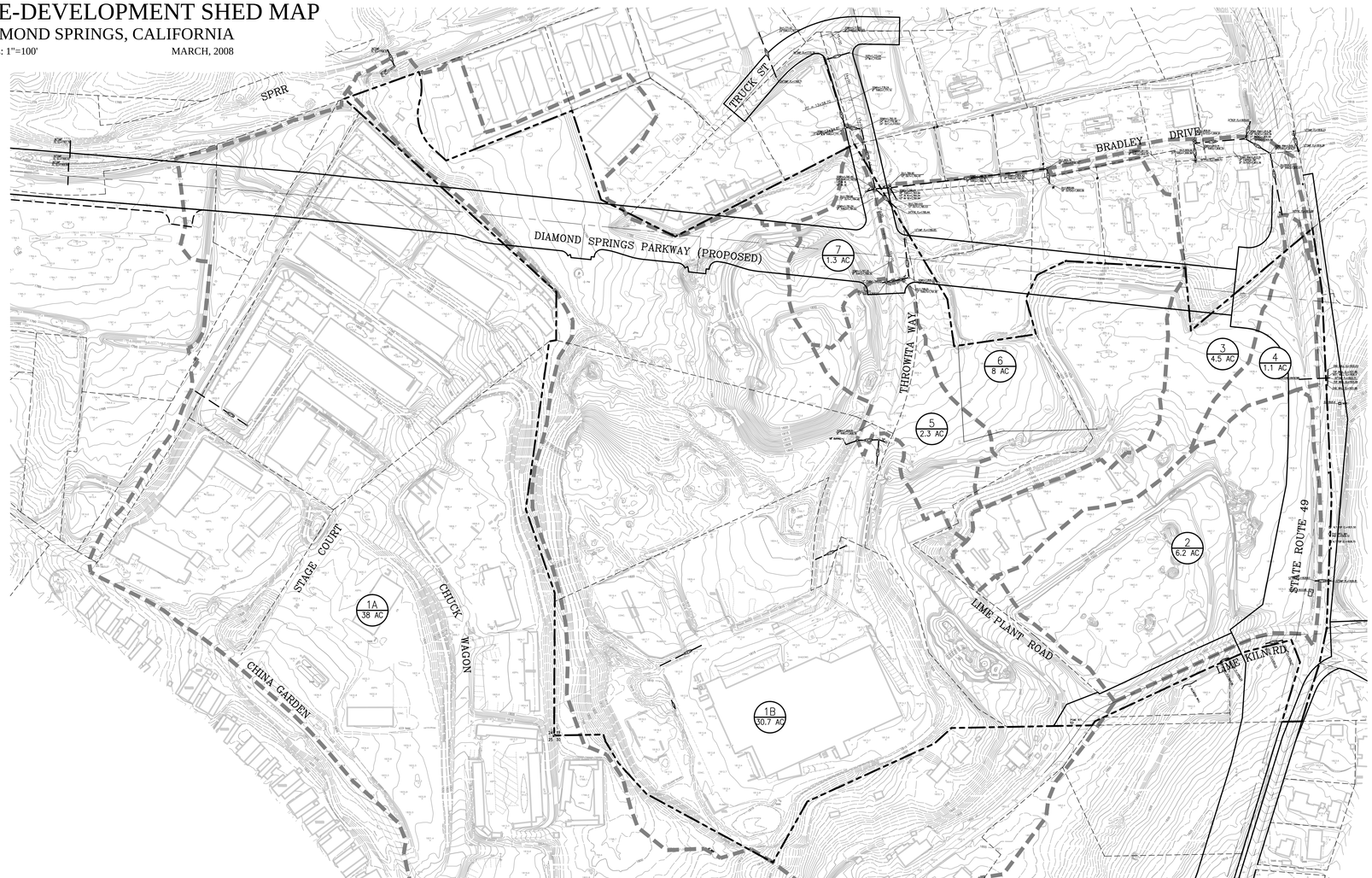
The Preliminary Drainage Report's watershed maps have been appended to Appendix I of the Draft EIR; the maps are included at the end of this section.

DIAMOND DORADO RETAIL CENTER

PRE-DEVELOPMENT SHED MAP

DIAMOND SPRINGS, CALIFORNIA

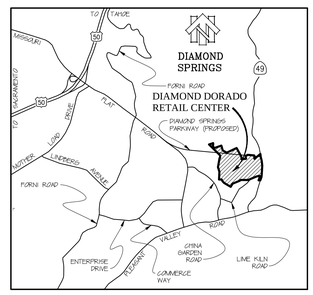
SCALE: 1"=100' MARCH, 2008



PROJECT BOUNDARY

DRAINAGE SHED BOUNDARY

1 / 3 AC — SHED I.D. & AREA



VICINITY MAP

CTA Engineering • Surveying
3233 Monier Circle
Rancho Cordova, CA 95742
(916) 638-0919
(916) 638-2479 Fax

DIAMOND DORADO RETAIL CENTER

POST-DEVELOPMENT SHED MAP

DIAMOND SPRINGS, CALIFORNIA

SCALE: 1"=100' MARCH, 2008

0 50' 100' 200'

SCALE: 1" = 100'

PROJECT BOUNDARY

DRAINAGE SHED BOUNDARY

1 / 3 AC — SHED I.D. & AREA

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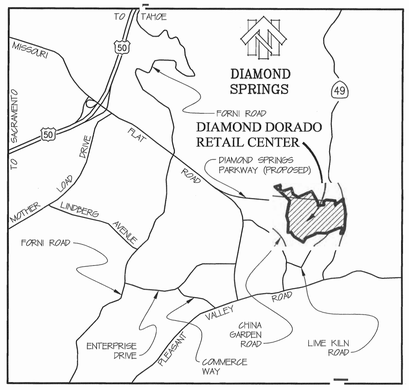

VICINITY MAP

Appendix L

The traffic impact analysis for Alternative 5: Existing MRF Access as contained in the Kimley-Horn and Associates letter dated April 30, 2012, has been appended to Appendix L of the Draft EIR.

Kimley-Horn
and Associates, Inc.

April 30, 2012

Ms. Eileen Crawford
Senior Civil Engineer
El Dorado County Department of Transportation
2850 Fairlane Court
Placerville, CA 95667

Suite 200
11919 Foundation Place
Gold River, California
95670

Re: Response to Comments for Diamond Dorado Retail Center Draft EIR

Dear Eileen:

As requested, I am writing to provide response to comments received in a letter from you dated March 19, 2012, pertaining to the proposed Diamond Dorado Retail Center (DDRC) project. As requested, the purpose of this letter is to address Caltrans' comments #2, #4, and #5 provided in their letter dated February 6, 2012, letter, City of Placerville's comments offered in their letter dated February 6, 2012, and to perform a supplemental evaluation of the affected study intersections using the revised site plan dated January 24, 2012.

I. Response to Caltrans' Comments, dated February 6, 2012

Comment #2:
The department notes the potential for significant cumulative traffic impacts on Highway 50 mainline, near Missouri Flat Road, which could be linked to several developments in this area, including The Crossings at El Dorado. El Dorado County did not accurately analyze this possibility, with queuing and level of service changes given the short intersection spacing, and the potential impacts to adjacent roadways.

Response: When the DDRC traffic study was prepared in 2010, the size of the Crossings at El Dorado project was assumed based on the information available for the project at the time. Page 21 of the previously completed traffic study[1] describes the adjustments that were made to background traffic at the US-50 Interchange with Missouri Flat Road and other intersections to account for the Crossings at El Dorado project. Therefore, the Crossings at El Dorado project was actually considered in the cumulative effects analysis for the DDRC Project using the best information at the time (2010).

More recently, the Crossings at El Dorado project submitted a development application to the County from which a new traffic impact analysis was required.

[1] *Final Traffic Impact Analysis, Diamond Dorado Retail Center (WO #14)*, Kimley-Horn and Associates, July 21, 2010.

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The cumulative effects of the DDRC project and the Crossings at El Dorado project are also documented in the Crossings at El Dorado traffic study[2] since the traffic study for the Crossings at El Dorado project was chronologically initiated approximately 2 years after the DDRC study. Furthermore, the recently prepared Headington Road Extension traffic study provided additional documentation of the cumulative effects of the planned area projects. The traffic volumes used in this study (Headington Road Extension) were reviewed and approved by Caltrans. At the time of this letter, the County was soliciting comments from Caltrans on the draft analysis. In summary, all three studies (DDRC, The Crossings at El Dorado and Headington Road Extension) consider their cumulative effects albeit at different points in time over the past 2 years. In each case the best information available at the time of the study was utilized.

Comment #4:
Page 2-55, 4.11-55 MM TRANS-3a proposes that "dual eastbound right-turn lanes from the eastbound US-50 ramps to Missouri Flat Road should be converted into a single free right-turn lane." This mitigation measure was first identified in the Final Traffic Impact Analysis dated July 21, 2010 (Appendix L) and again in the Supplemental Traffic Analysis for the Missouri Flat Road Interchange dated December 10, 2010. This is an inadequate mitigation. Normally a free right would have a large capacity, but in this case it is restricted downstream by the traffic signal at Mother Lode Drive which is about 150 feet away. Good coordination of signals with such a short spacing is extremely difficult if not impossible to achieve under high volume (peak hour) conditions. These improvements would not reduce the impact because of limitations that were not considered in the traffic analysis.

Response: Please see the response to comment #5 below which addresses the close spacing of the study intersections and the existing limitations that make improvements to traffic operations at the interchange difficult.

Comment #5:
The results of the KHA Synchro analysis are invalid due to the proximity of the Missouri Flat Road and the US-50 intersection to the Missouri Flat Road and Mother Lode Drive intersection and the limitations of the Highway Capacity Methodology (HCM) when dealing with close spaced intersections. The HCM is unable to account for potential impact of downstream congestion, and/or detect and adjust for the impact of turn-lane overflows on through traffic for closely spaced intersections. A simulation analysis demonstrates that not only are level of service unacceptable (LOS F) at all four intersections, but queues at the off ramps are overflowing onto the US50 mainline, especially at the westbound off ramp. This major safety concern is not addressed in the DEIR.

[2] *Final Traffic Impact Analysis, The Crossings at El Dorado (WO#40)*, Kimley-Horn and Associates, September 22, 2011.

Response: Due to the close spacing of the study intersections, interchange operations were determined using SimTraffic® traffic analysis software for the following intersections:

1. Missouri Flat Road @ Plaza Drive
2. Missouri Flat Road @ US-50 Westbound Ramps
3. Missouri Flat Road @ US-50 Eastbound Ramps
4. Missouri Flat Road @ Mother Lode Drive

SimTraffic® Measures of Effectiveness (MOEs) were compared against Highway Capacity Manual (HCM) intersection delay thresholds to equate SimTraffic® results to HCM Level of Service (LOS). For this evaluation, a 5-minute "seed time" was used and 60-minute simulation runs were recorded, in which a 15-minute peak period is followed by a 45-minute off peak period. Five (5) simulations were performed for each time period (AM and PM Peaks), and the results of the simulations are presented in Attachments A and B.

The previously developed US-50/Missouri Flat Road Single Point Urban Interchange (SPUI) configuration is no longer identified as a funded improvement through the County's Capital Improvement Program (CIP). As such, this analysis explores alternative interchange geometrics aimed at maximizing operations without the previously assumed SPUI configuration. Alternative geometrics have been explored using the underlying assumption that the Missouri Flat Road bridge structure cannot be widened due to the associated construction costs. Alternatives with such widening would likely have costs rivaling those of the SPUI and, therefore, would not be considered as feasible, alternate improvements.

Please note that our previous traffic study for the project[1] serves as the starting point for this analysis. This evaluation includes the following specific items:

1. Cumulative (2025)[*]
2. Cumulative (2025)[*] + DDRC

[*] US-50/Missouri Flat Interchange Phase 1B per *Missouri Flat Road Phase 1A & 1B Improvements*, El Dorado County Department of Transportation, November 29, 2005.

Peak-hour LOS was determined for the four study intersections. As required by El Dorado County Department of Transportation's *Traffic Impact Study Protocols and Procedures*, impacts at study intersections were determined based on the change of LOS when project trips were added to the Cumulative (2025) Conditions. The following is a discussion of these scenarios.

Cumulative (2025)
For this scenario, baseline Cumulative (2025) Conditions were established at the US-50 interchange with Missouri Flat Road using Phase 1B of the interchange improvements. Table 1 presents the intersection operations for this scenario as generated using SimTraffic® traffic analysis software.

Table 1 – Intersection Levels of Service with Phase 1B of the Missouri Flat Interchange – Cumulative (2025)

#	Intersection	AM Peak-Hour		PM Peak-Hour	
		Delay (seconds)	LOS	Delay (seconds)	LOS
1	Missouri Flat Road @ Plaza Drive	50.3	D	**152.3**	**F**
2	Missouri Flat Road @ US-50 Westbound Ramps	**82.4**	**F**	**214.1**	**F**
3	Missouri Flat Road @ US-50 Eastbound Ramps	**286.0**	**F**	**461.3**	**F**
4	Missouri Flat Road @ Mother Lode Drive	**184.4**	**F**	**210.6**	**F**
Bold = Substandard per County and/or Caltrans					

As shown in Table 1, all intersections operate at an unacceptable level of service without the project. Analysis worksheets for this scenario are presented in Attachment A.

Cumulative (2025) plus DDRC
For this scenario, traffic associated with the DDRC project was added to the baseline Cumulative (2025) Conditions and levels of service were determined at the study intersections. Table 2 presents the intersection operations for this scenario.

Table 2 – Intersection Levels of Service with Phase 1B of the Missouri Flat Interchange – Cumulative (2025) plus DDRC Conditions

#	Intersection	Analysis Scenario[+]	AM Peak-Hour		PM Peak-Hour	
			Delay (seconds)	LOS	Delay (seconds)	LOS
1	Missouri Flat Road @ Plaza Drive	Cum	50.3	D	**152.3**	**F**
		Cum + PP	51.9	D	**171.7**	**F**
2	Missouri Flat Road @ US-50 WB Ramps	Cum	**82.4**	**F**	**214.1**	**F**
		Cum + PP	61.9	E	**304.5**	**F**
3	Missouri Flat Road @ US-50 EB Ramps	Cum	**286.0**	**F**	**461.3**	**F**
		Cum + PP	**269.5**	**F**	**495.7**	**F**
4	Missouri Flat Road @ Mother Lode Drive	Cum	**184.4**	**F**	**210.6**	**F**
		Cum + PP	**203.5**	**F**	**227.7**	**F**
[+] Cum = Cumulative (2025), Cum + PP = Cumulative (2025) plus Proposed Project						

As shown in Table 2, while modest increases in delay are demonstrated, the addition of the DDRC project does not result in a change in the intersection LOS at any of the study intersections. Analysis worksheets for this scenario are presented in Attachment B.

Impacts and Mitigation

Cumulative (2025) plus DDRC

As reflected in Table 2, the addition of the proposed project results in four (4) significant impacts as defined by the County and/or Caltrans. The following is a discussion of the impacts and their associated mitigation(s).

Impact:

I1. *Intersection #1, Missouri Flat Road @ Plaza Drive*
As shown in Table 2, this intersection operates at LOS F during the PM peak-hour without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

I2. *Intersection #2, Missouri Flat Road @ US-50 WB Ramps*
As shown in Table 2, this intersection operates at LOS F during the PM peak-hour without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

I3. *Intersection #3, Missouri Flat Road @ US-50 EB Ramps*
As shown in Table 2, this intersection operates at LOS F during the AM and PM peak-hours without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

I4. *Intersection #4, Missouri Flat Road @ Mother Lode Drive*
As shown in Table 2, this intersection operates at LOS F during the AM and PM peak-hours without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

Mitigation:

Mitigating the interchange intersections' levels of service with the Phase 1B interchange configuration is problematic considering the previously stated inability to widen the Missouri Flat Road bridge structure over US-50. The interchange currently has physical capacity constraints that hinder a feasible, cost effective mitigation measure from being identified.

As stated previously, the project will result in a modest increase in delay at the interchange; however, the addition of the DDRC project does not result in a change in the intersection level of service at any of the study intersections. As documented, the project contributes to an operationally deficient condition.

To improve operational deficiencies at the interchange, the County and Caltrans could consider the following possible improvements: relocation of Mother Lode Drive to the south, conversion the Mother Lode Drive to right-in/right-out, or widening of the bridge structure over US-50 to provide additional northbound and southbound capacity.

Intersection Queuing Evaluation

Vehicle queuing for the study intersections was considered for the same movements as evaluated in the previous traffic study[1]. The calculated vehicle queues were generated in SimTraffic® and were compared to actual or anticipated vehicle storage/segment lengths. Results of the queuing evaluation are presented in Table 3.

Table 3 – Intersection Queuing Evaluation Results for Select Locations

Intersection / Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (ft)	95th % Queue (ft)	Available Storage (ft)	95th % Queue (ft)
#2, Missouri Flat Rd @ WB US-50 Ramps	**WBLT**				
Cumulative (2025)		600*	2611	600*	3521
Cumulative (2025) plus DDRC			1962		3536
	NBLT				
Cumulative (2025)		125+	264	125+	253
Cumulative (2025) plus DDRC			263		254
#3, Missouri Flat Rd @ EB US-50 Ramps	**EBRT**				
Cumulative (2025)		545	646	545	593
Cumulative (2025) plus DDRC			668		661
	SBLT				
Cumulative (2025)		100+	232	100+	267
Cumulative (2025) plus DDRC			244		266

Source: *Highway Capacity Manual (HCM) 2000* methodology per Synchro© v7.
+ Dual left-turn lanes, * Intersection approach with available storage length equal to segment length

As presented in Table 3, the addition of the DDRC project produces modest increases in vehicle queues. The available storage pocket for the movements presented in Table 3 are not projected to provide sufficient length to store vehicle queues either without or with the addition of the project.

II. Response to City of Placerville Comments, dated February 6, 2012

Concerns regarding the intersection of Sacramento/Pacific/SR-49

In their letter, the City expresses concern regarding the degradation of the LOS at the intersection of Sacramento/Pacific/SR-49 from LOS C to LOS D. As presented in the previously approved traffic study[1], the delay at this intersection only increases 2.0 seconds under 2015 plus Project Conditions during the PM Peak, not the "near doubling" of delay that the letter had cited. Furthermore, this intersection does not experience LOS degradation during either the AM or PM peak under any of the analysis scenarios. It is possible that the operational data was misinterpreted by the City.

It should be noted that during the traffic study review process, the City provided comments on the project to KHA[3] that were addressed in the final TIA. In addition, KHA received an email from the City indicating that the requested changes to the traffic study were made to the satisfaction of the City.[4]

Concerns regarding not studying the intersections of Pacific Street with Main Street and Cedar Ravine

The City questions why the intersections of Cedar Ravine/Pacific Street and Main Street/Pacific Street/SR-49 were not included in the traffic analysis for the project. The following are the reasons that these intersections were not included in the analysis:

- The County contracted with Dowling Associates, Inc. to prepare a Scope of Work for the project which included specification of the requirements of the traffic study. The intersections referenced above were not included on this list of required study facilities.
- El Dorado County's *Traffic Impact Study Protocols & Procedures, June 2008,* states the following:

  "In accordance with the County's CEQA review requirements and consistent with General Plan Policies TC-Xa(5) and TC-Xb(C), DOT will review all proposed development projects to determine each proposed project's potential effects on transportation and circulation. To facilitate this review and to address General Plan Policies TC-Xa and TC-Xc, projects which worsen traffic conditions will be required to prepare a traffic impact study in accordance with these traffic impact study protocols and procedures.

[3] Multiple Emails between Nate Strong, City of Placerville, and Matt Weir, Kimley-Horn and Associates, Inc., from December 2009.
[4] Email from Nate Strong, City of Placerville, to Matt Weir, Kimley-Horn and Associates, Inc., January 8, 2010.

General Plan Policy TC-Xe defines the term "worsen" on a given roadway facility as follows:

1. *A two (2) percent increase in traffic during the a.m. peak hour, p.m. peak hour, or daily, or*
2. *The addition of 100 or more daily trips, or*
3. *The addition of 10 or more trips during the a.m. peak hour or the p.m. peak hour."*

The most common threshold used by the County to determine study facilities is item #3 (the addition of 10 trips). As illustrated in *Figure 7 – Near Term (2015) Proposed Project Trip Assignment*[1], the proposed project generates three (3) and nine (9) project trips during the AM and PM peak-hours, respectively, on both the east and west legs of intersection #27 (Sacramento/Pacific/SR-49). Therefore, a maximum of nine (9) project trips could be expected to reach the intersections of Main Street/Pacific Street/SR-49 and Pacific Street/Cedar Ravine Street. Since the number of project trips at these intersections is less than the 10 trips, these intersections do not require analysis per the County's protocols.

- Finally, as presented in the previously approved traffic study[1], the delay at Sacramento/Pacific/SR-49 only increases 2.0 seconds under 2015 plus project conditions during the PM Peak. Therefore, it can be assumed that if the intersections of Cedar Ravine/Pacific Street and Main Street/Pacific Street/SR-49 were studied, the increase in delay at these intersections would likely be less than 2.0 seconds. It can be concluded that the effect of adding project traffic to these intersection will be nominal since the intersection of Sacramento/Pacific/SR-49 will experience more project traffic than the intersections of Cedar Ravine/Pacific Street and Main Street/Pacific Street/SR-49.

Concerns Regarding Impacts from Adjacent Projects

Please see our response to Comment #2 in the Response to Caltrans' comments, dated February 6, 2012, section above regarding the cumulative effects of area projects on the Missouri Flat Road interchange and surrounding roadway network.

It should be noted that the Crossings at El Dorado project traffic study did not analyze intersections within the City of Placerville, since most project traffic is assumed to be focused on US-50 within the City limits. The effects of adding the Crossings at El Dorado project to the City's roadway network, outside of US-50, are expected to be nominal.

III. Analysis due to the change of MRF Access

It is our understanding that, in response to concerns raised by the County and the community, the applicant has provided an alternative design to the proposed project. The alternative design will change the MRF access from Lime Kiln Road to Diamond Springs Parkway (DSP) by way of Throwita Way. As part of this alternative to the proposed project, the Diamond Road (SR-49) intersection with Lime Kiln Road/Black Rice Road would revert back to right-in/right-out, left-in access control. Because the final traffic impact analysis for this project[1] considered the access location of the MRF on Lime Kiln Road, the following discussion documents the evaluation of the effects of this change in MRF access on delay, LOS, and queuing.

Please note that our previous traffic study for the project[1] serves as the starting point for this analysis. Based on direction provided by the County, this supplemental evaluation includes the following specific items:

1. Existing plus Approved Projects (2015) plus Proposed Project[+]
2. Cumulative (2025) plus Proposed Project[+]

[+] The "Proposed Project" is defined as the DDRC development only. All MRF traffic (as previously studied under no-project conditions) uses Throwita Way.

Peak-hour LOS was determined for thirteen (13) intersections and eight (8) roadway segments as defined in the previous traffic study prepared for the proposed project[1] for the analysis scenarios listed above. Consistent with the County's requirements, delay, LOS, and queuing for each scenario were determined using methods defined in the *Highway Capacity Manual, 2000,* using appropriate traffic analysis software (Synchro). As required by El Dorado County Department of Transportation's *Traffic Impact Study Protocols and Procedures*, impacts at study intersections were determined based on the change of LOS when project trips were added to the Existing plus Approved Projects (EPAP) (2015) and Cumulative (2025) Conditions. The following is a discussion of these scenarios.

Existing plus Approved Projects (2015) plus Proposed Project
For this scenario, peak-hour traffic associated with the proposed project was added to the Existing plus Approved Projects (2015) traffic volumes and levels of service were determined at the applicable study facilities.

Attachment C provides the AM and PM traffic volumes for this analysis scenario. The analysis worksheets for this scenario are provided in Attachment D.

Intersections
Table 4 provides a summary of the intersection operating conditions for this analysis scenario. As indicated in Table 4, the study intersections operate from LOS A to LOS F during the AM and PM peak-hours. The average intersection delay at eight of the 13 study intersections is less than the delay documented in the original traffic impact analysis for the proposed project[1].

Table 4 – Intersection Levels of Service -
EPAP (2015) and EPAP (2015) plus Project Conditions

#	Intersection	Analysis Scenario*	Traffic Control	AM Peak-Hour		PM Peak-Hour	
				Delay (seconds)	LOS	Delay (seconds)	LOS
7	Diamond Springs Parkway @ Missouri Flat Road	EPAP	Signal	24.6	C	32.4	C
		EPAP+PP (Orig)		30.3	C	52.5	D
		EPAP+PP		28.7	C	48.1	D
8	Diamond Springs Parkway @ Throwita Way	EPAP	Signal	14.2	B	17.7	B
		EPAP+PP (Orig)		16.5	B	55.3	E
		EPAP+PP		21.2	C	55.7	E
9	Diamond Springs Parkway @ Diamond Road (SR-49)	EPAP	Signal	58.7	E	69.1	E
		EPAP+PP (Orig)		62.3	E	52.7	D
		EPAP+PP		58.0	E	56.1	E
12	Diamond Road (SR-49) @ Lime Kiln Road/Black Rice Road	EPAP	TWSC+	18.8 (WB)	D	19.4 (EB)	C
		EPAP+PP (Orig)		19.6 (EB)	C	30.3 (EB)	E
		EPAP+PP		19.8 (WB)	C	23.4 (EB)	C
13	Diamond Road (SR-49) @ Pleasant Valley Road (SR-49)	EPAP	Signal	19.9	B	28.7	C
		EPAP+PP (Orig)		21.3	C	38.4	D
		EPAP+PP		21.2	C	38.1	D
14	Pleasant Valley Road (SR-49) @ Missouri Flat Road	EPAP	Signal	10.2	B	19.0	B
		EPAP+PP (Orig)		10.1	B	20.2	C
		EPAP+PP		10.2	B	20.4	C
15	Pleasant Valley Road (SR-49) @ China Garden Road	EPAP	TWSC+	19.7 (SB)	C	31.6 (SB)	D
		EPAP+PP (Orig)		21.1 (SB)	C	40.1 (SB)	E
		EPAP+PP		19.9 (SB)	C	34.8 (SB)	D
22	Missouri Flat Road @ Industrial Drive	EPAP	TWSC+	14.9 (EB)	B	22.1 (EB)	C
		EPAP+PP (Orig)		15.7 (EB)	C	26.8 (EB)	D
		EPAP+PP		15.5 (EB)	C	26.4 (EB)	D
28	Missouri Flat Road @ Enterprise Drive	EPAP	TWSC+	18.0 (EB)	C	39.8 (EB)	E
		EPAP+PP (Orig)		18.9 (EB)	C	**51.7 (EB)**	**F**
		EPAP+PP		18.5 (EB)	C	**50.2 (EB)**	**F**
29	Missouri Flat Road @ China Garden Road	EPAP	TWSC+	19.3 (WB)	C	29.6 (WB)	D
		EPAP+PP (Orig)		21.3 (WB)	C	44.2 (WB)	E
		EPAP+PP		20.4 (WB)	C	39.8 (WB)	E
30	Diamond Springs Parkway@ Right-In/Right-Out Site Access Driveway	EPAP	TWSC+	*N/A*			
		EPAP+PP (Orig)		18.6 (NB)	C	40.4 (NB)	E
		EPAP+PP		19.3 (NB)	C	35.6 (NB)	E
31	Diamond Springs Parkway @ Right-In Site Access Driveway	EPAP	TWSC+	*N/A*			
		EPAP+PP (Orig)		0.0 (EB)	A	0.0 (EB)	A
		EPAP+PP		0.0 (EB)	A	0.0 (EB)	A
32	Diamond Road (SR-49) @ Site Access Driveway	EPAP	TWSC+	*N/A*			
		EPAP+PP (Orig)		17.1 (EB)	C	33.1 (EB)	D
		EPAP+PP		16.3 (EB)	C	30.2 (EB)	D

* EPAP = Existing plus Approved Projects (2015), EPAP+PP (Orig) = EPAP (2015) plus DDRC as studied in 7/21/10 Final TIA, EPAP+PP = EPAP (2015) plus DDRC with MRF Access at Throwita Way via DSP.
+ Control delay for worst minor approach (worst minor movement) for TWSC. **Bold = Substandard per County and/or Caltrans**

Roadway Segments

Table 5 presents the peak-hour roadway segment operating conditions for this analysis scenario. As indicated in Table 5, the study roadway segments operate from LOS D to LOS F during the PM peak-hour. The segment volume at seven of the eight study roadway segments is less than the volume documented in the original traffic impact analysis for the proposed project[1].

Table 5 – Roadway Segment Levels of Service -
EPAP (2015) and EPAP (2015) plus Project Conditions

#	Roadway Segment	Roadway Classification	Analysis Scenario*	PM Peak-Hour	
				Volume (vph)	LOS
2	Missouri Flat Road – Diamond Springs Parkway to China Garden Road	Two-Lane Arterial	EPAP	1303	D
			EPAP+PP (Orig)	1502	D
			EPAP+PP	1468	D
3	Missouri Flat Road – China Garden Road to Pleasant Valley Road (SR-49)	Two-Lane Arterial	EPAP	1324	D
			EPAP+PP (Orig)	1522	D
			EPAP+PP	1489	D
5	Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road	Major Two-Lane Highway	EPAP	1550	D
			EPAP+PP (Orig)	**1701**	**E**
			EPAP+PP	**1696**	**E**
6	Diamond Road (SR-49) – Lime Kiln Road to Pleasant Valley Road (SR-49)	Major Two-Lane Highway	EPAP	1236	D
			EPAP+PP (Orig)	1465	D
			EPAP+PP	1423	D
7	Diamond Springs Parkway – Missouri Flat Road to Throwita Way	Two-Lane Arterial	EPAP	1502	D
			EPAP+PP (Orig)	**2207**	**F**
			EPAP+PP	**2240**	**F**
8	Diamond Springs Parkway – Throwita Way to Diamond Road (SR-49)	Two-Lane Arterial+	EPAP	1601	D
			EPAP+PP (Orig)	1719	D
			EPAP+PP	1688	D
9	Pleasant Valley Road (SR-49) – Missouri Flat Road to China Garden Road	Two-Lane Arterial	EPAP	1127	D
			EPAP+PP (Orig)	1188	D
			EPAP+PP	1147	D
10	Pleasant Valley Road (SR-49) – China Garden Road to Diamond Road (SR-49)	Minor Two-Lane Highway	EPAP	1044	D
			EPAP+PP (Orig)	1126	D
			EPAP+PP	1084	D

* EPAP = Existing plus Approved Projects (2015), EPAP+PP (Orig) = EPAP (2015) plus DDRC as studied in 7/21/10 Final TIA, EPAP+PP = EPAP (2015) plus DDRC with MRF Access via Throwita Way.
+ Two (2) westbound lanes are assumed to be in place per the DSP project to receive dual northbound left-turns from Diamond Road (SR-49) and to accommodate westbound queuing at Throwita Way.
Bold = Substandard per County and/or Caltrans

Cumulative (2025) plus Project

Peak-hour traffic associated with the proposed project was added to the Cumulative (2025) traffic volumes, and levels of service were determined at the applicable study facilities. As previously established in the project's original traffic study[1], the project site is designated for industrial uses by the County's

General Plan. As such, for this analysis scenario, trips from the industrial land uses were deducted from the roadway network prior to adding trips for the proposed project.

Attachment E provides the AM and PM traffic volumes for this analysis scenario. The analysis worksheets for this scenario are provided in Attachment F.

Intersections
Table 6 provides a summary of the intersection operating conditions for this analysis scenario. As indicated in Table 6, the study intersections operate from LOS A to LOS F during the AM and PM peak-hours. The average intersection delay at eight of the 13 study intersections is less than the delay documented in the original traffic impact analysis for the proposed project[1].

Roadway Segments
Table 7 presents the peak-hour roadway segment operating conditions for this analysis scenario. As indicated in Table 7, the study roadway segments operate from LOS D to LOS F during the PM peak-hour. The segment volume at seven of the eight study roadway segments is less than the volume documented in the original traffic impact analysis for the proposed project[1]. Furthermore, the significant impact at the intersection of Missouri Flat Road and Industrial Drive (Intersection # 22) was eliminated with the revised MRF access and associated change in traffic control at the Diamond Road (SR-49) intersection with Lime Kiln Road/Black Rice Road.

Impacts and Mitigation

<u>Existing plus Approved Projects (2015) plus Proposed Project</u>
As reflected in Table 4 and Table 5, the addition of the proposed project results in two (2) significant impacts as defined by the County and/or Caltrans. The following is a discussion of the impacts and its associated mitigations.

Impacts:

I1. Intersection #28, Missouri Flat Road @ Enterprise Drive

As shown in Table 4, the addition of the proposed project increases the minor street approach delay at this intersection which operates at LOS F during the PM peak-hour without the project. It should be noted that the addition of the project does not add traffic to the minor, stop-controlled Enterprise Drive intersection approach. The minimal increase in through volume attributed to the proposed project is not expected to result in a noticeable change in intersection operations. As a result, the addition of the proposed project results in impacts which are ***less than significant.***

Table 6 – Intersection Levels of Service -
Cumulative (2025) and Cumulative (2025) plus Project Conditions

#	Intersection	Analysis Scenario*	Traffic Control	AM Peak-Hour		PM Peak-Hour	
				Delay (seconds)	LOS	Delay (seconds)	LOS
7	Diamond Springs Parkway @ Missouri Flat Road	Cum	Signal	31.3	C	33.4	C
		Cum+PP (Orig)		33.0	C	53.8	D
		Cum+PP		32.2	C	50.7	D
8	Diamond Springs Parkway @ Throwita Way	Cum	Signal	20.3	C	22.8	C
		Cum+PP (Orig)		21.4	C	60.3	E
		Cum+PP		25.4	C	58.0	E
9	Diamond Springs Parkway @ Diamond Road (SR-49)	Cum	Signal	58.8	E	45.1	D
		Cum+PP (Orig)		55.5	E	41.0	D
		Cum+PP		57.1	E	40.2	D
12	Diamond Road (SR-49) @ Lime Kiln Road/Black Rice Road	Cum	TWSC+	16.4 (EB)	C	25.0 (EB)	D
		Cum+PP (Orig)		18.8 (EB)	C	39.4 (EB)	E
		Cum+PP	Signal	16.7 (EB)	C	28.2 (EB)	D
13	Diamond Road (SR-49) @ Pleasant Valley Road (SR-49)	Cum	Signal	22.3	C	43.2	D
		Cum+PP (Orig)		22.5	C	51.1	D
		Cum+PP		22.3	C	51.0	D
14	Pleasant Valley Road (SR-49) @ Missouri Flat Road	Cum	Signal	13.4	B	28.4	C
		Cum+PP (Orig)		12.7	B	34.0	C
		Cum+PP		12.9	B	34.2	C
15	Pleasant Valley Road (SR-49) @ China Garden Road	Cum	TWSC+	32.3 (SB)	D	**121.6 (SB)**	**F**
		Cum+PP (Orig)		35.5 (SB)	E	**165.5 (SB)**	**F**
		Cum+PP		32.6 (SB)	D	**135.5 (SB)**	**F**
22	Missouri Flat Road @ Industrial Drive	Cum	TWSC+	19.3 (EB)	C	39.6 (EB)	E
		Cum+PP (Orig)		19.5 (EB)	C	**50.1 (EB)**	**F**
		Cum+PP		19.2 (EB)	C	48.9 (EB)	E
28	Missouri Flat Road @ Enterprise Drive	Cum	TWSC+	31.5 (EB)	D	**182.6 (EB)**	**F**
		Cum+PP (Orig)		32.6 (EB)	D	**227.7 (EB)**	**F**
		Cum+PP		31.6 (EB)	D	**218.6 (EB)**	**F**
29	Missouri Flat Road @ China Garden Road	Cum	TWSC+	38.4 (WB)	E	**115.8 (WB)**	**F**
		Cum+PP (Orig)		40.8 (WB)	E	**179.0 (WB)**	**F**
		Cum+PP		37.7 (WB)	E	**159.5 (WB)**	**F**
30	Diamond Springs Parkway@ Right-In/Right-Out Site Access Driveway	Cum	TWSC+	*N/A*			
		Cum+PP (Orig)		21.7 (NB)	C	47.9 (NB)	E
		Cum+PP		23.0 (NB)	C	42.0 (NB)	E
31	Diamond Springs Parkway @ Right-In Site Access Driveway	Cum	TWSC+	*N/A*			
		Cum+PP (Orig)		0.0 (EB)	A	0.0 (EB)	A
		Cum+PP		0.0 (EB)	A	0.0 (EB)	A
32	Diamond Road (SR-49) @ Site Access Driveway	Cum	TWSC+	*N/A*			
		Cum+PP (Orig)		20.2 (EB)	C	43.7 (EB)	E
		Cum+PP		19.2 (EB)	C	39.2 (EB)	E

* Cum = Cumulative (2025), Cum+PP (Orig) = Cumulative (2025) plus DDRC as studied in 7/21/10 Final TIA, Cum+PP = Cumulative (2025) plus DDRC with MRF Access at Throwita Way via DSP.
+ Control delay for worst minor approach (worst minor movement) for TWSC. **Bold = Substandard per County and/or Caltrans**

Table 7 – Roadway Segment Levels of Service -
Cumulative (2025) and Cumulative (2025) plus Project Conditions

#	Roadway Segment	Roadway Classification	Analysis Scenario*	PM Peak-Hour	
				Volume (vph)	LOS
2	Missouri Flat Road – Diamond Springs Parkway to China Garden Road	Two-Lane Arterial	Cum	1622	D
			Cum+PP (Orig)	1773	E
			Cum+PP	1739	D
3	Missouri Flat Road – China Garden Road to Pleasant Valley Road (SR-49)	Two-Lane Arterial	Cum	1580	D
			Cum+PP (Orig)	1730	D
			Cum+PP	1697	D
5	Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road	Major Two-Lane Highway	Cum	**1766**	**E**
			Cum+PP (Orig)	**1861**	**E**
			Cum+PP	**1858**	**E**
6	Diamond Road (SR-49) – Lime Kiln Road to Pleasant Valley Road (SR-49)	Major Two-Lane Highway	Cum	1580	D
			Cum+PP (Orig)	**1755**	**E**
			Cum+PP	**1713**	**E**
7	Diamond Springs Parkway – Missouri Flat Road to Throwita Way	Two-Lane Arterial	Cum	1743	D
			Cum+PP (Orig)	**2232**	**F**
			Cum+PP	**2264**	**F**
8	Diamond Springs Parkway – Throwita Way to Diamond Road (SR-49)	Two-Lane Arterial	Cum	1800	E
			Cum+PP (Orig)	1849	E
			Cum+PP	1818	E
9	Pleasant Valley Road (SR-49) – Missouri Flat Road to China Garden Road	Two-Lane Arterial	Cum	1385	D
			Cum+PP (Orig)	1440	D
			Cum+PP	1399	D
10	Pleasant Valley Road (SR-49) – China Garden Road to Diamond Road (SR-49)	Minor Two-Lane Highway	Cum	1297	D
			Cum+PP (Orig)	1368	D
			Cum+PP	1326	D

* Cum = Cumulative (2025), Cum+PP (Orig) = Cumulative (2025) plus DDRC as studied in 7/21/10 Final TIA, Cum+PP = Cumulative (2025) plus DDRC with MRF Access at Throwita Way via DSP.
Bold = Substandard per County and/or Caltrans

I1. Roadway Segment #5, Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road

As shown in Table 5, this Roadway Segment operates at LOS D during the PM peak-hour without the project, and the project results in LOS E. ***This is a significant impact.***

I2. Roadway Segment #7, Diamond Springs Parkway – Missouri Flat Road to Throwita Way

As shown in Table 5, this Roadway Segment operates at LOS D during the PM peak-hour without the project, and the project results in LOS F. ***This is a significant impact.***

Mitigations:

M1. No Mitigation Required.

M2. Segment #5, Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road

The significant impact at this roadway segment during the PM peak-hour can be mitigated by upgrading the facility to a Four-Lane Multilane Highway. This improvement will result in LOS B. Therefore, ***this impact is less than significant***.

It should be noted that, although this mitigation requires an upgrade of this segment to a Four-Lane Multilane Highway, the required intersection lane geometry is actually slightly different. Due to the heavy northbound left-turn movement at the Diamond Springs Parkway intersection with Diamond Road (SR-49), adding mainline capacity (an additional northbound through lane) does not appear to be realistic or required. Conversely, in the southbound direction along Diamond Road (SR-49) between Diamond Springs Parkway and Lime Kiln Road, the additional capacity (an additional southbound through lane) could be provided to further enhance operations. This additional southbound through lane would be required to drop (become a trap lane) at Lime Kiln Road, or drop shortly after Lime Kiln road. Because this segment is required to be 4-lanes in the Cumulative (2025) Conditions as a mitigation measure, the timing of this capacity improvement should be coordinated with the full build-out of Diamond Road (SR-49).

M3. Segment #7, Diamond Springs Parkway – Missouri Flat Road to Throwita Way

The significant impact at this roadway segment during the PM peak-hour can be mitigated by upgrading the facility to a Four Lane Arterial, Divided. This improvement will result in LOS D. Therefore, ***this impact is less than significant***.

<u>Cumulative (2025) plus Proposed Project</u>

As reflected in Table 6 and Table 7, the addition of the proposed project results in five (5) significant impacts as defined by the County and/or Caltrans. The following is a discussion of the impacts and its associated mitigations.

Impacts:

I3. Intersection #15, Pleasant Valley Road (SR-49) @ China Garden Road

As shown in Table 6, this intersection operates at LOS F during the PM peak-hour without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

I4. Intersection #28, Missouri Flat Road @ Enterprise Drive

As shown in Table 6, the addition of the proposed project increases the minor street approach delay at this intersection which operates at LOS F during the PM peak-hour without the project. It should be noted that the addition of the project does not add traffic to the

minor, stop-controlled Enterprise Drive intersection approach. The minimal increase in through volume attributed to the proposed project is not expected to result in a noticeable change in intersection operations. As a result, the addition of the proposed project results in impacts which are ***less than significant.***

I5. Intersection #29, Missouri Flat Road @ China Garden Road
As shown in Table 6, this intersection operates at LOS F during the PM peak-hour without the project, and the project contributes more than 10 peak-hour trips to the intersection during a peak-hour. ***This is a significant impact.***

I6. Roadway Segment #5, Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road
As shown in Table 7, this roadway segment operates at LOS E during the PM peak-hour without the project, and the project contributes traffic. ***This is a significant impact.***

I7. Roadway Segment #6, Lime Kiln Road to Pleasant Valley Road (SR-49)
As shown in Table 7, this Roadway Segment operates at LOS D during the PM peak-hour without the project, and the project results in LOS E. ***This is a significant impact.***

I8. Roadway Segment #7, Diamond Springs Parkway – Missouri Flat Road to Throwita Way
As shown in Table 7, this Roadway Segment operates at LOS D during the PM peak-hour without the project, and the project results in LOS F. ***This is a significant impact.***

Mitigations:

M4. Pleasant Valley Road (SR-49) @ China Garden Road
The significant impact at this intersection during the PM peak-hour can be mitigated with the delineation of a 50-foot southbound right-turn flare. As shown in Table 8, this mitigation measure results in the intersection operating at LOS E during the PM peak-hour. Therefore, ***this impact is less than significant***.

M5. No Mitigation Required.

M6. Intersection #29, Missouri Flat Road @ China Garden Road
The significant impact at this intersection during the PM peak-hour can be mitigated with the delineation of a 50-foot westbound right-turn flare. As shown in Table 8, this mitigation measure results in the intersection operating at LOS E during the PM peak-hour. Therefore, ***this impact is less than significant***.

M7. Segment #5, Diamond Road (SR-49) – Diamond Springs Parkway to Lime Kiln Road

The significant impact at this roadway segment during the PM peak-hour can be mitigated by upgrading the facility to a Four-Lane, Multilane Highway. This improvement will result in LOS C. Therefore, ***this impact is less than significant***.

M8. Segment #6, Diamond Road (SR-49) – Lime Kiln Rd to Pleasant Valley Road (SR-49)

The significant impact at this roadway segment during the PM peak-hour can be mitigated by upgrading the facility to a Four-Lane, Multilane Highway. This improvement will result in LOS B. Therefore, ***this impact is less than significant***.

Table 8 – Intersection Levels of Service –
Cumulative (2025) plus Proposed Project Mitigated Conditions

#	Intersection	Analysis Scenario*	Traffic Control	AM Peak-Hour		PM Peak-Hour	
				Delay (seconds)	LOS	Delay (seconds)	LOS
15	Pleasant Valley Road (SR-49) @ China Garden Road	Cum	TWSC*	32.3 (SB)	D	**121.6 (SB)**	**F**
		Cum+PP (Orig)		35.5 (SB)	E	**165.5 (SB)**	**F**
		Cum+PP		32.6 (SB)	D	**135.5 (SB)**	**F**
		Cum+PP (Mit.)		24.0 (SB)	C	44.1 (SB)	E
29	M4 - Missouri Flat Road @ China Garden Road	Cum	TWSC*	38.4 (WB)	E	**115.8 (WB)**	**F**
		Cum+PP (Orig)		40.8 (WB)	E	**179.0 (WB)**	**F**
		Cum+PP		37.7 (WB)	E	**159.5 (WB)**	**F**
		Cum+PP (Mit.)		23.1 (WB)	C	40.2 (WB)	E

* Cum = Cumulative (2025), Cum+PP (Orig) = Cumulative (2025) plus DDRC as studied in 7/21/10 Final TIA, Cum+PP = Cumulative (2025) plus DDRC with MRF Access at Throwita Way via DSP

+ Control delay for worst minor approach (worst minor movement) for TWSC. **Bold = Substandard per County and/or Caltrans**

M9. Segment #7, Diamond Springs Parkway – Missouri Flat Road to Throwita Way

The significant impact at this roadway segment during the PM peak-hour can be mitigated by upgrading the facility to a Four Lane Arterial, Divided. This improvement will result in LOS D. Therefore, ***this impact is less than significant***.

Analysis worksheets for the mitigated conditions are in Attachment G.

Intersection Queuing Evaluation
Vehicle queuing for the applicable study intersections was considered for the same movements as evaluated in the previous traffic study[1]. The calculated vehicle queues were compared to actual or anticipated vehicle storage/segment lengths. Results of the queuing evaluation are presented in Table 9. This table includes the vehicle queues resulting from implementation of the Level of Service mitigation measures identified above.

As presented in Table 9, the addition of the proposed project and the previously defined LOS mitigation result in conditions with queuing greater than the available storage pockets at several locations. The following observations and modifications should be considered based on the data presented:

- Intersection #7, DSP @ Missouri Flat Road
    - Extend the westbound left-turn lane to provide 500-feet of storage plus appropriate deceleration distance to accommodate the projected westbound left-turn 95th percentile queue. This additional storage length accommodates both EPAP (2015) and Cumulative (2025) Conditions.

    - Extend the dual northbound left-turn lanes to provide 425-feet of storage plus appropriate deceleration distance to accommodate the projected northbound left-turn 95th percentile queue of 405-feet. This length accommodates both EPAP (2015) and Cumulative (2025) Conditions.

- Intersection #8, DSP @ Throwita Way
    - Extend westbound left-turn lane to provide 375-feet of storage plus appropriate deceleration distance (a single left-turn lane) to accommodate the projected westbound left-turn 95th percentile queue of 353-feet. This length accommodates both EPAP (2015) and Cumulative (2025) Conditions.

- Intersection #9, DSP @ Diamond Rd (SR-49)
    - Because the northbound left-turn lane configuration from Diamond Road (SR-49) to DSP are comprised of a single storage pocket (350-feet) as well as a left-turn lane the length of the roadway segment, the documented vehicle queuing can be reasonably expected to be contained within the capacity provided by these lanes.

Table 9 – Intersection Queuing Evaluation Results for Select Locations

Intersection / Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (ft)	95th % Queue (ft)	Available Storage (ft)	95th % Queue (ft)
#7, DSP @ Missouri Flat Rd	**WBTH**				
EPAP (2015)		2,835*	452	2,835*	301
EPAP plus Proposed Project (2015)			513		552
Cumulative (2025)			645		424
Cumulative (2025) plus Proposed Project			697		612
	WBLT				
EPAP (2015)		325	373	325	315
EPAP plus Proposed Project (2015)			409		487
Cumulative (2025)			414		391
Cumulative (2025) plus Proposed Project			449		500
	NBLT				
EPAP (2015)		325+	332	325+	375
EPAP plus Proposed Project (2015)			337		380
Cumulative (2025)			357		405
Cumulative (2025) plus Proposed Project			363		405
#8, DSP @ Throwita Way	**EBLT**				
Existing (2010)					
EPAP (2015)		175	88	175	104
EPAP plus Proposed Project (2015)			104		145
Cumulative (2025)			123		147
Cumulative (2025) plus Proposed Project			140		175
	WBLT				
EPAP (2015)		100	29	100	30
EPAP plus Proposed Project (2015)			83		348
Cumulative (2025)			26		29
Cumulative (2025) plus Proposed Project			68		353
	WBTH				
EPAP (2015)		850*	706	850*	509
EPAP plus Proposed Project (2015)			708		151
Cumulative (2025)			788		546
Cumulative (2025) plus Proposed Project			769		458
#9, DSP @ Diamond Rd (SR-49)	**NBTH**				
EPAP (2015)		600*	73	600*	102
EPAP plus Proposed Project (2015)			71		136
Cumulative (2025)			89		159
Cumulative (2025) plus Proposed Project			92		184

Source: *Highway Capacity Manual (HCM) 2000* methodology per Synchro© v7.
+ Dual left-turn lanes, * Intersection approach with available storage length equal to segment length

Table 10 – Intersection Queuing Evaluation Results for Select Locations (continued)

Intersection / Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (ft)	95th % Queue (ft)	Available Storage (ft)	95th % Queue (ft)
#9, DSP @ Diamond Rd (SR-49)	**NBLT**	(continued)			
EPAP (2015)		350+	319	350+	221
EPAP plus Proposed Project (2015)			339		308
Cumulative (2025)			346		261
Cumulative (2025) plus Proposed Project			362		338
	SBTH				
EPAP (2015)		*	179	*	248
EPAP plus Proposed Project (2015)			184		323
Cumulative (2025)			199		316
Cumulative (2025) plus Proposed Project			205		398
	SBRT				
EPAP (2015)		270	82	270	74
EPAP plus Proposed Project (2015)			82		88
Cumulative (2025)			289		198
Cumulative (2025) plus Proposed Project			271		232
	EBLT				
EPAP (2015)		850*	10	850*	11
EPAP plus Proposed Project (2015)			13		159
Cumulative (2025)			11		74
Cumulative (2025) plus Proposed Project			13		36
	EBRT				
EPAP (2015)		850*	498	850*	557
EPAP plus Proposed Project (2015)			501		540
Cumulative (2025)			573		400
Cumulative (2025) plus Proposed Project			324		157
#12, Diamond Rd (SR-49) @ Lime Kiln Rd	**EBLT**				
EPAP (2015)		>500*	5	>500*	25
EPAP plus Proposed Project (2015)			5		31
Cumulative (2025)			7		36
Cumulative (2025) plus Proposed Project			7		41
	NBLT				
EPAP (2015)		200	4	200	6
EPAP plus Proposed Project (2015)			4		6
Cumulative (2025)			5		7
Cumulative (2025) plus Proposed Project			5		8

Source: *Highway Capacity Manual (HCM) 2000* methodology per Synchro© v7.
+ Dual left-turn lanes, * Intersection approach with available storage length equal to segment length

Table 10 – Intersection Queuing Evaluation Results for Select Locations (continued)

Intersection / Analysis Scenario	Movement	AM Peak-Hour		PM Peak-Hour	
		Available Storage (ft)	95th % Queue (ft)	Available Storage (ft)	95th % Queue (ft)
#12, Diamond Rd (SR-49) @ Lime Kiln Rd	**NBTH**	(continued)			
EPAP (2015)		1,740*	0	1,740*	0
EPAP plus Proposed Project (2015)			0		0
Cumulative (2025)			0		0
Cumulative (2025) plus Proposed Project			0		0
	SBLT				
EPAP (2015)		100	2	100	2
EPAP plus Proposed Project (2015)			2		3
Cumulative (2025)			2		2
Cumulative (2025) plus Proposed Project			2		3
	SBTH				
EPAP (2015)		725*	0	725*	0
EPAP plus Proposed Project (2015)			0		0
Cumulative (2025)			0		0
Cumulative (2025) plus Proposed Project			0		0
#13, Diamond Rd (SR-49) @ Pleasant Valley Rd	**EBLT**				
EPAP (2015)		180	83	180	185
EPAP plus Proposed Project (2015)			88		202
Cumulative (2025)			97		244
Cumulative (2025) plus Proposed Project			95		272
	SBLT				
EPAP (2015)		525+	192	525+	410
EPAP plus Proposed Project (2015)			200		451
Cumulative (2025)			219		463
Cumulative (2025) plus Proposed Project			221		484
	WBRT				
EPAP (2015)		180	31	180	39
EPAP plus Proposed Project (2015)			32		78
Cumulative (2025)			41		122
Cumulative (2025) plus Proposed Project			36		187
#29, Missouri Flat Rd @ China Garden Rd	**SBLT**				
EPAP (2015)		150	6	150	10
EPAP plus Proposed Project (2015)			6		11
Cumulative (2025)			10		18
Cumulative (2025) plus Proposed Project			10		19
Cumulative (2025) plus Proposed Project (Mitigated)			10		19
	WB				
EPAP (2015)		*	51	*	120
EPAP plus Proposed Project (2015)			54		153
Cumulative (2025)			121		330
Cumulative (2025) plus Proposed Project			119		386
Cumulative (2025) plus Proposed Project (Mitigated)			56		150

Source: *Highway Capacity Manual (HCM) 2000* methodology per Synchro© v7.
+ Dual left-turn lanes, * Intersection approach with available storage length equal to segment length

- Intersection #13, Diamond Road (SR-49) @ Pleasant Valley Road
  - The eastbound left-turn queue is anticipated to exceed the available storage by ninety-two (92) feet under Cumulative (2025) plus Proposed Project Conditions. Because storage is measured to the back of striping delineation, it is presumed that the additional 92-feet required can be accommodated within the existing turn pocket bay taper without adversely affecting adjacent traffic flow. Furthermore, if the left turn queue does spill out of the left turn pocket and taper, the existing roadway width is approximately 20 feet plus a shoulder at the beginning of the taper. This large eastbound lane width would provide the space for vehicles to queue on the left side of the lane while the eastbound through vehicles would be provided space to reasonably bypass the queue.

Peak-Hour Traffic Signal Warrant Evaluation

A planning level assessment of the need for traffic signalization was performed for the un-signalized study intersections. This evaluation was performed consistently with the peak-hour warrant methodologies noted in Section 4C of the *California Manual on Uniform Traffic Control Devices (CMUTCD), 2012 Edition*. A summary of the peak-hour warrant results are presented in Table 10.

The addition of the proposed project results in the peak-hour signal warrant being satisfied at Intersection #32 (Diamond Road (SR-49) @ Site Access Driveway). Detailed results of this analysis are presented in Attachment H.

Table 10 – Traffic Signal Warrant Analysis Results

#	Intersection	Analysis Scenario				
		Existing (2010)	**EPAP (2015)**	**EPAP (2015) plus PP**	**Cumulative (2025)**	**Cum (2025) plus PP**
12	Diamond Road (SR-49) @ Lime Kiln Road	*	*	No / No	*	No / No
15	Pleasant Valley Road (SR-49) @ China Garden Road	Yes / Yes	No / No	No / Yes	No / Yes	No / Yes
22	Missouri Flat Road @ Industrial Drive	No / No	No / No	No / No	No / Yes	No / Yes
28	Missouri Flat Road @ Enterprise Drive	No / Yes	No / Yes	No / Yes	Yes / Yes	Yes / Yes
29	Missouri Flat Road @ China Garden Road	No / Yes	No / Yes	No / Yes	No / Yes	Yes / Yes
30	DSP @ Right-In/Right-Out Site Access Driveway	No / No	No / No	No / No	No / No	No / No
31	DSP @ Right-In Site Access Driveway	No / No	No / No	No / No	No / No	No / No
32	Diamond Road (SR-49) @ Site Access Driveway	No / No	No / No	No / **Yes**[+]	No / No	No / **Yes**[+]

Note: Traffic signal is warranted if peak-hour warrant (Conditions A and/or B) is satisfied, Results are presented in AM / PM format.
[*] Peak hour signal warrant not reported at this intersection in the 7/21/10 Final TIA.
[+] A signal is not desirable at this location due to the close proximity to the Diamond Road (SR-49) @ DSP signal and the Lime Kiln Road/Black Rice Road intersection. A raised median should be considered along Diamond Road (SR-49) restrict left-turns out of the proposed project site.

On-site Circulation and Access Evaluation

The site plan for the proposed project (Attachment I) was qualitatively reviewed for general access and on-site circulation. As discussed above, the original traffic study for the project assumed MRF access via Lime Kiln Road rather than the currently proposed access via Throwita Way. It is our understanding that Throwita Way will remain a County owned and maintained roadway. South of DSP, the project proposes to construct an internal intersection on Throwita Way which will serve as an access point to the Major-1 building to the east, smaller retail buildings to the west, and the existing MRF for the south. To maintain efficient traffic flow on Throwita Way into the DDRC development, this internal intersection should be a two-way-stop-controlled intersection with eastbound and westbound vehicles stop controlled. This internal intersection will likely serve as the focal point of conflicting vehicle and pedestrian movements on site, and the proposed traffic control should minimize the likelihood on on-site vehicle queuing extending to Diamond Springs Parkway as well as extending into the MRF site.

In addition to the relocation of MRF access point, the project proposes to construct an additional right-in/right-out driveway for the project located along DSP immediately east of Throwita Way. This intersection will serve as a by-pass for vehicles desiring to access the eastern portion of the project site (Major-1), instead of using Throwita Way. The addition of this driveway will convert vehicles that were previously eastbound right turns to through vehicles at the DSP intersection with Throwita Way. This modification has the potential of increasing vehicle delay at the DSP/Throwita Way intersection since the previously permissive eastbound right turning vehicles may now be required to stop at the signal (as a through movement). As part of the above LOS and queuing analyses, KHA performed a "sensitivity" analysis on the DSP/Throwita Way intersection to determine if the intersection operations are sensitive to moderate volume changes resulting from this project access modification. It was determined that, with up to a 50 percent conversion of eastbound right-turns to eastbound throughs, the intersection would be required to provide an additional eastbound through lane (total of 2).

Please contact me at (916) 859-3617 or via e-mail at matt.weir@kimley-horn.com if you have any questions or require additional information.

Very truly yours,

KIMLEY-HORN AND ASSOCIATES, INC.

Matthew D. Weir, P.E., T.E., PTOE
PE No. C70216 & TR2424

Attachments:
A – Cumulative (2025) SimTraffic Analysis Worksheets
B – Cumulative (2025) plus Proposed Project SimTraffic Analysis Worksheets
C – Existing plus Approved Projects (2015) plus Proposed Project Peak-Hour Traffic Volumes
D – Existing plus Approved Projects (2015) plus Proposed Project Analysis Worksheets
E – Cumulative (2025) plus Proposed Project Peak-Hour Traffic Volumes
F – Cumulative (2025) plus Proposed Project Analysis Worksheets
G – Cumulative (2025) plus Proposed Project (Mitigated) Analysis Worksheets
H – Signal Warrant Analysis Worksheets
I – Proposed Project Site Plan, dated January 24, 2012

Attachment A:

Cumulative (2025) SimTraffic Analysis Worksheets

Summary of All Intervals

Run Number	1	2	3	4	5	Avg
Start Time	6:55	6:55	6:55	6:55	6:55	6:55
End Time	8:00	8:00	8:00	8:00	8:00	8:00
Total Time (min)	65	65	65	65	65	65
Time Recorded (min)	60	60	60	60	60	60
# of Intervals	3	3	3	3	3	3
# of Recorded Intvls	2	2	2	2	2	2
Vehs Entered	5833	5875	5866	5968	5978	5902
Vehs Exited	5795	5864	5734	5857	5920	5834
Starting Vehs	254	275	266	275	245	260
Ending Vehs	292	286	398	386	303	334
Denied Entry Before	4	14	4	5	3	4
Denied Entry After	645	732	656	683	631	669
Travel Distance (mi)	3169	3223	3169	3250	3251	3212
Travel Time (hr)	653.5	746.0	748.2	739.5	646.0	706.7
Total Delay (hr)	551.4	641.9	646.4	634.6	541.1	603.1
Total Stops	9575	11096	15054	14114	9811	11930
Fuel Used (gal)	241.4	263.4	263.2	264.0	240.9	254.6

Interval #0 Information Seeding

Start Time	6:55
End Time	7:00
Total Time (min)	5

Volumes adjusted by Growth Factors.
No data recorded this interval.

Interval #1 Information peak

Start Time	7:00
End Time	7:15
Total Time (min)	15

Volumes adjusted by PHF, Growth Factors.

Run Number	1	2	3	4	5	Avg
Vehs Entered	1661	1624	1665	1727	1704	1677
Vehs Exited	1539	1450	1444	1543	1554	1506
Starting Vehs	254	275	266	275	245	260
Ending Vehs	376	449	487	459	395	433
Denied Entry Before	4	14	4	5	3	4
Denied Entry After	190	217	130	118	149	161
Travel Distance (mi)	862	835	807	867	890	852
Travel Time (hr)	106.7	121.0	106.0	110.8	95.9	108.1
Total Delay (hr)	79.0	94.2	80.1	82.7	67.2	80.6
Total Stops	2656	3137	3324	3331	2719	3034
Fuel Used (gal)	49.2	51.3	47.4	51.3	47.4	49.3

Interval #2 Information off peak

Start Time	7:15
End Time	8:00
Total Time (min)	45

Volumes adjusted by Growth Factors, Anti PHF.

Run Number	1	2	3	4	5	Avg
Vehs Entered	4172	4251	4201	4241	4274	4227
Vehs Exited	4256	4414	4290	4314	4366	4327
Starting Vehs	376	449	487	459	395	433
Ending Vehs	292	286	398	386	303	334
Denied Entry Before	190	217	130	118	149	161
Denied Entry After	645	732	656	683	631	669
Travel Distance (mi)	2307	2388	2362	2383	2361	2360
Travel Time (hr)	546.8	625.0	642.2	628.8	550.1	598.6
Total Delay (hr)	472.4	547.6	566.4	551.9	473.9	522.4
Total Stops	6919	7959	11730	10783	7092	8897
Fuel Used (gal)	192.2	212.1	215.8	212.8	193.5	205.3

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.3	0.1	0.6	1.9	0.7	1.7	1.5	0.8	0.1	0.6	2.2	0.3
Delay / Veh (s)	41.1	43.6	18.3	67.0	110.2	107.9	41.4	26.7	3.9	101.0	99.9	111.5
Total Stops	22	7	91	115	34	99	109	56	29	28	104	17
Travel Dist (mi)	2.3	0.8	10.5	22.4	5.0	13.1	11.2	9.2	7.1	4.5	18.4	2.5
Travel Time (hr)	0.4	0.1	1.1	2.7	0.8	2.2	2.0	1.1	0.4	0.7	2.7	0.4
Avg Speed (mph)	6	6	10	8	6	6	6	8	17	7	7	7
Fuel Used (gal)	0.1	0.1	0.5	1.1	0.3	0.8	0.8	0.7	0.3	0.3	1.1	0.1
HC Emissions (g)	0	0	5	9	1	3	6	15	3	2	10	2
CO Emissions (g)	28	10	178	264	48	113	186	441	141	119	511	65
NOx Emissions (g)	2	1	16	27	4	10	22	44	13	6	31	4
Vehicles Entered	27	9	123	97	22	58	134	112	86	20	84	11
Vehicles Exited	26	9	123	102	22	55	134	112	88	19	77	10
Hourly Exit Rate	104	36	492	408	88	220	536	448	352	76	308	40
Input Volume	117	40	528	379	93	239	668	560	473	76	369	47
% of Volume	89	90	93	108	95	92	80	80	74	100	83	85
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	All
Total Delay (hr)	10.8
Delay / Veh (s)	49.7
Total Stops	711
Travel Dist (mi)	106.8
Travel Time (hr)	14.6
Avg Speed (mph)	7
Fuel Used (gal)	6.2
HC Emissions (g)	57
CO Emissions (g)	2104
NOx Emissions (g)	179
Vehicles Entered	783
Vehicles Exited	777
Hourly Exit Rate	3108
Input Volume	3589
% of Volume	87
Denied Entry Before	0
Denied Entry After	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.9	0.3	1.4	6.3	3.0	7.0	3.8	1.9	0.3	1.0	4.2	0.5
Delay / Veh (s)	41.3	45.7	14.6	92.6	163.8	148.6	36.5	22.9	4.5	81.1	64.4	53.7
Total Stops	68	21	228	357	132	335	279	131	87	54	230	31
Travel Dist (mi)	6.8	2.0	29.6	56.9	15.4	39.2	30.7	23.7	22.2	9.6	50.8	6.8
Travel Time (hr)	1.2	0.4	2.8	8.4	3.5	8.5	5.1	2.6	1.4	1.3	5.4	0.7
Avg Speed (mph)	6	5	11	7	4	5	6	9	16	8	9	10
Fuel Used (gal)	0.4	0.1	1.3	3.2	1.1	2.8	2.2	1.8	1.0	0.5	2.6	0.3
HC Emissions (g)	3	1	13	19	6	14	18	42	11	5	25	5
CO Emissions (g)	118	31	508	641	195	453	544	1293	440	251	1334	203
NOx Emissions (g)	11	3	44	63	18	41	66	127	42	15	78	13
Vehicles Entered	79	24	348	249	67	171	372	296	271	43	229	31
Vehicles Exited	79	24	346	241	66	169	378	300	269	46	240	33
Hourly Exit Rate	105	32	461	321	88	225	504	400	359	61	320	44
Input Volume	101	35	457	328	81	207	579	483	410	65	320	40
% of Volume	104	91	101	98	109	109	87	83	87	94	100	110
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	All
Total Delay (hr)	30.6
Delay / Veh (s)	50.5
Total Stops	1953
Travel Dist (mi)	293.9
Travel Time (hr)	41.3
Avg Speed (mph)	7
Fuel Used (gal)	17.6
HC Emissions (g)	162
CO Emissions (g)	6013
NOx Emissions (g)	520
Vehicles Entered	2180
Vehicles Exited	2191
Hourly Exit Rate	2921
Input Volume	3106
% of Volume	94
Denied Entry Before	0
Denied Entry After	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.2	0.4	2.0	8.2	3.7	8.7	5.3	2.7	0.4	1.6	6.4	0.8
Delay / Veh (s)	41.3	45.2	15.5	85.2	150.4	138.5	37.8	23.9	4.3	87.3	73.4	67.5
Total Stops	90	29	319	471	166	434	388	187	115	82	334	48
Travel Dist (mi)	9.1	2.8	40.1	79.3	20.3	52.3	42.0	32.9	29.3	14.0	69.2	9.3
Travel Time (hr)	1.6	0.5	3.9	11.0	4.4	10.7	7.1	3.8	1.8	1.9	8.1	1.1
Avg Speed (mph)	6	5	10	7	5	5	6	9	16	8	9	9
Fuel Used (gal)	0.6	0.2	1.8	4.3	1.4	3.5	3.0	2.5	1.3	0.8	3.8	0.5
HC Emissions (g)	3	1	18	28	7	17	24	57	15	7	35	6
CO Emissions (g)	146	42	686	905	243	567	730	1733	582	370	1845	268
NOx Emissions (g)	13	3	60	90	22	51	88	171	55	21	109	17
Vehicles Entered	107	33	471	346	89	228	507	407	357	63	312	42
Vehicles Exited	105	33	469	344	88	224	512	412	357	65	317	42
Hourly Exit Rate	105	33	469	344	88	224	512	412	357	65	317	42
Input Volume	105	36	475	341	84	215	601	502	426	68	332	42
% of Volume	100	91	99	101	105	104	85	82	84	96	95	101
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	All
Total Delay (hr)	41.4
Delay / Veh (s)	50.3
Total Stops	2663
Travel Dist (mi)	400.7
Travel Time (hr)	55.9
Avg Speed (mph)	7
Fuel Used (gal)	23.8
HC Emissions (g)	219
CO Emissions (g)	8117
NOx Emissions (g)	700
Vehicles Entered	2962
Vehicles Exited	2968
Hourly Exit Rate	2968
Input Volume	3227
% of Volume	92
Denied Entry Before	0
Denied Entry After	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	11.2	2.4	1.4	2.0	3.0	0.2	20.1
Delay / Veh (s)	150.8	62.9	54.2	35.0	47.3	8.9	72.2
Total Stops	618	194	109	162	224	19	1326
Travel Dist (mi)	141.4	70.4	7.4	16.0	18.9	5.6	259.7
Travel Time (hr)	16.1	4.9	1.7	2.4	3.7	0.4	29.1
Avg Speed (mph)	9	15	4	7	5	13	9
Fuel Used (gal)	6.7	2.7	0.6	1.1	1.5	0.3	12.8
HC Emissions (g)	73	40	5	15	16	4	152
CO Emissions (g)	1519	877	112	419	382	101	3410
NOx Emissions (g)	196	112	14	48	46	13	429
Vehicles Entered	292	144	93	204	234	76	1043
Vehicles Exited	243	128	93	198	227	75	964
Hourly Exit Rate	972	512	372	792	908	300	3856
Input Volume	1124	616	500	1052	973	328	4593
% of Volume	86	83	74	75	93	91	84
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	4	2	0	0	0	0	6

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	37.2	13.0	3.3	5.1	7.1	0.4	66.2
Delay / Veh (s)	181.5	119.0	44.0	35.8	40.0	6.8	86.1
Total Stops	2044	844	295	403	580	37	4203
Travel Dist (mi)	383.7	204.6	21.0	40.0	51.9	15.9	717.1
Travel Time (hr)	50.6	20.3	4.0	6.1	8.9	1.1	91.0
Avg Speed (mph)	8	11	5	7	6	14	8
Fuel Used (gal)	19.8	9.2	1.5	2.7	3.9	0.8	37.9
HC Emissions (g)	224	99	19	42	37	7	428
CO Emissions (g)	4492	2338	413	1123	996	250	9612
NOx Emissions (g)	576	287	53	124	122	30	1193
Vehicles Entered	725	391	264	504	632	214	2730
Vehicles Exited	753	397	272	519	646	215	2802
Hourly Exit Rate	1004	529	363	692	861	287	3736
Input Volume	975	533	433	912	843	284	3980
% of Volume	103	99	84	76	102	101	94
Denied Entry Before	4	2	0	0	0	0	6
Denied Entry After	0	0	0	0	0	0	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	48.4	15.4	4.7	7.0	10.1	0.6	86.3
Delay / Veh (s)	173.3	104.6	46.6	35.6	42.0	7.4	82.4
Total Stops	2663	1039	405	565	804	57	5533
Travel Dist (mi)	525.1	275.0	28.4	56.0	70.9	21.4	976.9
Travel Time (hr)	66.7	25.1	5.7	8.4	12.6	1.6	120.1
Avg Speed (mph)	8	12	5	7	6	14	8
Fuel Used (gal)	26.5	11.9	2.1	3.8	5.3	1.1	50.7
HC Emissions (g)	297	139	24	58	53	11	581
CO Emissions (g)	6012	3215	525	1542	1378	351	13022
NOx Emissions (g)	772	399	68	172	168	43	1622
Vehicles Entered	1017	535	357	708	866	289	3772
Vehicles Exited	996	525	365	717	873	290	3766
Hourly Exit Rate	996	525	365	717	873	290	3766
Input Volume	1012	554	450	947	876	295	4133
% of Volume	98	95	81	76	100	98	91
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	3.1	15.3	1.7	0.0	1.4	2.4	23.9
Delay / Veh (s)	382.8	754.4	22.1	4.1	70.3	21.9	100.3
Total Stops	53	186	82	6	86	206	619
Travel Dist (mi)	5.5	14.9	9.6	0.5	5.8	32.5	68.8
Travel Time (hr)	3.3	15.8	1.9	0.0	1.6	3.4	26.1
Avg Speed (mph)	3	1	6	12	4	9	3
Fuel Used (gal)	0.9	3.9	0.7	0.0	0.5	1.8	7.8
HC Emissions (g)	10	20	17	0	6	23	76
CO Emissions (g)	213	472	262	7	126	496	1576
NOx Emissions (g)	18	28	25	1	16	74	162
Vehicles Entered	32	98	273	15	71	393	882
Vehicles Exited	26	50	275	15	72	394	832
Hourly Exit Rate	104	200	1100	60	288	1576	3328
Input Volume	188	576	1392	61	299	1773	4289
% of Volume	55	35	79	98	96	89	78
Denied Entry Before	0	0	1	0	0	0	1
Denied Entry After	19	51	1	0	0	0	71

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	47.0	169.8	3.6	0.0	3.4	6.8	230.6
Delay / Veh (s)	3380.9	4102.4	17.9	4.5	62.9	20.6	353.8
Total Stops	156	514	224	16	211	603	1724
Travel Dist (mi)	9.7	29.1	25.5	1.2	15.7	98.5	179.7
Travel Time (hr)	47.3	170.9	4.3	0.1	3.9	9.9	236.5
Avg Speed (mph)	1	1	7	11	4	10	3
Fuel Used (gal)	11.0	39.4	1.7	0.0	1.3	5.4	58.8
HC Emissions (g)	63	199	30	0	12	70	375
CO Emissions (g)	1341	4309	525	10	289	1569	8044
NOx Emissions (g)	62	182	60	1	35	230	571
Vehicles Entered	48	147	737	33	193	1189	2347
Vehicles Exited	52	151	731	33	195	1186	2348
Hourly Exit Rate	69	201	975	44	260	1581	3131
Input Volume	163	499	1205	53	259	1538	3717
% of Volume	43	40	81	83	100	103	84
Denied Entry Before	19	51	1	0	0	0	71
Denied Entry After	90	276	0	0	0	0	366

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	50.0	185.1	5.3	0.1	4.8	9.2	254.5
Delay / Veh (s)	2280.3	3001.5	19.0	4.4	64.9	21.0	286.0
Total Stops	209	700	305	21	298	809	2342
Travel Dist (mi)	15.2	44.0	35.1	1.7	21.4	131.0	248.4
Travel Time (hr)	50.6	186.7	6.2	0.2	5.5	13.4	262.6
Avg Speed (mph)	2	1	7	12	4	10	3
Fuel Used (gal)	11.8	43.3	2.3	0.1	1.9	7.2	66.6
HC Emissions (g)	74	219	47	1	18	93	451
CO Emissions (g)	1555	4781	787	17	415	2065	9620
NOx Emissions (g)	80	211	86	2	52	304	734
Vehicles Entered	80	245	1010	48	264	1582	3229
Vehicles Exited	78	200	1006	48	267	1581	3180
Hourly Exit Rate	78	200	1006	48	267	1581	3180
Input Volume	169	518	1252	55	269	1597	3860
% of Volume	46	39	80	87	99	99	82
Denied Entry Before	0	0	1	0	0	0	1
Denied Entry After	90	276	0	0	0	0	366

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	12.7	3.7	0.3	1.5	0.6	1.6	0.0	20.5
Delay / Veh (s)	1389.9	1110.8	56.5	20.7	7.9	13.5	1.7	69.1
Total Stops	88	32	24	128	4	69	0	345
Travel Dist (mi)	4.9	1.9	1.5	18.7	9.6	14.5	1.0	52.2
Travel Time (hr)	12.9	3.8	0.4	1.9	0.9	2.0	0.1	21.9
Avg Speed (mph)	1	1	4	10	10	8	14	4
Fuel Used (gal)	3.1	0.9	0.1	0.9	0.4	1.1	0.0	6.5
HC Emissions (g)	6	3	0	7	3	13	0	33
CO Emissions (g)	243	90	18	300	66	327	9	1053
NOx Emissions (g)	11	4	2	25	8	49	1	101
Vehicles Entered	40	14	21	253	288	422	37	1075
Vehicles Exited	27	10	21	255	286	421	37	1057
Hourly Exit Rate	108	40	84	1020	1144	1684	148	4228
Input Volume	386	144	73	1039	1157	2183	213	5195
% of Volume	28	28	115	98	99	77	69	81
Denied Entry Before	1	0	0	0	0	1	0	2
Denied Entry After	62	21	0	0	0	0	0	83

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	130.6	45.0	0.8	3.2	1.3	4.5	0.1	185.5
Delay / Veh (s)	5054.0	5065.9	55.7	17.6	6.4	13.0	2.1	226.0
Total Stops	329	100	50	307	6	214	1	1007
Travel Dist (mi)	15.6	5.3	3.6	48.6	25.3	42.8	3.4	144.6
Travel Time (hr)	131.1	45.2	0.9	4.3	2.1	5.6	0.2	189.5
Avg Speed (mph)	1	1	4	11	12	8	15	3
Fuel Used (gal)	30.4	10.5	0.3	2.1	0.7	3.4	0.1	47.4
HC Emissions (g)	71	36	1	18	5	41	1	174
CO Emissions (g)	2320	935	34	745	127	1126	41	5328
NOx Emissions (g)	70	32	3	61	14	156	5	341
Vehicles Entered	90	32	50	661	759	1241	124	2957
Vehicles Exited	95	32	50	651	762	1236	125	2951
Hourly Exit Rate	127	43	67	868	1016	1648	167	3935
Input Volume	334	125	64	900	1002	1891	185	4501
% of Volume	38	34	104	96	101	87	90	87
Denied Entry Before	62	21	0	0	0	0	0	83
Denied Entry After	219	82	0	0	0	1	0	302

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	143.3	48.7	1.1	4.7	2.0	6.0	0.1	205.9
Delay / Veh (s)	4094.4	3987.3	55.9	18.5	6.8	13.1	2.0	184.4
Total Stops	417	132	74	435	10	282	1	1351
Travel Dist (mi)	20.5	7.3	5.1	67.3	34.9	57.3	4.4	196.8
Travel Time (hr)	144.0	49.0	1.3	6.2	3.0	7.6	0.3	211.4
Avg Speed (mph)	1	1	4	11	12	8	15	4
Fuel Used (gal)	33.4	11.4	0.4	3.0	1.1	4.5	0.2	53.9
HC Emissions (g)	78	39	1	26	8	54	1	207
CO Emissions (g)	2563	1026	52	1045	192	1453	50	6381
NOx Emissions (g)	80	36	5	86	23	206	6	442
Vehicles Entered	130	46	71	914	1047	1663	162	4033
Vehicles Exited	122	42	71	906	1048	1657	162	4008
Hourly Exit Rate	122	42	71	906	1048	1657	162	4008
Input Volume	347	130	66	935	1041	1964	192	4674
% of Volume	35	32	107	97	101	84	84	86
Denied Entry Before	1	0	0	0	0	1	0	2
Denied Entry After	219	82	0	0	0	1	0	302

Total Network Performance By Interval

Interval Start	7:00	7:15	All
Total Delay (hr)	80.6	522.4	603.1
Delay / Veh (s)	182.3	439.6	369.8
Total Stops	3034	8897	11930
Travel Dist (mi)	852.2	2360.2	3212.4
Travel Time (hr)	108.1	598.6	706.7
Avg Speed (mph)	9	8	9
Fuel Used (gal)	49.3	205.3	254.6
HC Emissions (g)	525	1752	2278
CO Emissions (g)	16655	53948	70603
NOx Emissions (g)	1603	4767	6370
Vehicles Entered	1677	4227	5902
Vehicles Exited	1506	4327	5834
Hourly Exit Rate	6024	5769	5834
Input Volume	29405	25475	26458
% of Volume	20	23	22
Denied Entry Before	4	161	4
Denied Entry After	161	669	669

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	240	171	466	644	235	231	217	143	71	109	282	292
Average Queue (ft)	165	98	264	480	158	170	100	86	30	75	186	215
95th Queue (ft)	259	183	555	730	243	239	230	148	66	129	331	354
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)							0					
Queuing Penalty (veh)							0					
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1				18	44	
Queuing Penalty (veh)					0	1				34	33	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	289	200	850	895	232	242	208	172	141	109	285	305
Average Queue (ft)	158	74	413	592	132	149	72	67	35	56	126	157
95th Queue (ft)	257	146	1003	1092	222	234	174	141	88	109	245	265
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)			0	3			0					
Queuing Penalty (veh)			0	0			1					
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1				5	25	
Queuing Penalty (veh)					1	1				8	16	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	290	212	864	895	240	246	270	190	141	109	317	332
Average Queue (ft)	160	80	377	565	138	154	79	72	33	61	141	171
95th Queue (ft)	258	157	921	1024	229	237	190	144	83	116	273	294
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)			0	2			0					
Queuing Penalty (veh)			0	0			0					
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1				8	30	
Queuing Penalty (veh)					1	1				14	20	

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2056	2127	624	184	168	224	371	310	378	391	260
Average Queue (ft)	948	994	371	60	138	190	305	237	347	347	155
95th Queue (ft)	2095	2146	779	219	192	266	415	358	418	445	363
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	1	1					5	1	10	10	
Queuing Penalty (veh)	0	0					36	11	61	62	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		25	2	0	13	20	27			18	0
Queuing Penalty (veh)		156	11	0	68	103	133			59	1

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	1715	1738	601	401	174	224	357	362	380	385	260
Average Queue (ft)	1135	1160	345	66	127	183	244	220	301	299	117
95th Queue (ft)	2705	2738	771	246	194	263	368	334	401	416	329
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	4	5					3	1	3	3	
Queuing Penalty (veh)	0	0					18	4	14	19	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		21	2	0	7	15	23			11	0
Queuing Penalty (veh)		112	10	0	32	68	98			30	0

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2187	2204	627	509	174	224	379	366	381	394	260
Average Queue (ft)	1090	1120	352	64	130	185	259	224	312	311	126
95th Queue (ft)	2575	2611	774	240	194	264	387	340	412	428	339
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	3	4					3	1	4	5	
Queuing Penalty (veh)	0	0					23	6	26	29	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		22	2	0	9	16	24			12	0
Queuing Penalty (veh)		123	10	0	41	77	107			37	0

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1051	570	148	147	98	160	224	375	390
Average Queue (ft)	410	807	515	141	106	28	120	164	320	347
95th Queue (ft)	871	1315	680	148	173	89	178	237	425	415
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		43		40	12	0			6	8
Queuing Penalty (veh)		0		285	88	0			66	88
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	5	59	54		17		9	27	15	
Queuing Penalty (veh)	31	226	256		10		82	236	45	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1075	594	148	154	99	167	224	374	382
Average Queue (ft)	591	1047	568	140	94	27	100	137	296	321
95th Queue (ft)	930	1063	589	148	171	88	157	227	414	425
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		84		37	9	0			3	5
Queuing Penalty (veh)		0		229	53	0			26	44
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	9	91	70		13	0	5	10	15	
Queuing Penalty (veh)	49	299	287		7	0	36	78	39	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1075	594	149	154	110	173	224	377	398
Average Queue (ft)	547	989	555	140	97	27	105	143	302	327
95th Queue (ft)	941	1291	646	148	172	88	164	232	418	426
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		74		38	10	0			4	6
Queuing Penalty (veh)		0		243	62	0			36	55
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	8	83	66		14	0	6	14	15	
Queuing Penalty (veh)	45	281	279		8	0	47	117	40	

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	897	63	150	350	288	62	72	318	158	138	11
Average Queue (ft)	201	811	14	70	246	147	9	19	59	135	123	2
95th Queue (ft)	224	1120	54	154	411	316	95	94	316	155	140	17
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		67			4	0	0			35	35	
Queuing Penalty (veh)		0			0	0	0			277	277	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	93	0			12	0	0					
Queuing Penalty (veh)	314	0			9	2	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	T	T	T	T	R
Maximum Queue (ft)	210	918	58	196	348	254	27	19	154	144	33
Average Queue (ft)	207	891	13	55	189	90	2	1	133	122	3
95th Queue (ft)	217	907	46	128	315	197	25	15	146	139	27
Link Distance (ft)		878			320	320	861	861	114	114	114
Upstream Blk Time (%)		87			1	0			35	34	0
Queuing Penalty (veh)		0			0	0			236	233	0
Storage Bay Dist (ft)	185		185	200							
Storage Blk Time (%)	95	0		0	5	0					
Queuing Penalty (veh)	276	0		0	3	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	918	72	210	382	325	62	99	318	167	145	33
Average Queue (ft)	206	872	13	58	203	104	2	6	15	133	122	3
95th Queue (ft)	220	1035	48	135	345	235	45	50	149	149	140	25
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		82			2	0	0			35	35	0
Queuing Penalty (veh)		0			0	0	0			246	244	0
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	94	0		0	7	0	0					
Queuing Penalty (veh)	286	0		0	5	1	0					

Network Summary

Network wide Queuing Penalty, Interval #1: 3062
Network wide Queuing Penalty, Interval #2: 2328
Network wide Queuing Penalty, All Intervals: 2511

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.1	32.6	25.5	22.8	16.8	31.5
g/C Ratio	0.08	0.30	0.23	0.21	0.15	0.29
Cycles Skipped (%)	14	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	29	100	50	88	100	100
Cycles with Peds (%)	0	13	13	0	0	14

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	8.7	34.2	24.8	22.8	17.1	30.5
g/C Ratio	0.06	0.31	0.22	0.21	0.16	0.28
Cycles Skipped (%)	21	0	4	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	17	100	38	80	100	92
Cycles with Peds (%)	0	16	13	0	0	17

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	9.1	33.8	25.0	22.8	17.1	30.7
g/C Ratio	0.07	0.31	0.22	0.21	0.16	0.28
Cycles Skipped (%)	19	0	3	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	23	100	41	82	100	97
Cycles with Peds (%)	0	18	13	0	0	16

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	58.8	43.2	17.8	37.0
g/C Ratio	0.53	0.39	0.16	0.34
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	63	100
Cycles with Peds (%)	13	0	0	0

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	58.0	44.7	17.3	36.4
g/C Ratio	0.53	0.41	0.16	0.33
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	92	44	100
Cycles with Peds (%)	13	0	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	58.2	44.4	17.4	36.5
g/C Ratio	0.53	0.40	0.16	0.33
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	94	48	100
Cycles with Peds (%)	13	0	0	9

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.0	4.4	29.0	73.0
g/C Ratio	0.13	0.04	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	1	0	14

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	13.9	1.9	29.1	72.9
g/C Ratio	0.13	0.02	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	96	100	100	100
Cycles with Peds (%)	0	13	0	8

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	13.9	2.2	29.1	72.9
g/C Ratio	0.13	0.02	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	97	100	100	100
Cycles with Peds (%)	0	11	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	73.0	29.0	10.7	59.9
g/C Ratio	0.66	0.26	0.10	0.54
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	14	100
Cycles with Peds (%)	0	13	0	14

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	72.8	29.2	9.3	61.6
g/C Ratio	0.66	0.27	0.07	0.56
Cycles Skipped (%)	0	0	13	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	0	100
Cycles with Peds (%)	0	12	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	72.8	29.2	9.3	61.2
g/C Ratio	0.66	0.27	0.08	0.56
Cycles Skipped (%)	0	0	10	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	3	100
Cycles with Peds (%)	0	12	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Summary of All Intervals

Run Number	1	2	4	5	Avg
Start Time	4:55	4:55	4:55	4:55	4:55
End Time	6:00	6:00	6:00	6:00	6:00
Total Time (min)	65	65	65	65	65
Time Recorded (min)	60	60	60	60	60
# of Intervals	3	3	3	3	3
# of Recorded Intvls	2	2	2	2	2
Vehs Entered	5935	5911	6073	5917	5959
Vehs Exited	5677	5660	5755	5687	5694
Starting Vehs	312	337	297	337	323
Ending Vehs	570	588	615	567	584
Denied Entry Before	8	1	6	6	4
Denied Entry After	1078	1262	1176	1182	1175
Travel Distance (mi)	2984	2978	3043	2966	2993
Travel Time (hr)	1038.0	1165.7	1119.9	1062.4	1096.5
Total Delay (hr)	941.5	1069.6	1021.6	966.4	999.8
Total Stops	17553	18081	17958	16724	17579
Fuel Used (gal)	325.6	355.6	346.3	330.8	339.6

Interval #0 Information Seeding

Start Time	4:55
End Time	5:00
Total Time (min)	5

Volumes adjusted by Growth Factors.
No data recorded this interval.

Interval #1 Information peak

Start Time	5:00
End Time	5:15
Total Time (min)	15

Volumes adjusted by PHF, Growth Factors.

Run Number	1	2	4	5	Avg
Vehs Entered	1642	1628	1636	1589	1622
Vehs Exited	1443	1423	1466	1477	1454
Starting Vehs	312	337	297	337	323
Ending Vehs	511	542	467	449	491
Denied Entry Before	8	1	6	6	4
Denied Entry After	259	336	305	264	289
Travel Distance (mi)	790	777	797	790	789
Travel Time (hr)	133.5	152.3	132.2	128.0	136.5
Total Delay (hr)	107.8	127.1	106.4	102.4	110.9
Total Stops	3679	3781	3642	3224	3584
Fuel Used (gal)	53.9	57.8	53.3	52.1	54.3

Interval #2 Information off peak

Start Time	5:15
End Time	6:00
Total Time (min)	45

Volumes adjusted by Growth Factors, Anti PHF.

Run Number	1	2	4	5	Avg
Vehs Entered	4293	4283	4437	4328	4335
Vehs Exited	4234	4237	4289	4210	4243
Starting Vehs	511	542	467	449	491
Ending Vehs	570	588	615	567	584
Denied Entry Before	259	336	305	264	289
Denied Entry After	1078	1262	1176	1182	1175
Travel Distance (mi)	2193	2200	2246	2176	2204
Travel Time (hr)	904.5	1013.4	987.7	934.4	960.0
Total Delay (hr)	833.7	942.6	915.2	864.0	888.9
Total Stops	13874	14300	14316	13500	13996
Fuel Used (gal)	271.6	297.8	293.1	278.7	285.3

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.6	0.2	0.9	2.6	1.1	2.7	1.1	0.6	0.1	1.4	7.6	0.9
Delay / Veh (s)	55.9	58.0	23.4	133.7	207.4	210.7	35.3	24.1	4.3	279.0	259.4	255.5
Total Stops	38	13	111	128	45	120	90	37	30	54	262	32
Travel Dist (mi)	3.1	1.1	12.1	16.3	4.4	10.7	9.4	7.3	7.0	4.2	23.9	3.1
Travel Time (hr)	0.7	0.3	1.5	3.2	1.2	3.1	1.5	0.8	0.4	1.5	8.2	1.0
Avg Speed (mph)	5	4	8	5	4	3	6	9	16	3	3	3
Fuel Used (gal)	0.2	0.1	0.6	1.1	0.4	0.9	0.7	0.5	0.3	0.5	2.5	0.3
HC Emissions (g)	2	2	6	6	1	4	3	10	5	4	13	2
CO Emissions (g)	51	33	202	216	47	139	129	338	159	121	578	63
NOx Emissions (g)	5	4	19	19	4	11	15	31	15	8	36	4
Vehicles Entered	38	13	144	72	22	50	114	90	86	22	120	16
Vehicles Exited	36	12	141	69	16	42	117	94	85	15	90	11
Hourly Exit Rate	144	48	564	276	64	168	468	376	340	60	360	44
Input Volume	136	46	610	323	79	203	670	519	476	107	492	67
% of Volume	106	104	92	85	81	83	70	72	71	56	73	66
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	2	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	All
Total Delay (hr)	19.9
Delay / Veh (s)	94.5
Total Stops	960
Travel Dist (mi)	102.6
Travel Time (hr)	23.5
Avg Speed (mph)	4
Fuel Used (gal)	8.1
HC Emissions (g)	56
CO Emissions (g)	2076
NOx Emissions (g)	170
Vehicles Entered	787
Vehicles Exited	728
Hourly Exit Rate	2912
Input Volume	3728
% of Volume	78
Denied Entry Before	0
Denied Entry After	2

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.0	0.4	2.2	4.9	2.6	5.0	2.9	1.8	0.3	12.0	57.8	8.3
Delay / Veh (s)	44.1	51.0	20.2	89.3	159.7	133.5	33.6	26.5	4.1	733.3	727.6	715.5
Total Stops	68	22	294	263	110	234	237	118	86	272	1287	191
Travel Dist (mi)	6.8	2.1	33.6	45.2	13.6	30.7	25.8	19.7	18.5	12.9	61.4	9.4
Travel Time (hr)	1.2	0.4	3.8	6.6	3.1	6.2	4.0	2.4	1.1	12.4	59.3	8.6
Avg Speed (mph)	5	5	9	7	4	5	6	8	17	1	1	1
Fuel Used (gal)	0.5	0.2	1.6	2.6	1.0	2.1	1.8	1.5	0.8	3.1	15.0	2.2
HC Emissions (g)	2	1	20	15	4	12	14	31	9	17	57	8
CO Emissions (g)	102	30	637	506	141	362	458	1014	377	406	1628	237
NOx Emissions (g)	9	3	60	48	12	35	53	93	32	28	107	15
Vehicles Entered	79	24	392	194	56	129	312	244	224	62	302	44
Vehicles Exited	80	25	397	204	62	142	310	242	225	57	270	41
Hourly Exit Rate	107	33	529	272	83	189	413	323	300	76	360	55
Input Volume	117	39	529	280	68	176	581	450	412	92	427	58
% of Volume	91	85	100	97	122	108	71	72	73	83	84	94
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	2	0
Denied Entry After	0	0	0	0	0	0	0	0	0	4	23	2

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	All
Total Delay (hr)	99.2
Delay / Veh (s)	173.7
Total Stops	3182
Travel Dist (mi)	279.7
Travel Time (hr)	109.1
Avg Speed (mph)	3
Fuel Used (gal)	32.3
HC Emissions (g)	190
CO Emissions (g)	5898
NOx Emissions (g)	495
Vehicles Entered	2062
Vehicles Exited	2055
Hourly Exit Rate	2740
Input Volume	3229
% of Volume	85
Denied Entry Before	2
Denied Entry After	29

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.5	0.6	3.1	7.6	3.7	7.7	4.0	2.4	0.4	13.4	65.4	9.3
Delay / Veh (s)	47.9	54.8	21.1	101.0	171.3	153.0	34.1	25.8	4.2	619.0	603.4	595.9
Total Stops	106	34	404	391	155	354	327	156	117	326	1549	222
Travel Dist (mi)	9.9	3.1	45.7	61.5	17.9	41.4	35.2	27.0	25.5	17.2	85.3	12.5
Travel Time (hr)	2.0	0.7	5.3	9.8	4.3	9.3	5.5	3.2	1.5	13.9	67.5	9.6
Avg Speed (mph)	5	5	9	6	4	4	6	8	17	2	2	1
Fuel Used (gal)	0.7	0.2	2.3	3.7	1.4	3.0	2.4	2.0	1.1	3.6	17.5	2.5
HC Emissions (g)	4	2	26	21	5	16	17	41	13	20	70	9
CO Emissions (g)	154	63	839	721	188	502	587	1352	536	527	2206	300
NOx Emissions (g)	14	6	79	67	16	45	68	124	47	37	143	19
Vehicles Entered	116	37	536	266	78	180	425	334	309	84	422	60
Vehicles Exited	115	38	538	273	79	184	426	336	310	72	360	52
Hourly Exit Rate	115	38	538	273	79	184	426	336	310	72	360	52
Input Volume	122	41	549	291	71	183	603	467	428	96	443	60
% of Volume	94	93	98	94	112	101	71	72	72	75	81	86
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	4	23	2

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	All
Total Delay (hr)	119.1
Delay / Veh (s)	152.3
Total Stops	4141
Travel Dist (mi)	382.3
Travel Time (hr)	132.6
Avg Speed (mph)	3
Fuel Used (gal)	40.4
HC Emissions (g)	245
CO Emissions (g)	7974
NOx Emissions (g)	665
Vehicles Entered	2847
Vehicles Exited	2783
Hourly Exit Rate	2783
Input Volume	3354
% of Volume	83
Denied Entry Before	0
Denied Entry After	29

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	11.9	2.1	1.1	1.4	3.5	0.3	20.3
Delay / Veh (s)	196.6	65.8	39.6	28.9	57.8	10.9	79.9
Total Stops	601	210	109	116	239	26	1301
Travel Dist (mi)	120.9	61.0	7.9	13.7	17.8	6.3	227.6
Travel Time (hr)	16.1	4.2	1.4	1.8	4.1	0.6	28.2
Avg Speed (mph)	8	15	6	8	4	12	8
Fuel Used (gal)	6.2	2.3	0.5	0.9	1.5	0.3	11.7
HC Emissions (g)	68	30	7	16	15	4	140
CO Emissions (g)	1369	728	144	461	351	102	3155
NOx Emissions (g)	173	88	20	48	43	14	384
Vehicles Entered	252	124	100	171	219	87	953
Vehicles Exited	185	104	103	178	220	86	876
Hourly Exit Rate	740	416	412	712	880	344	3504
Input Volume	1053	560	573	1072	1061	393	4712
% of Volume	70	74	72	66	83	88	74
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	117.0	49.1	3.3	4.0	10.0	0.7	184.1
Delay / Veh (s)	729.0	595.6	40.5	30.6	56.0	9.9	262.6
Total Stops	3908	1677	313	352	682	68	7000
Travel Dist (mi)	291.5	150.1	23.1	38.0	52.5	17.6	572.9
Travel Time (hr)	127.2	54.4	4.1	5.0	11.8	1.5	204.0
Avg Speed (mph)	3	4	6	8	4	12	3
Fuel Used (gal)	35.6	16.0	1.5	2.5	4.4	0.9	61.0
HC Emissions (g)	253	101	16	39	49	12	471
CO Emissions (g)	5461	2632	368	1155	1112	316	11044
NOx Emissions (g)	541	251	49	119	134	42	1136
Vehicles Entered	594	308	292	481	650	240	2565
Vehicles Exited	562	287	288	472	636	239	2484
Hourly Exit Rate	749	383	384	629	848	319	3312
Input Volume	913	485	497	929	919	341	4084
% of Volume	82	79	77	68	92	93	81
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	90	49	0	0	0	0	139

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	129.0	51.2	4.4	5.4	13.5	0.9	204.4
Delay / Veh (s)	582.5	448.6	40.3	30.1	56.4	10.1	214.1
Total Stops	4508	1886	422	468	922	94	8300
Travel Dist (mi)	412.5	211.1	31.0	51.8	70.3	23.9	800.5
Travel Time (hr)	143.3	58.7	5.5	6.8	15.9	2.0	232.1
Avg Speed (mph)	4	5	6	8	4	12	4
Fuel Used (gal)	41.8	18.3	2.0	3.4	5.9	1.2	72.7
HC Emissions (g)	322	131	23	55	65	15	611
CO Emissions (g)	6830	3360	512	1616	1463	418	14199
NOx Emissions (g)	713	339	68	167	177	56	1520
Vehicles Entered	847	432	392	652	869	327	3519
Vehicles Exited	747	390	390	650	856	326	3359
Hourly Exit Rate	747	390	390	650	856	326	3359
Input Volume	948	504	516	965	954	354	4241
% of Volume	79	77	76	67	90	92	79
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	90	49	0	0	0	0	139

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	5.8	25.7	1.7	0.0	1.1	3.2	37.6
Delay / Veh (s)	694.8	1029.9	24.9	15.4	55.2	35.5	175.1
Total Stops	69	328	82	5	96	222	802
Travel Dist (mi)	5.6	17.6	8.6	0.3	6.0	26.9	65.0
Travel Time (hr)	6.0	26.4	1.9	0.1	1.4	4.0	39.8
Avg Speed (mph)	3	1	5	8	4	7	3
Fuel Used (gal)	1.5	6.4	0.7	0.0	0.5	1.8	10.9
HC Emissions (g)	18	48	13	1	4	21	104
CO Emissions (g)	336	926	231	12	101	463	2070
NOx Emissions (g)	27	60	25	1	14	66	192
Vehicles Entered	30	99	245	10	75	324	783
Vehicles Exited	30	82	247	10	75	321	765
Hourly Exit Rate	120	328	988	40	300	1284	3060
Input Volume	294	928	1380	70	351	1734	4757
% of Volume	41	35	72	57	85	74	64
Denied Entry Before	0	1	0	0	0	0	1
Denied Entry After	37	126	1	0	0	0	164

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	74.9	261.7	5.5	0.2	3.4	9.5	355.3
Delay / Veh (s)	3595.3	3568.7	27.7	21.1	59.9	34.6	557.8
Total Stops	242	992	229	20	273	687	2443
Travel Dist (mi)	15.1	51.4	25.1	1.4	16.5	81.4	190.9
Travel Time (hr)	75.4	263.6	6.2	0.3	4.0	12.0	361.6
Avg Speed (mph)	2	1	6	11	4	7	3
Fuel Used (gal)	17.5	60.8	2.1	0.1	1.4	5.5	87.5
HC Emissions (g)	78	378	63	6	14	65	605
CO Emissions (g)	1870	7502	1000	78	326	1423	12201
NOx Emissions (g)	83	346	92	6	42	211	779
Vehicles Entered	80	269	717	41	200	982	2289
Vehicles Exited	72	259	716	41	210	998	2296
Hourly Exit Rate	96	345	955	55	280	1331	3061
Input Volume	255	804	1196	61	304	1504	4124
% of Volume	38	43	80	90	92	88	74
Denied Entry Before	37	126	1	0	0	0	164
Denied Entry After	149	466	4	0	0	0	619

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	80.7	287.5	7.2	0.3	4.6	12.7	392.9
Delay / Veh (s)	2740.5	2923.2	27.0	20.0	58.7	34.8	461.3
Total Stops	311	1321	311	25	369	909	3246
Travel Dist (mi)	20.7	69.0	33.7	1.7	22.5	108.3	256.0
Travel Time (hr)	81.4	290.0	8.1	0.4	5.4	16.1	401.3
Avg Speed (mph)	2	1	5	10	4	7	3
Fuel Used (gal)	19.1	67.2	2.9	0.1	1.9	7.3	98.3
HC Emissions (g)	96	426	76	7	19	86	710
CO Emissions (g)	2206	8429	1232	90	427	1885	14270
NOx Emissions (g)	110	406	117	7	55	277	971
Vehicles Entered	110	368	962	50	275	1306	3071
Vehicles Exited	102	341	963	51	285	1319	3061
Hourly Exit Rate	102	341	963	51	285	1319	3061
Input Volume	265	835	1242	63	316	1562	4282
% of Volume	39	41	78	81	90	84	71
Denied Entry Before	0	1	0	0	0	0	1
Denied Entry After	149	466	4	0	0	0	619

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	14.1	3.7	0.2	2.2	0.7	1.5	0.0	22.5
Delay / Veh (s)	1448.5	1203.5	45.7	35.8	9.0	14.6	2.8	81.9
Total Stops	98	33	22	149	6	64	1	373
Travel Dist (mi)	5.2	1.6	1.3	16.6	9.6	12.9	1.0	48.2
Travel Time (hr)	14.3	3.7	0.3	2.6	1.0	1.9	0.1	23.9
Avg Speed (mph)	1	1	5	6	10	7	14	3
Fuel Used (gal)	3.4	0.9	0.1	1.1	0.4	1.1	0.0	7.0
HC Emissions (g)	3	3	1	10	2	13	0	34
CO Emissions (g)	220	82	23	323	63	356	13	1080
NOx Emissions (g)	9	4	3	32	8	50	2	107
Vehicles Entered	43	12	18	224	290	376	38	1001
Vehicles Exited	28	9	18	222	287	371	38	973
Hourly Exit Rate	112	36	72	888	1148	1484	152	3892
Input Volume	421	160	84	1000	1321	2443	272	5701
% of Volume	27	22	86	89	87	61	56	68
Denied Entry Before	0	0	0	0	0	0	0	0
Denied Entry After	57	24	0	0	0	0	0	81

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	143.2	55.3	0.8	5.4	2.2	4.5	0.1	211.6
Delay / Veh (s)	6365.4	6225.4	51.5	29.8	8.9	14.0	2.1	252.7
Total Stops	261	110	64	395	17	192	1	1040
Travel Dist (mi)	13.9	5.7	4.1	48.1	29.7	39.5	3.6	144.5
Travel Time (hr)	143.7	55.6	0.9	6.5	3.1	5.7	0.3	215.8
Avg Speed (mph)	1	1	4	7	10	7	14	3
Fuel Used (gal)	33.2	12.7	0.3	2.8	1.3	3.3	0.1	53.7
HC Emissions (g)	77	46	2	23	8	40	2	196
CO Emissions (g)	2509	1160	50	809	195	1064	47	5833
NOx Emissions (g)	70	39	5	76	25	150	6	371
Vehicles Entered	80	35	56	649	890	1161	136	3007
Vehicles Exited	82	30	54	660	891	1167	136	3020
Hourly Exit Rate	109	40	72	880	1188	1556	181	4027
Input Volume	365	139	73	867	1145	2117	236	4942
% of Volume	30	29	99	101	104	74	77	81
Denied Entry Before	57	24	0	0	0	0	0	81
Denied Entry After	261	100	0	0	0	1	0	362

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	157.3	59.0	1.0	7.6	2.9	6.0	0.1	234.0
Delay / Veh (s)	4881.8	4940.8	50.1	31.3	8.9	14.1	2.2	210.6
Total Stops	359	143	87	544	22	256	2	1413
Travel Dist (mi)	19.1	7.2	5.4	64.7	39.3	52.4	4.5	192.7
Travel Time (hr)	158.0	59.3	1.2	9.1	4.1	7.6	0.3	239.6
Avg Speed (mph)	1	1	4	7	10	7	14	3
Fuel Used (gal)	36.6	13.6	0.4	3.9	1.7	4.3	0.2	60.7
HC Emissions (g)	80	49	2	33	10	53	2	230
CO Emissions (g)	2729	1242	73	1132	258	1420	60	6914
NOx Emissions (g)	79	43	8	109	33	200	8	478
Vehicles Entered	123	48	74	873	1180	1537	174	4009
Vehicles Exited	110	39	72	882	1178	1538	174	3993
Hourly Exit Rate	110	39	72	882	1178	1538	174	3993
Input Volume	379	144	76	900	1189	2198	245	5132
% of Volume	29	27	95	98	99	70	71	78
Denied Entry Before	0	0	0	0	0	0	0	0
Denied Entry After	261	100	0	0	0	1	0	362

Total Network Performance By Interval

Interval Start	5:00	5:15	All
Total Delay (hr)	110.9	888.9	999.8
Delay / Veh (s)	259.6	746.1	618.0
Total Stops	3584	13996	17579
Travel Dist (mi)	788.6	2204.1	2992.7
Travel Time (hr)	136.5	960.0	1096.5
Avg Speed (mph)	7	5	6
Fuel Used (gal)	54.3	285.3	339.6
HC Emissions (g)	552	2086	2637
CO Emissions (g)	16673	59515	76187
NOx Emissions (g)	1597	4917	6514
Vehicles Entered	1622	4335	5959
Vehicles Exited	1454	4243	5694
Hourly Exit Rate	5816	5657	5694
Input Volume	31738	27506	28564
% of Volume	18	21	20
Denied Entry Before	4	289	4
Denied Entry After	289	1175	1175

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	356	202	693	843	221	225	156	105	78	107	837	822
Average Queue (ft)	239	122	449	633	124	143	64	67	37	69	528	552
95th Queue (ft)	348	212	973	1026	219	237	162	105	75	134	987	1006
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)							0				3	4
Queuing Penalty (veh)							0				0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1				11	74	
Queuing Penalty (veh)					0	1				26	80	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	334	245	809	928	233	237	178	145	102	109	1192	1196
Average Queue (ft)	187	114	269	467	113	133	55	65	32	72	1064	1073
95th Queue (ft)	295	201	758	913	198	208	124	119	72	137	1440	1424
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)	0										44	53
Queuing Penalty (veh)	0										0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	0				24	73	
Queuing Penalty (veh)					0	0				52	68	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	366	256	812	944	243	247	240	145	112	109	1192	1196
Average Queue (ft)	199	116	313	507	116	135	57	66	33	72	934	947
95th Queue (ft)	314	204	826	957	204	216	135	116	73	137	1483	1475
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)	0						0				34	41
Queuing Penalty (veh)	0						0				0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	0				21	74	
Queuing Penalty (veh)					0	1				46	71	

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	1667	1708	625	78	174	224	307	309	381	411	260
Average Queue (ft)	847	896	413	39	149	197	228	211	364	373	148
95th Queue (ft)	1539	1616	836	77	204	256	324	319	389	421	359
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)							0	1	13	14	
Queuing Penalty (veh)							0	5	94	98	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		33	4		12	19	18			21	0
Queuing Penalty (veh)		187	20		62	99	103			84	0

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2762	2761	639	483	174	224	335	350	385	412	260
Average Queue (ft)	2587	2603	601	83	142	183	207	189	356	356	132
95th Queue (ft)	3110	3095	767	327	202	252	317	314	417	437	346
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	33	42					0		13	12	
Queuing Penalty (veh)	0	0					3		82	71	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		63	5	0	9	18	19			20	0
Queuing Penalty (veh)		306	23	0	41	84	93			67	1

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2762	2761	639	483	174	224	341	362	388	421	260
Average Queue (ft)	2167	2191	555	73	144	187	212	194	358	360	136
95th Queue (ft)	3521	3518	841	288	203	253	320	316	413	435	349
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	25	32					0	0	13	12	
Queuing Penalty (veh)	0	0					2	1	85	78	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		56	5	0	9	18	19			20	0
Queuing Penalty (veh)		276	23	0	46	87	95			72	1

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	699	1069	576	160	144	62	165	224	381	372
Average Queue (ft)	529	983	560	143	116	21	120	200	354	363
95th Queue (ft)	933	1253	603	159	163	71	171	264	401	375
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		60		52	20	0			12	20
Queuing Penalty (veh)		0		369	141	0			127	214
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	0	70	59		26	0	6	13	30	
Queuing Penalty (veh)	1	428	449		18	0	52	115	104	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1066	591	155	146	90	165	225	397	384
Average Queue (ft)	552	1047	568	141	108	26	111	174	359	366
95th Queue (ft)	918	1059	586	149	165	87	179	264	418	379
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		69		46	14	0			15	21
Queuing Penalty (veh)		0		281	86	0			134	190
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	3	77	66		21	0	6	11	29	
Queuing Penalty (veh)	27	408	434		13	0	45	86	87	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1078	591	170	149	110	167	225	398	384
Average Queue (ft)	547	1031	566	141	110	25	113	180	357	365
95th Queue (ft)	922	1172	593	152	165	84	178	267	414	378
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		66		47	15	0			14	21
Queuing Penalty (veh)		0		303	100	0			132	196
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	2	75	64		23	0	6	12	29	
Queuing Penalty (veh)	21	413	438		14	0	47	93	92	

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	894	81	166	385	313	156	302	817	145	150	40
Average Queue (ft)	210	860	42	66	334	185	22	163	384	131	126	8
95th Queue (ft)	212	1009	88	155	466	420	155	423	989	146	148	47
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		72			19	0	0		7	39	39	0
Queuing Penalty (veh)		0			0	0	0		0	350	347	0
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	99			0	31	0	0					
Queuing Penalty (veh)	365			0	26	5	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	904	169	224	396	392	234	609	753	158	144	14
Average Queue (ft)	209	892	34	67	290	170	25	125	259	134	124	1
95th Queue (ft)	215	902	105	163	475	378	163	450	837	149	139	15
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		89			13	0	0		4	39	38	
Queuing Penalty (veh)		0			0	0	0		0	298	294	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	98		1	0	22	0	0					
Queuing Penalty (veh)	313		2	0	16	3	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	904	169	224	396	392	312	609	821	158	150	40
Average Queue (ft)	209	884	36	67	301	173	24	134	289	133	124	3
95th Queue (ft)	214	961	102	161	477	389	161	446	881	149	142	26
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		85			14	0	0		5	39	38	0
Queuing Penalty (veh)		0			0	0	0		0	311	307	0
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	98		0	0	24	0	0					
Queuing Penalty (veh)	326		2	0	18	4	0					

Network Summary

Network wide Queuing Penalty, Interval #1: 3972
Network wide Queuing Penalty, Interval #2: 3607
Network wide Queuing Penalty, All Intervals: 3698

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	11.2	39.7	29.0	25.5	20.0	24.4
g/C Ratio	0.07	0.34	0.25	0.22	0.17	0.21
Cycles Skipped (%)	29	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	14	100	71	88	100	100
Cycles with Peds (%)	0	25	14	0	0	13

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.7	38.9	26.5	25.1	20.7	27.7
g/C Ratio	0.07	0.34	0.23	0.22	0.18	0.24
Cycles Skipped (%)	26	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	22	100	50	83	100	92
Cycles with Peds (%)	0	13	14	0	0	17

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 23

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.4	39.1	27.1	25.2	20.5	26.9
g/C Ratio	0.07	0.34	0.24	0.22	0.18	0.23
Cycles Skipped (%)	26	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	19	100	55	84	100	94
Cycles with Peds (%)	0	16	14	0	0	16

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 30

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	66.0	41.0	20.7	41.6
g/C Ratio	0.57	0.36	0.18	0.36
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	38	100
Cycles with Peds (%)	14	0	0	14

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	65.2	41.8	20.4	40.8
g/C Ratio	0.57	0.36	0.18	0.35
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	39	100
Cycles with Peds (%)	13	0	0	9

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 23

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	65.4	41.6	20.5	41.0
g/C Ratio	0.57	0.36	0.18	0.36
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	39	100
Cycles with Peds (%)	13	0	0	10

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 30

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.0	31.8	39.0	68.0
g/C Ratio	0.12	0.28	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	0	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.3	11.4	39.0	68.0
g/C Ratio	0.12	0.10	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	29	0	13

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 22

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.2	13.4	39.0	68.0
g/C Ratio	0.12	0.12	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	27	0	13

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 29

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	76.0	31.1	14.7	59.4
g/C Ratio	0.66	0.27	0.13	0.52
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	71	100
Cycles with Peds (%)	0	0	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	73.9	33.0	12.6	59.6
g/C Ratio	0.64	0.29	0.10	0.52
Cycles Skipped (%)	0	0	9	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	45	100
Cycles with Peds (%)	0	13	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 22

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	74.4	32.5	13.2	59.6
g/C Ratio	0.65	0.28	0.10	0.52
Cycles Skipped (%)	0	0	10	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	50	100
Cycles with Peds (%)	0	13	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 29

Attachment B:

Cumulative (2025) plus Proposed Project
SimTraffic Analysis Worksheets

Summary of All Intervals

Run Number	1	2	3	4	5	Avg
Start Time	6:55	6:55	6:55	6:55	6:55	6:55
End Time	8:00	8:00	8:00	8:00	8:00	8:00
Total Time (min)	65	65	65	65	65	65
Time Recorded (min)	60	60	60	60	60	60
# of Intervals	3	3	3	3	3	3
# of Recorded Intvls	2	2	2	2	2	2
Vehs Entered	5996	5837	5903	5911	5884	5905
Vehs Exited	5984	5810	5890	5929	5804	5883
Starting Vehs	276	258	271	278	234	266
Ending Vehs	288	285	284	260	314	284
Denied Entry Before	3	4	1	1	2	1
Denied Entry After	763	593	719	705	745	704
Travel Distance (mi)	3298	3176	3238	3241	3211	3233
Travel Time (hr)	794.8	618.2	672.2	682.1	732.1	699.9
Total Delay (hr)	688.3	515.9	567.6	578.0	628.6	595.7
Total Stops	11798	9573	9754	11011	12492	10923
Fuel Used (gal)	277.3	234.4	246.2	249.0	259.5	253.3

Interval #0 Information Seeding

Start Time	6:55
End Time	7:00
Total Time (min)	5

Volumes adjusted by Growth Factors.
No data recorded this interval.

Interval #1 Information Peak

Start Time	7:00
End Time	7:15
Total Time (min)	15

Volumes adjusted by PHF, Growth Factors.

Run Number	1	2	3	4	5	Avg
Vehs Entered	1757	1728	1620	1739	1691	1706
Vehs Exited	1532	1569	1489	1544	1501	1527
Starting Vehs	276	258	271	278	234	266
Ending Vehs	501	417	402	473	424	444
Denied Entry Before	3	4	1	1	2	1
Denied Entry After	175	178	161	119	135	153
Travel Distance (mi)	893	881	838	870	858	868
Travel Time (hr)	127.0	107.6	104.8	108.1	97.3	108.9
Total Delay (hr)	98.0	79.3	77.9	80.1	69.7	81.0
Total Stops	3342	2912	2756	3252	2608	2974
Fuel Used (gal)	54.7	50.7	48.4	49.6	46.8	50.0

Interval #2 Information Off Peak

Start Time	7:15
End Time	8:00
Total Time (min)	45

Volumes adjusted by Growth Factors, Anti PHF.

Run Number	1	2	3	4	5	Avg
Vehs Entered	4239	4109	4283	4172	4193	4199
Vehs Exited	4452	4241	4401	4385	4303	4357
Starting Vehs	501	417	402	473	424	444
Ending Vehs	288	285	284	260	314	284
Denied Entry Before	175	178	161	119	135	153
Denied Entry After	763	593	719	705	745	704
Travel Distance (mi)	2405	2295	2401	2370	2354	2365
Travel Time (hr)	667.8	510.6	567.5	574.1	634.8	591.0
Total Delay (hr)	590.3	436.5	489.7	497.9	559.0	514.7
Total Stops	8456	6661	6998	7759	9884	7953
Fuel Used (gal)	222.7	183.7	197.8	199.5	212.7	203.3

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.3	0.1	0.7	2.3	1.0	2.5	1.7	0.8	0.1	0.8	3.6	0.6
Delay / Veh (s)	40.5	59.4	19.8	90.9	158.3	147.1	44.2	24.0	3.7	162.4	155.1	167.3
Total Stops	21	7	101	140	49	126	121	55	29	35	133	20
Travel Dist (mi)	2.2	0.6	11.4	20.4	5.2	14.2	11.4	9.6	7.3	3.9	19.5	2.8
Travel Time (hr)	0.4	0.1	1.3	3.0	1.2	3.0	2.2	1.1	0.4	0.9	4.1	0.6
Avg Speed (mph)	6	5	9	7	4	5	5	9	17	5	5	4
Fuel Used (gal)	0.1	0.0	0.6	1.2	0.4	1.0	0.9	0.7	0.3	0.3	1.4	0.2
HC Emissions (g)	1	0	5	9	2	6	8	15	4	3	11	1
CO Emissions (g)	34	13	199	269	59	171	217	479	161	119	509	59
NOx Emissions (g)	3	1	17	27	6	16	27	46	15	8	30	3
Vehicles Entered	26	8	133	92	23	63	136	118	89	19	92	13
Vehicles Exited	25	7	133	90	22	59	141	118	90	14	76	12
Hourly Exit Rate	100	28	532	360	88	236	564	472	360	56	304	48
Input Volume	117	40	528	379	93	239	668	564	473	76	369	47
% of Volume	85	70	101	95	95	99	84	84	76	74	82	102
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	All
Total Delay (hr)	14.5
Delay / Veh (s)	65.1
Total Stops	837
Travel Dist (mi)	108.5
Travel Time (hr)	18.4
Avg Speed (mph)	6
Fuel Used (gal)	7.2
HC Emissions (g)	66
CO Emissions (g)	2288
NOx Emissions (g)	200
Vehicles Entered	812
Vehicles Exited	787
Hourly Exit Rate	3148
Input Volume	3593
% of Volume	88
Denied Entry Before	0
Denied Entry After	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.8	0.3	1.4	3.5	1.5	3.3	3.6	2.1	0.3	1.8	8.4	1.2
Delay / Veh (s)	44.6	45.8	15.2	51.4	85.4	74.3	34.4	24.4	4.0	134.4	124.7	131.7
Total Stops	57	20	240	241	86	209	276	144	73	80	344	51
Travel Dist (mi)	5.6	2.0	29.0	56.4	15.1	36.2	30.9	24.0	21.5	10.3	52.1	7.3
Travel Time (hr)	1.1	0.4	2.8	5.5	2.1	4.6	4.9	2.8	1.3	2.1	9.7	1.5
Avg Speed (mph)	5	5	11	10	7	8	6	9	17	5	5	5
Fuel Used (gal)	0.4	0.1	1.3	2.5	0.8	1.8	2.2	1.8	0.9	0.8	3.6	0.5
HC Emissions (g)	3	1	12	20	5	9	17	41	11	5	28	7
CO Emissions (g)	108	34	484	565	147	301	544	1235	424	277	1354	230
NOx Emissions (g)	10	3	42	60	14	28	64	122	41	15	84	17
Vehicles Entered	66	23	339	241	65	155	375	300	263	45	230	32
Vehicles Exited	67	23	340	248	65	160	379	304	260	50	253	35
Hourly Exit Rate	89	31	453	331	87	213	505	405	347	67	337	47
Input Volume	101	35	457	328	81	207	579	488	410	65	320	40
% of Volume	88	88	99	101	107	103	87	83	85	103	105	117
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	All
Total Delay (hr)	28.2
Delay / Veh (s)	47.0
Total Stops	1821
Travel Dist (mi)	290.6
Travel Time (hr)	38.7
Avg Speed (mph)	8
Fuel Used (gal)	16.7
HC Emissions (g)	160
CO Emissions (g)	5702
NOx Emissions (g)	501
Vehicles Entered	2134
Vehicles Exited	2184
Hourly Exit Rate	2912
Input Volume	3111
% of Volume	94
Denied Entry Before	0
Denied Entry After	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.1	0.4	2.2	5.8	2.6	5.8	5.3	2.8	0.4	2.6	12.0	1.8
Delay / Veh (s)	43.0	49.0	16.5	62.1	104.5	94.6	37.0	24.3	4.0	141.7	132.5	138.0
Total Stops	78	26	341	381	134	335	397	199	102	115	478	70
Travel Dist (mi)	7.9	2.6	40.3	76.9	20.3	50.4	42.3	33.6	28.9	14.3	71.6	10.2
Travel Time (hr)	1.4	0.5	4.0	8.6	3.2	7.7	7.1	3.9	1.7	2.9	13.8	2.1
Avg Speed (mph)	6	5	10	9	6	7	6	9	17	5	5	5
Fuel Used (gal)	0.5	0.2	1.9	3.6	1.2	2.8	3.1	2.5	1.3	1.1	5.1	0.7
HC Emissions (g)	4	1	18	29	7	15	25	56	15	8	40	8
CO Emissions (g)	143	47	683	835	206	471	761	1714	584	395	1863	288
NOx Emissions (g)	13	4	60	86	19	44	91	169	56	24	114	20
Vehicles Entered	93	31	473	333	88	218	511	418	352	64	322	46
Vehicles Exited	91	30	473	337	87	220	520	423	350	65	329	47
Hourly Exit Rate	91	30	473	337	87	220	520	423	350	65	329	47
Input Volume	105	36	475	341	84	215	601	507	426	68	332	42
% of Volume	87	83	100	99	104	102	86	83	82	96	99	113
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	0	0	0

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	All
Total Delay (hr)	42.7
Delay / Veh (s)	51.9
Total Stops	2656
Travel Dist (mi)	399.1
Travel Time (hr)	57.1
Avg Speed (mph)	7
Fuel Used (gal)	23.8
HC Emissions (g)	226
CO Emissions (g)	7990
NOx Emissions (g)	701
Vehicles Entered	2949
Vehicles Exited	2972
Hourly Exit Rate	2972
Input Volume	3232
% of Volume	92
Denied Entry Before	0
Denied Entry After	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	7.9	1.7	1.4	1.9	3.1	0.2	16.2
Delay / Veh (s)	104.5	41.4	49.0	35.2	48.4	9.5	57.3
Total Stops	468	156	121	158	225	21	1149
Travel Dist (mi)	146.8	74.8	8.0	15.6	18.9	5.3	269.4
Travel Time (hr)	13.0	4.3	1.7	2.3	3.8	0.4	25.5
Avg Speed (mph)	11	18	5	7	5	12	11
Fuel Used (gal)	6.1	2.6	0.6	1.1	1.5	0.3	12.1
HC Emissions (g)	74	40	4	18	17	3	155
CO Emissions (g)	1510	881	106	471	385	86	3439
NOx Emissions (g)	206	115	14	54	49	11	448
Vehicles Entered	295	148	102	198	235	72	1050
Vehicles Exited	251	139	100	196	229	72	987
Hourly Exit Rate	1004	556	400	784	916	288	3948
Input Volume	1111	616	521	1057	973	328	4606
% of Volume	90	90	77	74	94	88	86
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	25.7	7.1	3.6	5.0	7.4	0.4	49.3
Delay / Veh (s)	126.3	62.8	45.3	36.1	40.8	7.2	63.5
Total Stops	1532	642	317	399	589	37	3516
Travel Dist (mi)	377.2	211.9	22.6	38.7	53.4	15.8	719.4
Travel Time (hr)	38.8	14.6	4.4	5.9	9.3	1.1	74.2
Avg Speed (mph)	10	15	5	7	6	14	10
Fuel Used (gal)	16.8	8.0	1.6	2.7	4.0	0.8	33.9
HC Emissions (g)	196	121	15	41	39	8	420
CO Emissions (g)	3999	2622	360	1087	1021	250	9339
NOx Emissions (g)	528	337	47	121	126	31	1190
Vehicles Entered	715	404	283	487	648	212	2749
Vehicles Exited	752	415	293	503	661	213	2837
Hourly Exit Rate	1003	553	391	671	881	284	3783
Input Volume	963	533	452	915	843	284	3990
% of Volume	104	104	86	73	105	100	95
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	33.6	8.8	5.0	6.9	10.6	0.6	65.5
Delay / Veh (s)	120.4	57.2	46.2	35.8	42.8	7.8	61.9
Total Stops	2000	798	438	557	814	57	4664
Travel Dist (mi)	523.9	286.7	30.6	54.3	72.2	21.1	988.8
Travel Time (hr)	51.8	18.9	6.1	8.2	13.1	1.6	99.7
Avg Speed (mph)	10	15	5	7	6	13	10
Fuel Used (gal)	22.9	10.7	2.2	3.7	5.5	1.0	46.0
HC Emissions (g)	270	161	19	59	55	10	575
CO Emissions (g)	5509	3503	466	1558	1406	336	12778
NOx Emissions (g)	734	452	60	175	174	42	1638
Vehicles Entered	1009	553	385	685	882	284	3798
Vehicles Exited	1002	554	392	699	890	285	3822
Hourly Exit Rate	1002	554	392	699	890	285	3822
Input Volume	1000	554	469	950	876	295	4144
% of Volume	100	100	84	74	102	97	92
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	2.6	14.0	1.4	0.0	1.2	2.3	21.5
Delay / Veh (s)	326.7	729.9	17.6	3.1	64.4	20.1	89.5
Total Stops	52	172	77	4	81	196	582
Travel Dist (mi)	5.6	13.9	9.8	0.4	5.8	33.4	68.9
Travel Time (hr)	2.8	14.5	1.6	0.0	1.4	3.3	23.7
Avg Speed (mph)	3	1	7	13	4	10	3
Fuel Used (gal)	0.8	3.6	0.6	0.0	0.5	1.8	7.3
HC Emissions (g)	9	28	10	0	6	26	79
CO Emissions (g)	194	565	184	2	123	568	1635
NOx Emissions (g)	18	38	22	0	15	85	179
Vehicles Entered	32	94	280	11	71	402	890
Vehicles Exited	27	45	280	11	69	407	839
Hourly Exit Rate	108	180	1120	44	276	1628	3356
Input Volume	188	562	1419	62	299	1760	4290
% of Volume	57	32	79	71	92	92	78
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	14	43	1	0	0	0	58

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	44.7	160.6	3.7	0.0	3.6	6.8	219.3
Delay / Veh (s)	3920.6	4219.1	17.9	3.9	62.9	20.5	335.6
Total Stops	129	458	219	13	228	599	1646
Travel Dist (mi)	7.8	26.9	25.9	1.2	16.7	98.5	177.1
Travel Time (hr)	44.9	161.6	4.3	0.1	4.2	9.9	225.1
Avg Speed (mph)	1	1	7	12	4	10	3
Fuel Used (gal)	10.4	37.3	1.7	0.0	1.4	5.4	56.3
HC Emissions (g)	46	178	30	1	11	70	334
CO Emissions (g)	1096	3953	516	12	280	1527	7385
NOx Emissions (g)	47	165	56	2	35	228	532
Vehicles Entered	41	133	747	35	205	1192	2353
Vehicles Exited	42	141	742	35	208	1187	2355
Hourly Exit Rate	56	188	989	47	277	1583	3140
Input Volume	163	487	1228	54	259	1526	3717
% of Volume	34	39	81	86	107	104	84
Denied Entry Before	14	43	1	0	0	0	58
Denied Entry After	91	268	0	0	0	0	359

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	47.3	174.6	5.1	0.0	4.9	9.0	240.8
Delay / Veh (s)	2431.7	3050.4	17.8	3.7	63.3	20.4	269.5
Total Stops	181	629	296	17	309	795	2227
Travel Dist (mi)	13.4	40.9	35.7	1.6	22.4	131.9	245.9
Travel Time (hr)	47.8	176.1	6.0	0.1	5.6	13.2	248.8
Avg Speed (mph)	2	1	7	12	4	10	3
Fuel Used (gal)	11.2	40.9	2.3	0.1	1.9	7.2	63.6
HC Emissions (g)	54	206	40	1	17	96	413
CO Emissions (g)	1290	4519	700	14	403	2094	9020
NOx Emissions (g)	65	203	78	2	50	313	711
Vehicles Entered	72	226	1027	47	276	1594	3242
Vehicles Exited	68	186	1023	46	276	1594	3193
Hourly Exit Rate	68	186	1023	46	276	1594	3193
Input Volume	169	506	1276	56	269	1584	3860
% of Volume	40	37	80	82	103	101	83
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	91	268	0	0	0	0	359

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #1 7:00

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	14.4	3.8	0.3	1.7	0.7	1.5	0.0	22.4
Delay / Veh (s)	1787.7	1935.8	46.5	23.3	8.2	13.0	2.3	74.8
Total Stops	86	21	21	141	6	68	0	343
Travel Dist (mi)	4.4	1.1	1.5	19.6	9.7	14.7	1.0	52.0
Travel Time (hr)	14.6	3.8	0.3	2.2	0.9	1.9	0.1	23.8
Avg Speed (mph)	1	1	5	9	10	8	15	4
Fuel Used (gal)	3.4	0.9	0.1	1.0	0.4	1.1	0.0	7.0
HC Emissions (g)	3	2	1	9	3	15	0	33
CO Emissions (g)	217	73	21	331	66	378	15	1101
NOx Emissions (g)	6	3	2	30	9	56	2	108
Vehicles Entered	39	10	20	265	291	426	38	1089
Vehicles Exited	21	5	19	266	290	426	38	1065
Hourly Exit Rate	84	20	76	1064	1160	1704	152	4260
Input Volume	386	142	76	1066	1177	2155	213	5215
% of Volume	22	14	100	100	99	79	71	82
Denied Entry Before	0	0	0	0	0	1	0	1
Denied Entry After	65	25	0	0	0	0	0	90

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #2 7:15

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	145.3	51.5	0.8	3.5	1.5	4.5	0.1	207.2
Delay / Veh (s)	6708.5	7131.8	54.2	18.3	6.7	13.2	2.3	249.8
Total Stops	273	85	53	320	4	208	1	944
Travel Dist (mi)	13.1	4.4	3.8	50.8	26.2	42.4	3.6	144.2
Travel Time (hr)	145.8	51.7	0.9	4.6	2.2	5.6	0.3	211.2
Avg Speed (mph)	1	1	4	11	12	8	14	3
Fuel Used (gal)	33.7	11.9	0.3	2.2	0.8	3.3	0.1	52.4
HC Emissions (g)	59	9	0	19	5	43	2	138
CO Emissions (g)	2325	690	33	798	130	1128	47	5150
NOx Emissions (g)	57	12	3	64	15	158	6	313
Vehicles Entered	76	26	52	691	786	1228	131	2990
Vehicles Exited	80	26	54	682	787	1222	131	2982
Hourly Exit Rate	107	35	72	909	1049	1629	175	3976
Input Volume	334	123	65	923	1020	1867	185	4517
% of Volume	32	28	111	99	103	87	94	88
Denied Entry Before	65	25	0	0	0	0	0	90
Denied Entry After	249	96	0	0	0	0	0	345

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	159.8	55.3	1.1	5.2	2.1	6.0	0.1	229.6
Delay / Veh (s)	5374.8	6029.6	52.1	19.7	7.1	13.2	2.3	203.5
Total Stops	360	105	74	461	10	276	1	1287
Travel Dist (mi)	17.5	5.5	5.3	70.4	35.9	57.0	4.6	196.2
Travel Time (hr)	160.4	55.5	1.3	6.8	3.2	7.5	0.3	235.0
Avg Speed (mph)	1	1	4	10	11	8	15	3
Fuel Used (gal)	37.1	12.8	0.4	3.2	1.2	4.5	0.2	59.4
HC Emissions (g)	63	11	1	29	8	57	2	171
CO Emissions (g)	2542	763	54	1129	196	1506	61	6251
NOx Emissions (g)	63	15	5	94	24	213	7	421
Vehicles Entered	115	36	72	956	1077	1654	168	4078
Vehicles Exited	100	31	73	948	1077	1648	169	4046
Hourly Exit Rate	100	31	73	948	1077	1648	169	4046
Input Volume	347	128	68	959	1059	1939	192	4692
% of Volume	29	24	108	99	102	85	88	86
Denied Entry Before	0	0	0	0	0	1	0	1
Denied Entry After	249	96	0	0	0	0	0	345

Total Network Performance By Interval

Interval Start	7:00	7:15	All
Total Delay (hr)	81.0	514.7	595.7
Delay / Veh (s)	180.4	433.2	364.0
Total Stops	2974	7953	10923
Travel Dist (mi)	867.8	2365.0	3232.8
Travel Time (hr)	108.9	591.0	699.9
Avg Speed (mph)	9	9	9
Fuel Used (gal)	50.0	203.3	253.3
HC Emissions (g)	566	1644	2210
CO Emissions (g)	17425	52017	69442
NOx Emissions (g)	1730	4629	6359
Vehicles Entered	1706	4199	5905
Vehicles Exited	1527	4357	5883
Hourly Exit Rate	6108	5809	5883
Input Volume	29484	25541	26527
% of Volume	21	23	22
Denied Entry Before	1	153	1
Denied Entry After	153	704	704

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	225	225	697	733	233	246	306	194	50	109	416	436
Average Queue (ft)	168	123	438	593	179	197	133	95	28	65	285	306
95th Queue (ft)	254	226	951	981	279	282	321	219	51	126	679	686
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)							0	0				
Queuing Penalty (veh)							2	0				
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					2	2	0			11	52	
Queuing Penalty (veh)					4	5	0			20	39	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	305	182	631	699	229	245	171	162	76	109	445	468
Average Queue (ft)	157	77	190	365	131	147	71	74	30	58	225	262
95th Queue (ft)	266	147	476	623	212	227	140	138	62	114	635	673
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)	0											
Queuing Penalty (veh)	0											
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	0				8	33	
Queuing Penalty (veh)					0	1				13	21	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	305	225	701	759	242	247	306	214	76	109	456	485
Average Queue (ft)	160	88	250	420	143	159	86	79	30	60	239	272
95th Queue (ft)	263	174	645	756	235	247	205	163	60	117	648	678
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)	0						0	0				
Queuing Penalty (veh)	0						0	0				
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1	0			9	37	
Queuing Penalty (veh)					1	2	0			15	26	

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	1848	1534	625	175	174	224	356	314	375	400	260
Average Queue (ft)	742	719	275	54	154	200	289	228	344	349	148
95th Queue (ft)	1786	1610	650	215	199	263	383	325	408	429	359
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	0	0					3	1	9	11	
Queuing Penalty (veh)	0	0					27	4	56	67	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		16	1	0	10	22	27			20	0
Queuing Penalty (veh)		97	8	0	52	114	140			64	1

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	1934	1955	613	476	174	225	348	356	378	395	260
Average Queue (ft)	837	884	318	66	137	184	244	215	308	308	106
95th Queue (ft)	1991	2057	745	234	202	261	349	334	413	428	316
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	0	0					1	0	4	4	
Queuing Penalty (veh)	0	0					9	2	20	25	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		17	1	0	9	18	23			11	0
Queuing Penalty (veh)		88	7	0	42	81	103			32	0

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2564	2172	625	507	174	225	359	357	379	408	260
Average Queue (ft)	814	844	308	63	141	188	255	219	316	318	116
95th Queue (ft)	1945	1962	723	230	204	263	362	333	417	433	328
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	0	0					2	0	5	6	
Queuing Penalty (veh)	0	0					13	3	29	35	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		16	1	0	9	19	24			13	0
Queuing Penalty (veh)		91	7	0	44	89	112			40	0

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	699	1054	570	147	143	82	164	224	382	377
Average Queue (ft)	460	758	499	140	101	23	118	165	297	322
95th Queue (ft)	895	1287	675	150	166	84	177	246	427	427
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		40		39	12	0			4	8
Queuing Penalty (veh)		0		285	89	0			46	80
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	4	55	40		16	0	8	18	14	
Queuing Penalty (veh)	28	204	187		10	0	69	155	42	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1068	638	145	144	103	172	224	385	383
Average Queue (ft)	571	1046	573	140	84	21	108	152	290	325
95th Queue (ft)	934	1060	631	145	153	76	170	242	416	417
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		86		37	6	0			2	5
Queuing Penalty (veh)		0		235	38	0			21	48
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	6	91	75		11	0	7	14	14	
Queuing Penalty (veh)	31	294	305		6	0	51	107	37	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1072	638	148	144	110	174	224	394	388
Average Queue (ft)	544	977	555	140	88	22	110	155	292	324
95th Queue (ft)	934	1307	668	147	157	78	172	244	419	420
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		75		38	8	0			3	6
Queuing Penalty (veh)		0		248	51	0			27	56
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	5	82	66		13	0	7	15	14	
Queuing Penalty (veh)	31	272	276		7	0	55	119	38	

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	208	894	63	223	391	289	123	186	392	148	148	22
Average Queue (ft)	203	846	13	85	268	143	18	58	123	132	123	3
95th Queue (ft)	217	1025	79	198	436	322	136	237	541	150	144	24
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		73			9	0	0		1	35	34	
Queuing Penalty (veh)		0			0	0	0		0	269	264	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	97	2	0	0	17	0	0					
Queuing Penalty (veh)	326	5	0	0	13	2	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	T	T	T	T	R
Maximum Queue (ft)	210	901	64	204	391	297	122	112	155	154	48
Average Queue (ft)	208	891	9	60	198	98	10	9	131	123	3
95th Queue (ft)	217	902	44	140	344	216	88	118	146	141	26
Link Distance (ft)		878			320	320	861	861	114	114	114
Upstream Blk Time (%)		90			2	0			35	35	0
Queuing Penalty (veh)		0			0	0			236	234	0
Storage Bay Dist (ft)	185		185	200							
Storage Blk Time (%)	96	0		0	6	0					
Queuing Penalty (veh)	279	0		0	4	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	901	93	224	391	352	123	193	434	158	155	59
Average Queue (ft)	207	880	10	66	215	109	4	21	37	132	123	3
95th Queue (ft)	218	974	54	156	375	248	64	138	277	147	142	26
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		86			4	0	0		0	35	35	0
Queuing Penalty (veh)		0			0	0	0		0	244	241	0
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	96	0	0	0	9	0	0					
Queuing Penalty (veh)	291	1	0	0	6	1	0					

Network Summary

Network wide Queuing Penalty, Interval #1: 2774
Network wide Queuing Penalty, Interval #2: 2370
Network wide Queuing Penalty, All Intervals: 2471

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.1	35.3	29.3	23.3	17.2	27.5
g/C Ratio	0.08	0.32	0.27	0.21	0.16	0.25
Cycles Skipped (%)	17	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	17	100	57	88	100	100
Cycles with Peds (%)	0	13	14	0	0	14

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	8.9	33.3	24.1	23.1	17.1	31.9
g/C Ratio	0.07	0.30	0.21	0.21	0.16	0.29
Cycles Skipped (%)	16	0	4	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	24	100	30	84	100	88
Cycles with Peds (%)	0	16	13	0	0	13

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	11.0	29.0	30.0	23.0	17.0	24.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	8.8	33.8	24.5	23.1	17.2	30.9
g/C Ratio	0.07	0.31	0.22	0.21	0.16	0.28
Cycles Skipped (%)	16	0	3	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	25	100	39	85	100	90
Cycles with Peds (%)	0	15	13	0	0	13

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	59.3	42.8	18.3	37.0
g/C Ratio	0.54	0.39	0.17	0.34
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	75	100
Cycles with Peds (%)	13	0	0	0

Controller Summary

Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	58.9	43.9	18.0	36.5
g/C Ratio	0.54	0.40	0.16	0.33
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	92	56	100
Cycles with Peds (%)	8	0	0	17

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	60.0	42.0	19.0	37.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	59.0	43.6	18.1	36.6
g/C Ratio	0.54	0.40	0.16	0.33
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	94	61	100
Cycles with Peds (%)	9	0	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	13.9	8.8	29.1	73.0
g/C Ratio	0.13	0.08	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	88	100	100	100
Cycles with Peds (%)	0	2	0	14

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	13.9	1.7	29.1	72.9
g/C Ratio	0.13	0.02	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	92	100	100	100
Cycles with Peds (%)	0	3	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	55.0	29.0	73.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	13.9	2.1	29.1	72.9
g/C Ratio	0.13	0.02	0.26	0.66
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	94	100	100	100
Cycles with Peds (%)	0	3	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	73.0	29.0	10.0	60.4
g/C Ratio	0.66	0.26	0.09	0.55
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	0	100
Cycles with Peds (%)	0	0	0	14

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 7

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	72.7	29.3	9.3	61.2
g/C Ratio	0.66	0.27	0.07	0.56
Cycles Skipped (%)	0	0	13	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	8	100
Cycles with Peds (%)	0	12	0	13

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 24

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	73.0	29.0	16.0	53.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	72.8	29.2	9.5	61.0
g/C Ratio	0.66	0.27	0.08	0.55
Cycles Skipped (%)	0	0	10	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	6	100
Cycles with Peds (%)	0	12	0	16

Controller Summary
Average Cycle Length (s): 110.0
Number of Complete Cycles : 31

Summary of All Intervals

Run Number	1	2	3	4	5	Avg
Start Time	4:55	4:55	4:55	4:55	4:55	4:55
End Time	6:00	6:00	6:00	6:00	6:00	6:00
Total Time (min)	65	65	65	65	65	65
Time Recorded (min)	60	60	60	60	60	60
# of Intervals	3	3	3	3	3	3
# of Recorded Intvls	2	2	2	2	2	2
Vehs Entered	5866	6034	6020	5895	5933	5949
Vehs Exited	5614	5748	5736	5681	5696	5696
Starting Vehs	326	311	322	364	365	337
Ending Vehs	578	597	606	578	602	594
Denied Entry Before	4	14	7	7	23	10
Denied Entry After	1794	1368	1653	1631	1605	1609
Travel Distance (mi)	2944	3016	3021	2980	2977	2988
Travel Time (hr)	1422.9	1188.0	1338.0	1392.6	1371.1	1342.5
Total Delay (hr)	1328.4	1090.9	1240.5	1296.6	1275.4	1246.3
Total Stops	19471	17813	19197	19451	18727	18930
Fuel Used (gal)	414.3	362.3	397.9	407.4	402.1	396.8

Interval #0 Information Seeding

Start Time	4:55
End Time	5:00
Total Time (min)	5

Volumes adjusted by Growth Factors.
No data recorded this interval.

Interval #1 Information peak

Start Time	5:00
End Time	5:15
Total Time (min)	15

Volumes adjusted by PHF, Growth Factors.

Run Number	1	2	3	4	5	Avg
Vehs Entered	1759	1715	1734	1656	1647	1700
Vehs Exited	1465	1543	1495	1444	1419	1474
Starting Vehs	326	311	322	364	365	337
Ending Vehs	620	483	561	576	593	563
Denied Entry Before	4	14	7	7	23	10
Denied Entry After	410	366	394	435	438	408
Travel Distance (mi)	791	832	816	781	775	799
Travel Time (hr)	163.9	144.4	154.7	173.2	169.2	161.1
Total Delay (hr)	138.3	117.4	128.2	148.1	144.1	135.2
Total Stops	4228	3931	3591	4544	4290	4114
Fuel Used (gal)	60.9	58.0	59.6	62.8	61.9	60.7

Interval #2 Information off peak

Start Time	5:15
End Time	6:00
Total Time (min)	45

Volumes adjusted by Growth Factors, Anti PHF.

Run Number	1	2	3	4	5	Avg
Vehs Entered	4107	4319	4286	4239	4286	4246
Vehs Exited	4149	4205	4241	4237	4277	4221
Starting Vehs	620	483	561	576	593	563
Ending Vehs	578	597	606	578	602	594
Denied Entry Before	410	366	394	435	438	408
Denied Entry After	1794	1368	1653	1631	1605	1609
Travel Distance (mi)	2153	2183	2205	2199	2202	2189
Travel Time (hr)	1259.0	1043.6	1183.2	1219.4	1201.9	1181.4
Total Delay (hr)	1190.1	973.5	1112.3	1148.5	1131.3	1111.1
Total Stops	15243	13882	15606	14907	14437	14815
Fuel Used (gal)	353.4	304.2	338.3	344.6	340.2	336.1

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	0.4	0.1	1.0	1.9	0.7	1.7	0.9	0.6	0.1	1.6	9.4	1.3
Delay / Veh (s)	46.7	47.7	24.0	86.5	142.1	121.4	30.2	24.6	3.7	304.9	351.4	329.8
Total Stops	31	8	121	109	38	94	79	39	27	52	239	31
Travel Dist (mi)	2.9	0.7	13.1	18.4	4.6	11.6	9.0	7.0	6.3	4.5	22.1	3.0
Travel Time (hr)	0.6	0.1	1.6	2.6	0.9	2.1	1.3	0.8	0.4	1.7	9.9	1.4
Avg Speed (mph)	5	5	8	7	5	5	7	8	17	3	2	2
Fuel Used (gal)	0.2	0.0	0.7	1.0	0.3	0.7	0.6	0.5	0.3	0.5	2.8	0.4
HC Emissions (g)	1	0	6	5	1	6	3	11	3	4	12	2
CO Emissions (g)	49	8	207	199	46	145	134	348	123	134	536	69
NOx Emissions (g)	4	1	19	17	4	14	15	34	10	8	30	4
Vehicles Entered	35	8	155	80	21	52	109	88	78	23	119	18
Vehicles Exited	33	8	150	80	17	48	110	91	76	16	74	11
Hourly Exit Rate	132	32	600	320	68	192	440	364	304	64	296	44
Input Volume	136	46	610	323	79	203	670	535	476	107	514	67
% of Volume	97	70	98	99	86	95	66	68	64	60	58	66
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	1	13	1

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	All
Total Delay (hr)	19.8
Delay / Veh (s)	95.0
Total Stops	868
Travel Dist (mi)	103.2
Travel Time (hr)	23.5
Avg Speed (mph)	5
Fuel Used (gal)	8.0
HC Emissions (g)	54
CO Emissions (g)	1998
NOx Emissions (g)	160
Vehicles Entered	786
Vehicles Exited	714
Hourly Exit Rate	2856
Input Volume	3766
% of Volume	76
Denied Entry Before	0
Denied Entry After	15

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.1	0.4	2.4	3.9	1.8	4.3	3.0	1.7	0.2	13.7	69.9	9.9
Delay / Veh (s)	46.9	49.8	21.9	68.7	125.3	110.0	36.6	25.5	4.1	984.5	928.8	889.9
Total Stops	75	26	306	233	86	232	228	111	80	274	1354	200
Travel Dist (mi)	7.2	2.5	34.1	46.7	11.7	32.3	24.6	19.7	17.3	10.9	58.6	8.6
Travel Time (hr)	1.4	0.5	4.0	5.6	2.2	5.6	4.0	2.3	1.0	14.0	71.3	10.2
Avg Speed (mph)	5	5	9	8	5	6	6	9	17	1	1	1
Fuel Used (gal)	0.5	0.2	1.7	2.3	0.7	1.9	1.7	1.5	0.7	3.5	17.7	2.5
HC Emissions (g)	2	1	17	15	5	8	12	35	10	17	51	10
CO Emissions (g)	97	42	595	500	140	281	409	1083	380	402	1605	275
NOx Emissions (g)	8	4	55	47	13	25	47	104	36	27	100	20
Vehicles Entered	84	29	399	202	50	138	298	243	209	55	279	40
Vehicles Exited	86	30	403	210	55	147	295	242	211	46	263	40
Hourly Exit Rate	115	40	537	280	73	196	393	323	281	61	351	53
Input Volume	117	39	529	280	68	176	581	463	412	92	446	58
% of Volume	98	103	102	100	108	111	68	70	68	67	79	92
Denied Entry Before	0	0	0	0	0	0	0	0	0	1	13	1
Denied Entry After	0	0	0	0	0	0	0	0	0	13	50	9

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	All
Total Delay (hr)	112.5
Delay / Veh (s)	199.6
Total Stops	3205
Travel Dist (mi)	274.3
Travel Time (hr)	122.2
Avg Speed (mph)	3
Fuel Used (gal)	35.1
HC Emissions (g)	183
CO Emissions (g)	5809
NOx Emissions (g)	486
Vehicles Entered	2026
Vehicles Exited	2028
Hourly Exit Rate	2704
Input Volume	3261
% of Volume	83
Denied Entry Before	15
Denied Entry After	72

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Total Delay (hr)	1.5	0.5	3.4	5.9	2.6	6.0	3.9	2.3	0.3	15.3	79.3	11.2
Delay / Veh (s)	46.8	49.3	22.4	73.7	129.8	112.9	34.9	25.3	4.0	786.0	775.7	744.7
Total Stops	105	34	427	342	123	326	307	150	108	326	1593	232
Travel Dist (mi)	10.1	3.2	47.2	65.1	16.3	43.9	33.6	26.7	23.6	15.4	80.7	11.7
Travel Time (hr)	2.0	0.6	5.6	8.2	3.1	7.7	5.3	3.1	1.4	15.7	81.3	11.5
Avg Speed (mph)	5	5	8	8	5	6	6	8	17	1	1	1
Fuel Used (gal)	0.7	0.2	2.4	3.3	1.1	2.6	2.3	2.0	1.0	4.0	20.5	2.9
HC Emissions (g)	3	1	23	21	6	14	15	47	13	20	63	12
CO Emissions (g)	145	50	802	699	186	426	543	1431	503	536	2142	344
NOx Emissions (g)	13	4	75	65	17	40	62	137	46	34	130	24
Vehicles Entered	119	38	554	282	71	190	407	332	287	78	399	58
Vehicles Exited	118	38	553	290	71	194	405	333	286	62	337	50
Hourly Exit Rate	118	38	553	290	71	194	405	333	286	62	337	50
Input Volume	122	41	549	291	71	183	603	481	428	96	463	60
% of Volume	97	93	101	100	100	106	67	69	67	65	73	83
Denied Entry Before	0	0	0	0	0	0	0	0	0	0	0	0
Denied Entry After	0	0	0	0	0	0	0	0	0	13	50	9

1: Plaza Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	All
Total Delay (hr)	132.3
Delay / Veh (s)	171.7
Total Stops	4073
Travel Dist (mi)	377.4
Travel Time (hr)	145.6
Avg Speed (mph)	3
Fuel Used (gal)	43.1
HC Emissions (g)	237
CO Emissions (g)	7807
NOx Emissions (g)	645
Vehicles Entered	2815
Vehicles Exited	2737
Hourly Exit Rate	2737
Input Volume	3387
% of Volume	81
Denied Entry Before	0
Denied Entry After	72

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	18.3	5.2	1.2	1.4	3.6	0.3	30.0
Delay / Veh (s)	281.4	159.4	40.8	29.8	58.8	11.6	115.8
Total Stops	877	320	108	113	231	26	1675
Travel Dist (mi)	123.6	59.3	8.1	12.8	17.9	6.6	228.2
Travel Time (hr)	22.6	7.3	1.5	1.7	4.3	0.6	37.9
Avg Speed (mph)	6	8	5	8	4	11	6
Fuel Used (gal)	7.7	3.0	0.6	0.9	1.6	0.4	14.1
HC Emissions (g)	77	31	4	12	13	3	141
CO Emissions (g)	1596	778	113	393	320	100	3300
NOx Emissions (g)	189	89	15	39	39	13	384
Vehicles Entered	281	137	102	162	220	91	993
Vehicles Exited	186	100	107	167	223	90	873
Hourly Exit Rate	744	400	428	668	892	360	3492
Input Volume	1152	560	643	1089	1084	393	4921
% of Volume	65	71	67	61	82	92	71
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	9	5	0	0	0	0	14

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	169.9	72.2	3.6	3.8	10.4	0.7	260.6
Delay / Veh (s)	1088.4	970.4	40.9	29.0	57.4	10.8	374.5
Total Stops	4074	1652	344	331	685	73	7159
Travel Dist (mi)	287.7	138.7	25.2	37.4	53.1	17.4	559.5
Travel Time (hr)	179.9	77.1	4.5	4.7	12.2	1.5	279.9
Avg Speed (mph)	3	3	6	8	4	12	3
Fuel Used (gal)	47.4	21.0	1.7	2.5	4.5	0.9	78.1
HC Emissions (g)	379	174	16	39	44	10	661
CO Emissions (g)	7511	3770	367	1192	1037	284	14161
NOx Emissions (g)	670	340	49	118	125	37	1339
Vehicles Entered	561	271	319	471	657	238	2517
Vehicles Exited	563	265	313	467	646	238	2492
Hourly Exit Rate	751	353	417	623	861	317	3323
Input Volume	999	485	558	943	939	341	4265
% of Volume	75	73	75	66	92	93	78
Denied Entry Before	9	5	0	0	0	0	14
Denied Entry After	190	101	0	0	0	0	291

2: WB US-50 Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	WBL	WBR	NBL	NBT	SBT	SBR	All
Total Delay (hr)	188.2	77.5	4.8	5.1	14.0	1.0	290.6
Delay / Veh (s)	851.2	722.5	40.9	29.2	57.7	11.1	304.5
Total Stops	4951	1973	452	444	917	99	8836
Travel Dist (mi)	411.2	197.9	33.3	50.3	71.0	24.0	787.7
Travel Time (hr)	202.5	84.5	6.0	6.4	16.4	2.1	317.9
Avg Speed (mph)	3	4	6	8	4	11	4
Fuel Used (gal)	55.1	24.0	2.2	3.4	6.1	1.3	92.1
HC Emissions (g)	456	206	20	51	57	13	803
CO Emissions (g)	9108	4548	480	1584	1356	384	17460
NOx Emissions (g)	858	429	63	157	164	50	1723
Vehicles Entered	842	408	420	633	876	329	3508
Vehicles Exited	750	365	419	634	869	327	3364
Hourly Exit Rate	750	365	419	634	869	327	3364
Input Volume	1037	504	579	980	975	354	4429
% of Volume	72	72	72	65	89	92	76
Denied Entry Before	0	0	0	0	0	0	0
Denied Entry After	190	101	0	0	0	0	291

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	5.7	29.1	2.0	0.1	1.1	3.1	41.2
Delay / Veh (s)	757.2	1059.6	30.5	14.4	55.6	34.5	189.3
Total Stops	71	363	87	9	94	234	858
Travel Dist (mi)	5.0	19.3	8.4	0.5	5.7	27.4	66.3
Travel Time (hr)	5.9	29.9	2.3	0.1	1.3	4.0	43.4
Avg Speed (mph)	3	1	5	11	4	7	3
Fuel Used (gal)	1.5	7.2	0.8	0.0	0.5	1.8	11.7
HC Emissions (g)	9	50	19	2	3	19	102
CO Emissions (g)	222	998	304	22	83	433	2062
NOx Emissions (g)	18	64	26	2	11	64	185
Vehicles Entered	27	105	240	15	71	332	790
Vehicles Exited	28	93	241	15	73	326	776
Hourly Exit Rate	112	372	964	60	292	1304	3104
Input Volume	294	1027	1467	73	351	1856	5068
% of Volume	38	36	66	82	83	70	61
Denied Entry Before	1	1	1	0	0	0	3
Denied Entry After	38	143	4	0	0	0	185

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	72.3	291.4	10.5	0.2	3.4	9.4	387.2
Delay / Veh (s)	3515.0	3733.1	51.6	22.6	58.2	34.1	598.3
Total Stops	219	1043	239	16	281	679	2477
Travel Dist (mi)	14.4	55.0	25.7	1.2	17.0	81.6	194.9
Travel Time (hr)	72.8	293.5	11.2	0.3	4.0	11.9	393.6
Avg Speed (mph)	2	1	5	12	4	7	3
Fuel Used (gal)	16.9	67.8	2.9	0.1	1.4	5.4	94.5
HC Emissions (g)	82	384	208	7	15	69	765
CO Emissions (g)	1865	7892	2746	94	337	1471	14406
NOx Emissions (g)	79	345	197	7	44	219	890
Vehicles Entered	76	285	736	36	207	984	2324
Vehicles Exited	72	278	734	36	215	1000	2335
Hourly Exit Rate	96	371	979	48	287	1333	3113
Input Volume	255	890	1272	64	304	1609	4394
% of Volume	38	42	77	75	94	83	71
Denied Entry Before	38	143	4	0	0	0	185
Denied Entry After	142	528	10	0	0	0	680

3: EB US-50 Off Ramp & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBT	NBR	SBL	SBT	All
Total Delay (hr)	77.9	320.5	12.6	0.3	4.5	12.6	428.4
Delay / Veh (s)	2777.8	3036.5	46.4	20.6	57.5	34.2	495.7
Total Stops	289	1406	326	24	375	913	3333
Travel Dist (mi)	19.4	74.3	34.1	1.8	22.7	109.0	261.2
Travel Time (hr)	78.6	323.3	13.4	0.4	5.3	15.9	437.0
Avg Speed (mph)	2	1	5	12	4	7	3
Fuel Used (gal)	18.4	75.0	3.7	0.1	1.9	7.2	106.2
HC Emissions (g)	91	434	228	9	18	88	868
CO Emissions (g)	2088	8891	3050	117	420	1904	16469
NOx Emissions (g)	97	408	224	8	54	283	1075
Vehicles Entered	102	390	976	51	277	1316	3112
Vehicles Exited	100	370	975	50	288	1326	3109
Hourly Exit Rate	100	370	975	50	288	1326	3109
Input Volume	265	924	1321	66	316	1671	4562
% of Volume	38	40	74	75	91	79	68
Denied Entry Before	1	1	1	0	0	0	3
Denied Entry After	142	528	10	0	0	0	680

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #1 5:00

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	15.0	5.4	0.4	2.9	0.7	1.5	0.0	25.8
Delay / Veh (s)	1861.5	1483.7	60.7	44.4	9.1	14.0	2.0	91.5
Total Stops	94	44	24	161	9	66	1	399
Travel Dist (mi)	4.2	2.0	1.5	17.3	9.5	13.4	1.1	49.0
Travel Time (hr)	15.1	5.4	0.4	3.3	1.0	1.9	0.1	27.3
Avg Speed (mph)	1	1	4	5	9	7	14	3
Fuel Used (gal)	3.6	1.3	0.1	1.3	0.4	1.1	0.0	7.9
HC Emissions (g)	5	3	1	9	4	14	0	35
CO Emissions (g)	242	106	23	315	78	369	13	1147
NOx Emissions (g)	8	5	2	31	10	52	2	110
Vehicles Entered	33	15	21	237	286	395	41	1028
Vehicles Exited	25	12	22	227	286	391	42	1005
Hourly Exit Rate	100	48	88	908	1144	1564	168	4020
Input Volume	421	173	93	1089	1388	2668	272	6104
% of Volume	24	28	95	83	82	59	62	66
Denied Entry Before	1	0	0	0	0	1	0	2
Denied Entry After	72	30	0	0	0	1	0	103

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Interval #2 5:15

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	153.5	60.3	0.8	7.8	2.2	4.4	0.1	229.2
Delay / Veh (s)	9061.7	8686.2	53.4	40.8	9.0	13.3	2.0	273.5
Total Stops	220	95	69	453	23	181	1	1042
Travel Dist (mi)	10.5	4.2	4.2	50.7	28.8	40.5	3.4	142.4
Travel Time (hr)	153.9	60.5	1.0	8.9	3.0	5.6	0.2	233.3
Avg Speed (mph)	0	1	4	6	10	7	14	3
Fuel Used (gal)	35.4	13.8	0.3	3.6	1.3	3.3	0.1	57.9
HC Emissions (g)	80	67	2	30	9	41	2	232
CO Emissions (g)	2640	1460	66	976	213	1095	50	6500
NOx Emissions (g)	69	53	7	99	28	152	7	416
Vehicles Entered	62	26	58	681	865	1190	128	3010
Vehicles Exited	61	24	56	696	863	1196	128	3024
Hourly Exit Rate	81	32	75	928	1151	1595	171	4032
Input Volume	365	150	81	944	1203	2312	236	5291
% of Volume	22	21	92	98	96	69	72	76
Denied Entry Before	72	30	0	0	0	1	0	103
Denied Entry After	278	119	0	0	0	0	0	397

4: Mother Lode Dr. & Missouri Flat Rd. Performance by movement Entire Run

Movement	EBL	EBR	NBL	NBT	NBR	SBT	SBR	All
Total Delay (hr)	168.5	65.7	1.2	10.7	2.9	5.9	0.1	255.0
Delay / Veh (s)	6741.6	6222.2	55.4	41.7	9.0	13.5	2.0	227.7
Total Stops	314	139	93	614	32	248	2	1442
Travel Dist (mi)	14.7	6.2	5.7	68.0	38.4	53.8	4.5	191.4
Travel Time (hr)	169.1	65.9	1.4	12.2	4.0	7.6	0.3	260.5
Avg Speed (mph)	0	1	4	6	10	7	14	3
Fuel Used (gal)	38.9	15.1	0.5	5.0	1.8	4.4	0.2	65.9
HC Emissions (g)	85	70	3	39	12	55	2	267
CO Emissions (g)	2882	1566	89	1291	292	1464	64	7647
NOx Emissions (g)	77	58	10	130	39	204	8	526
Vehicles Entered	95	41	79	918	1151	1585	169	4038
Vehicles Exited	85	35	78	923	1150	1587	169	4027
Hourly Exit Rate	85	35	78	923	1150	1587	169	4027
Input Volume	379	156	84	980	1249	2401	245	5494
% of Volume	22	22	93	94	92	66	69	73
Denied Entry Before	1	0	0	0	0	1	0	2
Denied Entry After	278	119	0	0	0	0	0	397

Total Network Performance By Interval

Interval Start	5:00	5:15	All
Total Delay (hr)	135.2	1111.1	1246.3
Delay / Veh (s)	306.7	944.3	770.4
Total Stops	4114	14815	18930
Travel Dist (mi)	799.1	2188.5	2987.6
Travel Time (hr)	161.1	1181.4	1342.5
Avg Speed (mph)	7	5	5
Fuel Used (gal)	60.7	336.1	396.8
HC Emissions (g)	555	2530	3085
CO Emissions (g)	17140	66905	84045
NOx Emissions (g)	1589	5361	6950
Vehicles Entered	1700	4246	5949
Vehicles Exited	1474	4221	5696
Hourly Exit Rate	5896	5628	5696
Input Volume	33494	29028	30144
% of Volume	18	19	19
Denied Entry Before	10	408	10
Denied Entry After	408	1609	1609

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	322	240	514	635	198	201	115	122	54	109	970	975
Average Queue (ft)	213	149	262	486	116	131	62	71	30	67	592	607
95th Queue (ft)	312	254	587	713	192	197	119	131	58	128	1144	1124
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)											7	10
Queuing Penalty (veh)											0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)							0			13	78	
Queuing Penalty (veh)							0			33	83	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	363	257	562	710	198	214	163	129	112	109	1187	1184
Average Queue (ft)	192	135	206	409	111	125	54	61	29	69	1116	1115
95th Queue (ft)	300	236	519	722	182	198	123	109	71	138	1334	1320
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)							0				46	42
Queuing Penalty (veh)							1				0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	1				19	83	
Queuing Penalty (veh)					0	1				43	76	

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	WB	WB	NB	NB	NB	NB	NB	SB	SB	SB
Directions Served	LTR	R	L	LTR	L	L	T	T	R	L	T	TR
Maximum Queue (ft)	366	269	629	720	209	224	185	145	112	109	1187	1184
Average Queue (ft)	197	138	220	428	112	126	56	63	29	69	990	993
95th Queue (ft)	304	241	538	727	185	198	123	115	68	135	1486	1467
Link Distance (ft)	447	447	1208	1208			366	366	366		1167	1167
Upstream Blk Time (%)							0				37	34
Queuing Penalty (veh)							1				0	0
Storage Bay Dist (ft)					235	235				85		
Storage Blk Time (%)					0	0	0			18	82	
Queuing Penalty (veh)					0	1	0			40	78	

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2364	2394	625	68	174	224	330	324	383	392	260
Average Queue (ft)	1377	1417	500	40	155	195	243	203	362	356	126
95th Queue (ft)	2698	2739	875	71	191	250	352	342	420	437	339
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	4	6					1		19	17	
Queuing Penalty (veh)	0	0					12		141	120	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		48	2		11	20	18			26	0
Queuing Penalty (veh)		267	9		62	110	114			101	1

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2762	2768	1365	506	174	224	334	354	385	423	260
Average Queue (ft)	2709	2714	691	84	154	196	206	180	362	365	136
95th Queue (ft)	2921	2911	1334	337	204	256	317	304	406	435	349
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	45	57					0	0	15	14	
Queuing Penalty (veh)	0	0					2	1	96	88	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		65	5	0	12	21	15			22	0
Queuing Penalty (veh)		316	27	1	55	100	86			77	0

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Movement	WB	WB	WB	WB	NB	NB	NB	NB	SB	SB	SB
Directions Served	L	L	R	R	L	L	T	T	T	T	R
Maximum Queue (ft)	2766	2768	1365	507	174	224	342	403	386	423	260
Average Queue (ft)	2387	2401	645	73	154	195	215	186	362	363	134
95th Queue (ft)	3545	3536	1249	296	201	254	329	314	410	436	347
Link Distance (ft)	2724	2724					349	349	366	366	
Upstream Blk Time (%)	35	44					1	0	16	15	
Queuing Penalty (veh)	0	0					5	1	107	96	
Storage Bay Dist (ft)			600	600	125	125					235
Storage Blk Time (%)		61	4	0	12	21	16			23	0
Queuing Penalty (veh)		304	23	0	56	102	93			83	1

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1069	669	147	142	107	160	224	375	381
Average Queue (ft)	606	1012	593	141	119	25	107	193	361	365
95th Queue (ft)	905	1228	764	148	164	84	169	267	387	383
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		63		56	21	0			12	19
Queuing Penalty (veh)		0		419	162	0			130	207
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	0	73	63		30	0	6	11	29	
Queuing Penalty (veh)	1	483	505		22	0	51	103	100	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1074	588	152	148	96	174	225	398	381
Average Queue (ft)	585	1048	569	140	111	22	110	173	364	362
95th Queue (ft)	933	1061	581	149	165	78	174	263	395	382
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		68		52	18	0			14	20
Queuing Penalty (veh)		0		342	117	0			132	187
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	0	75	69		25	0	6	13	29	
Queuing Penalty (veh)	4	428	484		16	0	50	102	89	

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	SB	SB	SB	SB
Directions Served	L	LR	R	T	T	R	L	L	T	T
Maximum Queue (ft)	700	1081	674	155	149	107	174	225	398	387
Average Queue (ft)	590	1039	575	140	113	23	110	178	363	363
95th Queue (ft)	927	1148	661	149	165	79	173	266	393	382
Link Distance (ft)		1031		114	114				349	349
Upstream Blk Time (%)		67		53	19	0			13	19
Queuing Penalty (veh)		0		361	128	0			131	192
Storage Bay Dist (ft)	675		545			85	125	125		
Storage Blk Time (%)	0	74	68		26	0	6	12	29	
Queuing Penalty (veh)	3	441	489		17	0	50	102	92	

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	894	119	173	397	383	187	735	881	138	135	33
Average Queue (ft)	209	878	49	82	385	195	36	464	619	132	123	5
95th Queue (ft)	214	972	133	194	432	460	199	953	1178	139	138	30
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		79			39	0	0	2	10	39	38	
Queuing Penalty (veh)		0			0	0	0	0	0	376	364	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	99		1	1	45	1	0					
Queuing Penalty (veh)	379		4	3	42	8	0					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	900	109	224	399	395	312	802	887	168	160	50
Average Queue (ft)	208	892	31	79	367	196	34	425	587	134	128	3
95th Queue (ft)	215	901	86	200	457	423	193	1017	1200	155	150	26
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		92			34	1	0	3	13	37	37	
Queuing Penalty (veh)		0			0	0	0	0	0	306	308	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	99	1		0	41	0	0					
Queuing Penalty (veh)	328	3		0	33	4	1					

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Movement	EB	EB	EB	NB	NB	NB	NB	B83	B83	SB	SB	SB
Directions Served	L	L	R	L	T	T	R	T	T	T	T	R
Maximum Queue (ft)	210	900	138	224	402	398	312	802	888	168	160	61
Average Queue (ft)	208	889	35	80	372	196	34	434	594	133	127	4
95th Queue (ft)	215	936	100	198	454	432	195	1004	1196	152	147	27
Link Distance (ft)		878			320	320		861	861	114	114	114
Upstream Blk Time (%)		89			35	1	0	3	12	37	37	
Queuing Penalty (veh)		0			0	0	0	0	0	324	322	
Storage Bay Dist (ft)	185		185	200			300					
Storage Blk Time (%)	99	1	0	0	42	0	0					
Queuing Penalty (veh)	340	2	1	1	35	5	1					

Network Summary

Network wide Queuing Penalty, Interval #1: 4410
Network wide Queuing Penalty, Interval #2: 3901
Network wide Queuing Penalty, All Intervals: 4028

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #1

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	11.0	40.3	28.1	26.0	20.0	27.6
g/C Ratio	0.07	0.35	0.24	0.23	0.17	0.24
Cycles Skipped (%)	29	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	14	100	57	88	100	100
Cycles with Peds (%)	0	0	0	0	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 1: Plaza Dr. & Missouri Flat Rd., Interval #2

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.4	39.9	27.9	24.6	20.9	26.8
g/C Ratio	0.06	0.35	0.24	0.21	0.18	0.23
Cycles Skipped (%)	32	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	9	100	55	78	100	92
Cycles with Peds (%)	0	13	9	0	0	13

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 23

Intersection: 1: Plaza Dr. & Missouri Flat Rd., All Intervals

Phase	1	2	4	5	6	8
Movement(s) Served	SBL	NBT	EBTL	NBL	SBT	WBTL
Maximum Green (s)	14.0	32.0	30.0	26.0	20.0	23.0
Minimum Green (s)	4.0	4.0	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	None	C-Min	None
Avg. Green (s)	10.1	40.0	27.9	24.9	20.7	27.0
g/C Ratio	0.06	0.35	0.24	0.22	0.18	0.23
Cycles Skipped (%)	30	0	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0	0	0
Cycles Maxed Out (%)	13	100	55	84	100	97
Cycles with Peds (%)	0	10	10	0	0	13

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 30

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #1

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	65.3	41.7	20.6	40.6
g/C Ratio	0.57	0.36	0.18	0.35
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	38	100
Cycles with Peds (%)	14	0	0	0

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., Interval #2

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	65.7	41.2	21.2	40.5
g/C Ratio	0.57	0.36	0.18	0.35
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	52	100
Cycles with Peds (%)	13	0	0	9

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 23

Intersection: 2: WB US-50 Ramp & Missouri Flat Rd., All Intervals

Phase	2	3	5	6
Movement(s) Served	NBT	WBL	NBL	SBT
Maximum Green (s)	66.0	41.0	23.0	39.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	65.6	41.3	21.0	40.6
g/C Ratio	0.57	0.36	0.18	0.35
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	52	100
Cycles with Peds (%)	13	0	0	10

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 30

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #1

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.0	50.0	39.0	68.0
g/C Ratio	0.12	0.43	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	14	0	0

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., Interval #2

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.0	28.0	39.0	68.0
g/C Ratio	0.12	0.24	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	12	0	4

Controller Summary

Average Cycle Length (s): 115.0
Number of Complete Cycles : 22

Intersection: 3: EB US-50 Off Ramp & Missouri Flat Rd., All Intervals

Phase	1	2	4	6
Movement(s) Served	SBL	NBT	EBTL	SBT
Maximum Green (s)	14.0	50.0	39.0	68.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	None	C-Min	None	C-Min
Avg. Green (s)	14.0	31.3	39.0	68.0
g/C Ratio	0.12	0.27	0.34	0.59
Cycles Skipped (%)	0	0	0	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	100	100
Cycles with Peds (%)	0	13	0	3

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 29

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #1

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	77.8	29.1	17.4	62.0
g/C Ratio	0.68	0.25	0.13	0.54
Cycles Skipped (%)	0	0	14	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	86	100
Cycles with Peds (%)	0	13	0	14

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 7

Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., Interval #2

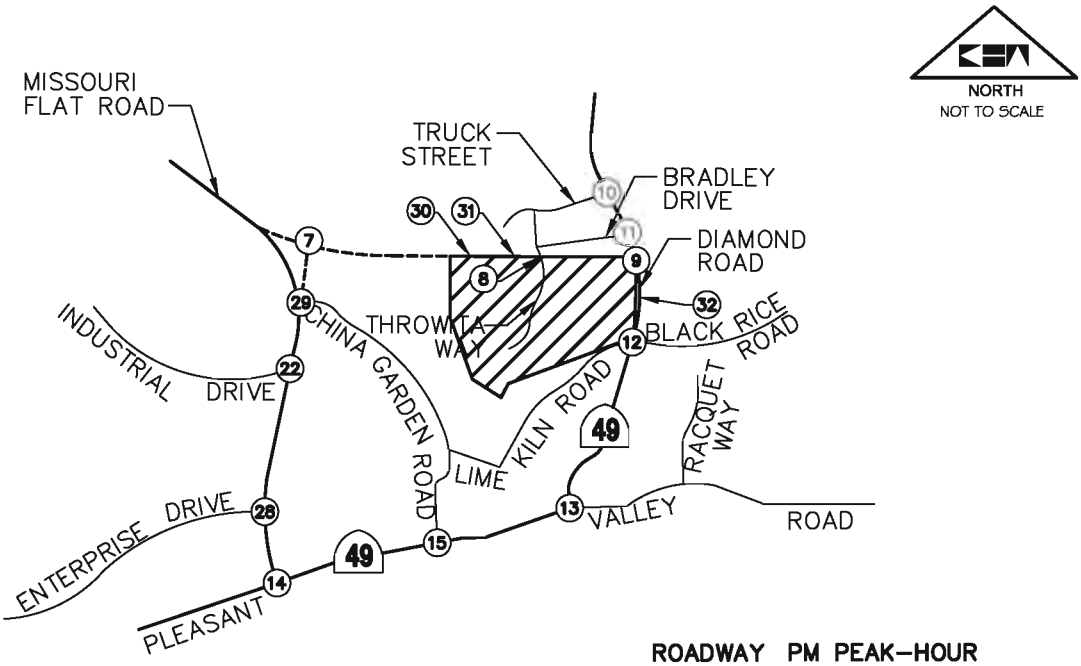
Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	76.8	30.3	15.4	61.5
g/C Ratio	0.67	0.26	0.11	0.54
Cycles Skipped (%)	0	0	18	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	68	100
Cycles with Peds (%)	0	9	0	9

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 22

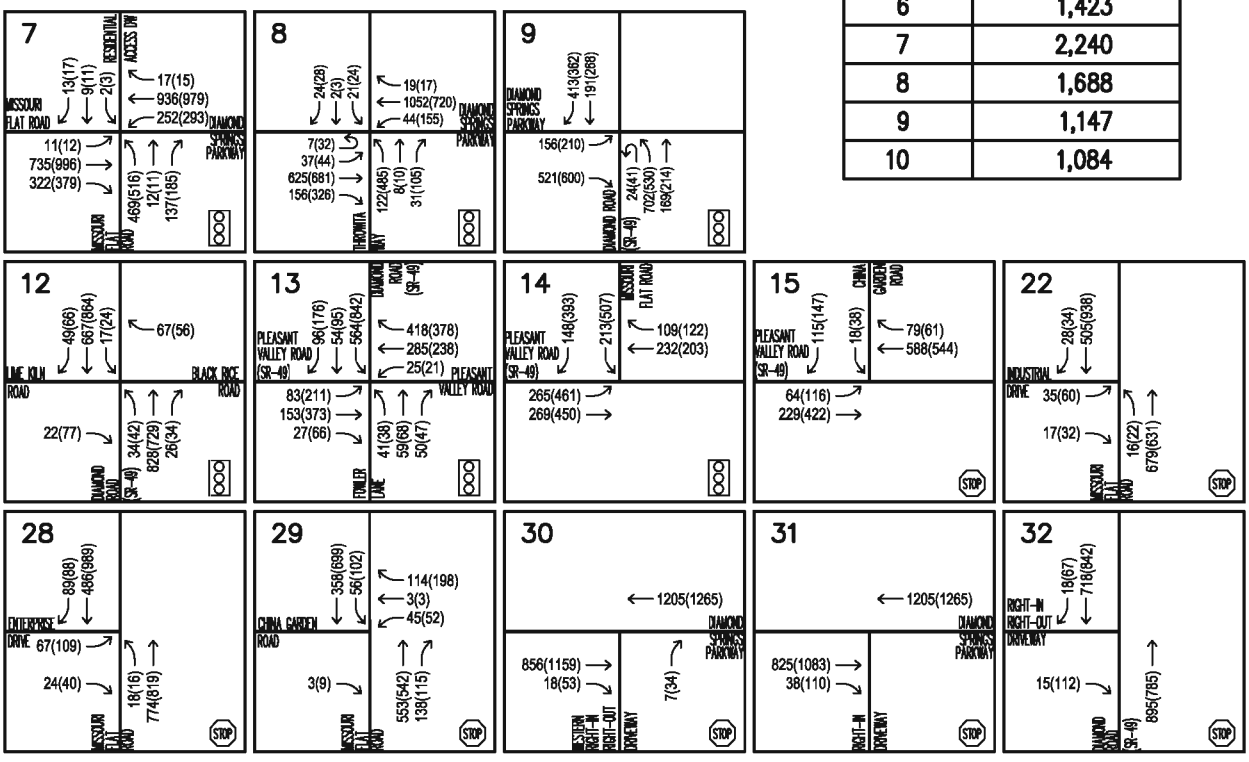
Intersection: 4: Mother Lode Dr. & Missouri Flat Rd., All Intervals

Phase	2	4	5	6
Movement(s) Served	NBT	EBL	NBL	SBT
Maximum Green (s)	78.0	29.0	16.0	58.0
Minimum Green (s)	4.0	4.0	4.0	4.0
Recall	C-Min	None	None	C-Min
Avg. Green (s)	77.1	30.0	15.3	61.6
g/C Ratio	0.67	0.26	0.11	0.54
Cycles Skipped (%)	0	0	17	0
Cycles @ Minimum (%)	0	0	0	0
Cycles Maxed Out (%)	100	100	70	100
Cycles with Peds (%)	0	10	0	10

Controller Summary
Average Cycle Length (s): 115.0
Number of Complete Cycles : 29



ROADWAY SEGMENT	PM PEAK-HOUR VOLUME
2	1,468
3	1,489
5	1,696
6	1,423
7	2,240
8	1,688
9	1,147
10	1,084



Kimley-Horn and Associates, Inc.

ATTACHMENT C

DIAMOND DORADO RETAIL CENTER
EL DORADO COUNTY, CA

EXISTING PLUS APPROVED PROJECTS (2015) PLUS PROPOSED PROJECT PEAK-HOUR TRAFFIC VOLUMES

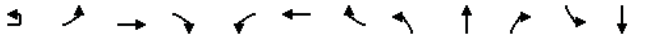
Appendix D:

Existing plus Approved Projects (2015) plus Proposed Project Analysis Worksheets

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	11	735	322	252	936	17	469	12	137	2	9	13
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Lane Util. Factor	1.00	0.95	1.00	1.00	0.95	1.00	0.97	1.00		1.00	1.00	
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	0.86		1.00	0.91	
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1583	3167	1417	1583	3167	1417	2984	1395		1583	1521	
Flt Permitted	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (perm)	1583	3167	1417	1583	3167	1417	2984	1395		1583	1521	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	12	817	358	280	1040	19	521	13	152	2	10	14
RTOR Reduction (vph)	0	0	163	0	0	2	0	113	0	0	13	0
Lane Group Flow (vph)	12	817	195	280	1040	17	521	52	0	2	11	0
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Prot		pm+ov	Prot		Perm	Prot			Prot		
Protected Phases	5	2	7	1	6		7	4		3	8	
Permitted Phases			2			6						
Actuated Green, G (s)	1.2	30.4	47.0	16.6	45.8	45.8	16.6	22.4		0.9	6.7	
Effective Green, g (s)	1.2	30.4	47.0	16.6	45.8	45.8	16.6	22.4		0.9	6.7	
Actuated g/C Ratio	0.01	0.35	0.54	0.19	0.53	0.53	0.19	0.26		0.01	0.08	
Clearance Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	22	1116	837	304	1681	752	574	362		17	118	
v/s Ratio Prot	0.01	c0.26	0.04	c0.18	0.33		c0.17	c0.04		0.00	0.01	
v/s Ratio Perm			0.09			0.01						
v/c Ratio	0.55	0.73	0.23	0.92	0.62	0.02	0.91	0.14		0.12	0.09	
Uniform Delay, d1	42.3	24.4	10.2	34.2	14.1	9.6	34.1	24.6		42.3	37.0	
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00		1.00	1.00	
Incremental Delay, d2	24.9	2.5	0.1	31.8	0.7	0.0	18.1	0.2		3.1	0.3	
Delay (s)	67.1	26.9	10.4	66.0	14.8	9.6	52.2	24.8		45.4	37.3	
Level of Service	E	C	B	E	B	A	D	C		D	D	
Approach Delay (s)		22.3			25.5			45.6			37.9	
Approach LOS		C			C			D			D	

Intersection Summary				
HCM Average Control Delay	28.7	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.73			
Actuated Cycle Length (s)	86.3	Sum of lost time (s)	12.0	
Intersection Capacity Utilization	69.9%	ICU Level of Service	C	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBU	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT
Lane Configurations												
Volume (vph)	7	37	625	156	44	1052	19	122	8	31	21	2
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Lane Util. Factor		1.00	1.00	1.00	1.00	0.95		0.95	0.95	1.00		1.00
Frt		1.00	1.00	0.85	1.00	1.00		1.00	1.00	0.85		0.93
Flt Protected		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (prot)		1583	1667	1417	1583	3158		1461	1474	1376		1473
Flt Permitted		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (perm)		1583	1667	1417	1583	3158		1461	1474	1376		1473
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	8	41	694	173	49	1169	21	136	9	34	23	2
RTOR Reduction (vph)	0	0	0	50	0	1	0	0	0	30	0	24
Lane Group Flow (vph)	0	49	694	123	49	1189	0	72	73	4	0	28
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	2%	5%	5%	5%	5%	5%
Turn Type	Prot	Prot		Perm	Prot			Split		Perm	Split	
Protected Phases	7	7	4		3	8		2	2		6	6
Permitted Phases				4						2		
Actuated Green, G (s)		3.2	63.4	63.4	3.2	63.4		11.7	11.7	11.7		10.7
Effective Green, g (s)		3.2	63.4	63.4	3.2	63.4		11.7	11.7	11.7		10.7
Actuated g/C Ratio		0.03	0.60	0.60	0.03	0.60		0.11	0.11	0.11		0.10
Clearance Time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Vehicle Extension (s)		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0		3.0
Lane Grp Cap (vph)		48	1007	856	48	1907		163	164	153		150
v/s Ratio Prot		c0.03	c0.42		0.03	0.38		0.05	c0.05			c0.02
v/s Ratio Perm				0.09						0.00		
v/c Ratio		1.02	0.69	0.14	1.02	0.62		0.44	0.45	0.02		0.19
Uniform Delay, d1		50.9	14.1	9.0	50.9	13.2		43.6	43.6	41.6		43.2
Progression Factor		1.00	1.00	1.00	0.90	0.45		1.00	1.00	1.00		1.00
Incremental Delay, d2		136.0	3.9	0.4	124.8	1.3		1.9	1.9	0.1		0.6
Delay (s)		186.9	18.0	9.4	170.4	7.3		45.5	45.5	41.6		43.8
Level of Service		F	B	A	F	A		D	D	D		D
Approach Delay (s)			25.4			13.7			44.8			43.8
Approach LOS			C			B			D			D

Intersection Summary				
HCM Average Control Delay	21.2	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.61			
Actuated Cycle Length (s)	105.0	Sum of lost time (s)	16.0	
Intersection Capacity Utilization	57.3%	ICU Level of Service	B	
Analysis Period (min)	15			

c Critical Lane Group

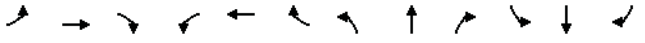
Movement	SBR
Lane Configurations	
Volume (vph)	24
Ideal Flow (vphpl)	1700
Total Lost time (s)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Peak-hour factor, PHF	0.90
Adj. Flow (vph)	27
RTOR Reduction (vph)	0
Lane Group Flow (vph)	0
Heavy Vehicles (%)	5%
Turn Type	
Protected Phases	
Permitted Phases	
Actuated Green, G (s)	
Effective Green, g (s)	
Actuated g/C Ratio	
Clearance Time (s)	
Vehicle Extension (s)	
Lane Grp Cap (vph)	
v/s Ratio Prot	
v/s Ratio Perm	
v/c Ratio	
Uniform Delay, d1	
Progression Factor	
Incremental Delay, d2	
Delay (s)	
Level of Service	
Approach Delay (s)	
Approach LOS	

Intersection Summary

Movement	EBL	EBR	NBU	NBL	NBT	SBT	SBR
Lane Configurations							
Volume (vph)	156	521	24	702	169	191	413
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00		0.97	1.00	1.00	1.00
Frt	1.00	0.85		1.00	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (prot)	1583	1417		2984	1619	1619	1376
Flt Permitted	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (perm)	1583	1417		2984	1619	1619	1376
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	173	579	27	780	188	212	459
RTOR Reduction (vph)	0	481	0	0	0	0	368
Lane Group Flow (vph)	173	98	0	807	188	212	91
Heavy Vehicles (%)	2%	2%	5%	5%	5%	5%	5%
Turn Type		Perm	Prot	Prot			Perm
Protected Phases	4		5	5	2	6	
Permitted Phases		4					6
Actuated Green, G (s)	17.7	17.7		54.4	79.3	20.9	20.9
Effective Green, g (s)	17.7	17.7		54.4	79.3	20.9	20.9
Actuated g/C Ratio	0.17	0.17		0.52	0.76	0.20	0.20
Clearance Time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	267	239		1546	1223	322	274
v/s Ratio Prot	c0.11			c0.27	0.12	c0.13	
v/s Ratio Perm		0.07					0.07
v/c Ratio	0.65	0.41		0.52	0.15	0.66	0.33
Uniform Delay, d1	40.7	39.0		16.7	3.6	38.8	36.1
Progression Factor	0.58	4.15		1.00	1.00	1.00	1.00
Incremental Delay, d2	4.2	0.9		1.3	0.1	4.8	0.7
Delay (s)	28.0	162.5		18.0	3.6	43.6	36.8
Level of Service	C	F		B	A	D	D
Approach Delay (s)	131.5				15.3	38.9	
Approach LOS	F				B	D	

Intersection Summary				
HCM Average Control Delay	58.0	HCM Level of Service	E
HCM Volume to Capacity ratio	0.58		
Actuated Cycle Length (s)	105.0	Sum of lost time (s)	12.0
Intersection Capacity Utilization	80.4%	ICU Level of Service	D
Analysis Period (min)	15		

c Critical Lane Group



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	22	0	0	67	34	828	26	17	667	49
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	24	0	0	74	38	920	29	19	741	54
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								None			None	
Median storage veh)												
Upstream signal (ft)											690	
pX, platoon unblocked	0.90	0.90	0.90	0.90	0.90		0.90					
vC, conflicting volume	1876	1831	768	1813	1843	934	796			949		
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	1917	1866	690	1847	1880	934	720			949		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)												
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	94	100	100	77	95			97		
cM capacity (veh/h)	33	60	397	45	58	318	784			712		

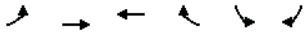
Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	24	74	38	949	19	796
Volume Left	0	0	38	0	19	0
Volume Right	24	74	0	29	0	54
cSH	397	318	784	1700	712	1700
Volume to Capacity	0.06	0.23	0.05	0.56	0.03	0.47
Queue Length 95th (ft)	5	22	4	0	2	0
Control Delay (s)	14.6	19.8	9.8	0.0	10.2	0.0
Lane LOS	B	C	A		B	
Approach Delay (s)	14.6	19.8	0.4		0.2	
Approach LOS	B	C				

Intersection Summary				
Average Delay	1.3			
Intersection Capacity Utilization	61.8%	ICU Level of Service		B
Analysis Period (min)	15			

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	83	153	27	25	285	418	41	59	50	564	54	96
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00		1.00	1.00	0.97	1.00	
Frt	1.00	0.98		1.00	1.00	0.85		1.00	0.85	1.00	0.90	
Flt Protected	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (prot)	1538	3007		1583	1667	1417		1633	1417	2984	1463	
Flt Permitted	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (perm)	1538	3007		1583	1667	1417		1633	1417	2984	1463	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	92	170	30	28	317	464	46	66	56	627	60	107
RTOR Reduction (vph)	0	18	0	0	0	204	0	0	46	0	69	0
Lane Group Flow (vph)	92	182	0	28	317	260	0	112	10	627	98	0
Heavy Vehicles (%)	5%	5%	5%	2%	2%	2%	2%	2%	2%	5%	5%	5%
Turn Type	Prot			Prot		pm+ov	Split		pm+ov	Split		
Protected Phases	5	2		1	6	4	8	8	1	4	4	
Permitted Phases						6			8			
Actuated Green, G (s)	6.0	21.0		3.3	18.3	38.0		8.2	11.5	19.7	19.7	
Effective Green, g (s)	6.0	21.0		3.3	18.3	38.0		8.2	11.5	19.7	19.7	
Actuated g/C Ratio	0.09	0.31		0.05	0.27	0.56		0.12	0.17	0.29	0.29	
Clearance Time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Vehicle Extension (s)	0.2	3.2		0.2	3.2	3.0		3.0	0.2	3.0	3.0	
Lane Grp Cap (vph)	136	933		77	451	795		198	241	868	426	
v/s Ratio Prot	c0.06	c0.06		0.02	c0.19	0.10		c0.07	0.00	c0.21	0.07	
v/s Ratio Perm						0.09			0.00			
v/c Ratio	0.68	0.20		0.36	0.70	0.33		0.57	0.04	0.72	0.23	
Uniform Delay, d1	29.9	17.1		31.2	22.3	8.0		28.1	23.5	21.5	18.2	
Progression Factor	1.00	1.00		1.00	1.00	1.00		1.00	1.00	1.00	1.00	
Incremental Delay, d2	10.0	0.1		1.1	5.0	0.2		3.7	0.0	3.0	0.3	
Delay (s)	39.9	17.3		32.2	27.2	8.2		31.7	23.5	24.5	18.5	
Level of Service	D	B		C	C	A		C	C	C	B	
Approach Delay (s)		24.4			16.5			29.0			23.3	
Approach LOS		C			B			C			C	

Intersection Summary			
HCM Average Control Delay	21.2	HCM Level of Service	C
HCM Volume to Capacity ratio	0.72		
Actuated Cycle Length (s)	67.7	Sum of lost time (s)	19.9
Intersection Capacity Utilization	59.6%	ICU Level of Service	B
Analysis Period (min)	15		

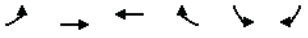
c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (vph)	265	269	232	109	213	148
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Lane Util. Factor	0.97	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	1.00	0.85	1.00	0.85
Flt Protected	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (prot)	2984	1619	1619	1376	1583	1417
Flt Permitted	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (perm)	2984	1619	1619	1376	1583	1417
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	294	299	258	121	237	164
RTOR Reduction (vph)	0	0	0	4	0	96
Lane Group Flow (vph)	294	299	258	117	237	68
Heavy Vehicles (%)	5%	5%	5%	5%	2%	2%
Turn Type	Prot			pm+ov		pm+ov
Protected Phases	5	2	6	4	4	5
Permitted Phases				6		4
Actuated Green, G (s)	5.9	19.7	10.8	20.0	9.2	15.1
Effective Green, g (s)	5.9	19.7	10.8	20.0	9.2	15.1
Actuated g/C Ratio	0.16	0.54	0.30	0.55	0.25	0.41
Clearance Time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Vehicle Extension (s)	0.2	0.2	0.2	3.5	3.5	0.2
Lane Grp Cap (vph)	482	874	479	754	399	586
v/s Ratio Prot	c0.10	0.18	c0.16	0.04	c0.15	0.02
v/s Ratio Perm				0.05		0.03
v/c Ratio	0.61	0.34	0.54	0.16	0.59	0.12
Uniform Delay, d1	14.2	4.7	10.8	4.1	12.0	6.6
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	1.5	0.1	0.6	0.1	2.5	0.0
Delay (s)	15.7	4.8	11.3	4.2	14.5	6.6
Level of Service	B	A	B	A	B	A
Approach Delay (s)		10.2	9.1		11.3	
Approach LOS		B	A		B	

Intersection Summary				
HCM Average Control Delay	10.2	HCM Level of Service	B	
HCM Volume to Capacity ratio	0.57			
Actuated Cycle Length (s)	36.5	Sum of lost time (s)	10.6	
Intersection Capacity Utilization	45.4%	ICU Level of Service	A	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	64	229	588	79	18	115
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	71	254	653	88	20	128
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	741				1094	697
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	741				1094	697
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	92				91	71
cM capacity (veh/h)	852				217	441

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	326	741	148
Volume Left	71	0	20
Volume Right	0	88	128
cSH	852	1700	387
Volume to Capacity	0.08	0.44	0.38
Queue Length 95th (ft)	7	0	44
Control Delay (s)	2.8	0.0	19.9
Lane LOS	A		C
Approach Delay (s)	2.8	0.0	19.9
Approach LOS			C

Intersection Summary			
Average Delay	3.2		
Intersection Capacity Utilization	76.4%	ICU Level of Service	D
Analysis Period (min)	15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	35	17	16	679	505	28
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	39	19	18	754	561	31
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)					1251	
pX, platoon unblocked						
vC, conflicting volume	1367	577	592			
vC1, stage 1 conf vol	577					
vC2, stage 2 conf vol	790					
vCu, unblocked vol	1367	577	592			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	89	96	98			
cM capacity (veh/h)	364	511	969			

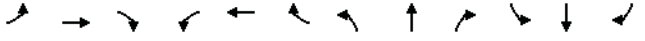
Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	58	18	754	592
Volume Left	39	18	0	0
Volume Right	19	0	0	31
cSH	401	969	1700	1700
Volume to Capacity	0.14	0.02	0.44	0.35
Queue Length 95th (ft)	12	1	0	0
Control Delay (s)	15.5	8.8	0.0	0.0
Lane LOS	C	A		
Approach Delay (s)	15.5	0.2		0.0
Approach LOS	C			

Intersection Summary				
Average Delay		0.7		
Intersection Capacity Utilization		49.9%	ICU Level of Service	A
Analysis Period (min)		15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	67	24	18	774	486	89
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	74	27	20	860	540	99
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)				914		
pX, platoon unblocked						
vC, conflicting volume	1489	589	639			
vC1, stage 1 conf vol	589					
vC2, stage 2 conf vol	900					
vCu, unblocked vol	1489	589	639			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	78	95	98			
cM capacity (veh/h)	333	508	931			

Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	101	20	860	639
Volume Left	74	20	0	0
Volume Right	27	0	0	99
cSH	366	931	1700	1700
Volume to Capacity	0.28	0.02	0.51	0.38
Queue Length 95th (ft)	28	2	0	0
Control Delay (s)	18.5	9.0	0.0	0.0
Lane LOS	C	A		
Approach Delay (s)	18.5	0.2		0.0
Approach LOS	C			

Intersection Summary				
Average Delay		1.3		
Intersection Capacity Utilization		58.0%	ICU Level of Service	B
Analysis Period (min)		15		



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	3	45	3	114	0	553	138	56	358	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	3	50	3	127	0	614	153	62	398	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	1265	1290	398	1217	1213	691	398			768		
vC1, stage 1 conf vol	522	522		691	691							
vC2, stage 2 conf vol	743	768		526	522							
vCu, unblocked vol	1265	1290	398	1217	1213	691	398			768		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	99	86	99	72	100			93		
cM capacity (veh/h)	209	303	645	348	358	444	1145			846		

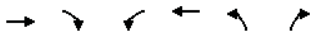
Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	3	180	0	768	62	398
Volume Left	0	50	0	0	62	0
Volume Right	3	127	0	153	0	0
cSH	645	411	1700	1700	846	1700
Volume to Capacity	0.01	0.44	0.00	0.45	0.07	0.23
Queue Length 95th (ft)	0	54	0	0	6	0
Control Delay (s)	10.6	20.4	0.0	0.0	9.6	0.0
Lane LOS	B	C			A	
Approach Delay (s)	10.6	20.4	0.0		1.3	
Approach LOS	B	C				

Intersection Summary				
Average Delay	3.1			
Intersection Capacity Utilization	72.8%	ICU Level of Service	C	
Analysis Period (min)	15			

Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	856	18	0	1205	0	7
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	951	20	0	1339	0	8
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				679		
pX, platoon unblocked					0.77	
vC, conflicting volume			971		1621	951
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			971		1213	951
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	97
cM capacity (veh/h)			706		135	260

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1
Volume Total	951	20	669	669	8
Volume Left	0	0	0	0	0
Volume Right	0	20	0	0	8
cSH	1700	1700	1700	1700	260
Volume to Capacity	0.56	0.01	0.39	0.39	0.03
Queue Length 95th (ft)	0	0	0	0	2
Control Delay (s)	0.0	0.0	0.0	0.0	19.3
Lane LOS					C
Approach Delay (s)	0.0		0.0		19.3
Approach LOS					C

Intersection Summary				
Average Delay	0.1			
Intersection Capacity Utilization	60.4%	ICU Level of Service	B	
Analysis Period (min)	15			



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	825	38	0	1205	0	0
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	917	42	0	1339	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				386		
pX, platoon unblocked					0.77	
vC, conflicting volume			959		1586	917
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			959		1156	917
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	100
cM capacity (veh/h)			713		146	274

Direction, Lane #	EB 1	EB 2	WB 1	WB 2
Volume Total	917	42	669	669
Volume Left	0	0	0	0
Volume Right	0	42	0	0
cSH	1700	1700	1700	1700
Volume to Capacity	0.54	0.02	0.39	0.39
Queue Length 95th (ft)	0	0	0	0
Control Delay (s)	0.0	0.0	0.0	0.0
Lane LOS				
Approach Delay (s)	0.0		0.0	
Approach LOS				

Intersection Summary				
Average Delay	0.0			
Intersection Capacity Utilization	51.9%	ICU Level of Service	A	
Analysis Period (min)	15			

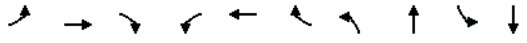
Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	0	15	0	895	718	18
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	17	0	994	798	20
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				None	None	
Median storage veh)						
Upstream signal (ft)					247	
pX, platoon unblocked	0.89	0.89	0.89			
vC, conflicting volume	1129	798	818			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1082	708	731			
tC, single (s)	6.8	6.9	4.2			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	95	100			
cM capacity (veh/h)	188	334	754			

Direction, Lane #	EB 1	NB 1	NB 2	NB 3	SB 1	SB 2
Volume Total	17	331	331	331	798	20
Volume Left	0	0	0	0	0	0
Volume Right	17	0	0	0	0	20
cSH	334	1700	1700	1700	1700	1700
Volume to Capacity	0.05	0.19	0.19	0.19	0.47	0.01
Queue Length 95th (ft)	4	0	0	0	0	0
Control Delay (s)	16.3	0.0	0.0	0.0	0.0	0.0
Lane LOS	C					
Approach Delay (s)	16.3	0.0			0.0	
Approach LOS	C					

Intersection Summary				
Average Delay	0.1			
Intersection Capacity Utilization	52.2%	ICU Level of Service	A	
Analysis Period (min)	15			

7: Missouri Flat Rd. & Diamond Springs Pkwy

AM Peak



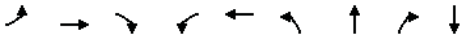
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	SBL	SBT
Lane Group Flow (vph)	12	817	358	280	1040	19	521	165	2	24
v/c Ratio	0.09	0.77	0.36	0.85	0.57	0.02	0.84	0.33	0.02	0.12
Control Delay	43.0	31.5	2.8	58.4	16.8	13.1	46.8	6.7	43.5	21.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	43.0	31.5	2.8	58.4	16.8	13.1	46.8	6.7	43.5	21.2
Queue Length 50th (ft)	5	153	0	115	102	2	110	4	1	4
Queue Length 95th (ft)	28	#422	51	#409	#513	23	#337	49	10	25
Internal Link Dist (ft)		191			465			499		239
Turn Bay Length (ft)	100		250	325		50	325		50	
Base Capacity (vph)	330	1238	989	330	1819	816	622	693	330	642
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.04	0.66	0.36	0.85	0.57	0.02	0.84	0.24	0.01	0.04

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

8: Diamond Springs Pkwy & Throwita Way

AM Peak



Lane Group	EBL	EBT	EBR	WBL	WBT	NBL	NBT	NBR	SBT
Lane Group Flow (vph)	49	694	173	49	1190	72	73	34	52
v/c Ratio	0.82	0.66	0.18	0.82	0.59	0.40	0.40	0.17	0.27
Control Delay	123.9	23.5	7.4	111.4	13.2	46.2	46.3	13.3	24.7
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	123.9	23.5	7.4	111.4	13.2	46.2	46.3	13.3	24.7
Queue Length 50th (ft)	33	263	11	35	59	49	49	0	16
Queue Length 95th (ft)	#104	#908	84	m#83	#708	81	81	24	40
Internal Link Dist (ft)		306			840		290		465
Turn Bay Length (ft)	175		200	100		50		100	
Base Capacity (vph)	60	1056	944	60	2001	376	379	379	468
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.82	0.66	0.18	0.82	0.59	0.19	0.19	0.09	0.11

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

9: Diamond Springs Pkwy & Diamond Rd. (SR-49)

AM Peak

Lane Group	EBL	EBR	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	173	579	807	188	212	459
v/c Ratio	0.65	0.80	0.52	0.15	0.66	0.71
Control Delay	32.3	21.0	21.5	4.8	47.3	9.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	32.3	21.0	21.5	4.8	47.3	9.8
Queue Length 50th (ft)	111	192	169	28	134	0
Queue Length 95th (ft)	m13	501	#339	71	184	82
Internal Link Dist (ft)	840			167	281	
Turn Bay Length (ft)	350		350			
Base Capacity (vph)	407	794	1545	1223	493	738
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.43	0.73	0.52	0.15	0.43	0.62

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.

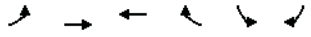
13: Pleasant Valley Rd. (SR-49) & Diamond Rd. (SR-49)

AM Peak

Lane Group	EBL	EBT	WBL	WBT	WBR	NBT	NBR	SBL	SBT
Lane Group Flow (vph)	92	200	28	317	464	112	56	627	167
v/c Ratio	0.58	0.21	0.28	0.70	0.44	0.56	0.14	0.72	0.34
Control Delay	46.6	16.6	41.8	34.2	2.1	46.0	8.8	28.0	12.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	46.6	16.6	41.8	34.2	2.1	46.0	8.8	28.0	12.0
Queue Length 50th (ft)	40	28	12	124	0	49	0	129	23
Queue Length 95th (ft)	88	57	39	#262	32	#133	28	200	73
Internal Link Dist (ft)		219		338		844			640
Turn Bay Length (ft)	180		105		180		75	525	
Base Capacity (vph)	527	1697	173	545	1158	203	455	1161	629
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.17	0.12	0.16	0.58	0.40	0.55	0.12	0.54	0.27

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.



Lane Group	EBL	EBT	WBT	WBR	SBL	SBR
Lane Group Flow (vph)	294	299	258	121	237	164
v/c Ratio	0.60	0.31	0.57	0.12	0.44	0.21
Control Delay	28.8	7.6	17.5	1.9	14.9	2.4
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	28.8	7.6	17.5	1.9	14.9	2.4
Queue Length 50th (ft)	28	32	44	5	35	0
Queue Length 95th (ft)	#134	99	115	11	121	25
Internal Link Dist (ft)		1271	1500		834	
Turn Bay Length (ft)	135			150		165
Base Capacity (vph)	486	1387	1133	1268	965	775
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.60	0.22	0.23	0.10	0.25	0.21

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	12	996	379	293	979	15	516	11	185	3	11	17
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Lane Util. Factor	1.00	0.95	1.00	1.00	0.95	1.00	0.97	1.00		1.00	1.00	
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	0.86		1.00	0.91	
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1583	3167	1417	1583	3167	1417	2984	1390		1583	1513	
Flt Permitted	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (perm)	1583	3167	1417	1583	3167	1417	2984	1390		1583	1513	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	13	1107	421	326	1088	17	573	12	206	3	12	19
RTOR Reduction (vph)	0	0	190	0	0	2	0	151	0	0	17	0
Lane Group Flow (vph)	13	1107	231	326	1088	15	573	67	0	3	14	0
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	5%	5%	5%	2%	2%	2%
Turn Type	Prot		pm+ov	Prot		Perm	Prot			Prot		
Protected Phases	5	2	7	1	6		7	4		3	8	
Permitted Phases			2			6						
Actuated Green, G (s)	1.3	34.2	50.5	16.3	49.2	49.2	16.3	24.6		1.0	9.3	
Effective Green, g (s)	1.3	34.2	50.5	16.3	49.2	49.2	16.3	24.6		1.0	9.3	
Actuated g/C Ratio	0.01	0.37	0.55	0.18	0.53	0.53	0.18	0.27		0.01	0.10	
Clearance Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	22	1176	839	280	1692	757	528	371		17	153	
v/s Ratio Prot	0.01	c0.35	0.05	c0.21	0.34		c0.19	c0.05		0.00	0.01	
v/s Ratio Perm			0.11			0.01						
v/c Ratio	0.59	0.94	0.28	1.16	0.64	0.02	1.09	0.18		0.18	0.09	
Uniform Delay, d1	45.1	28.0	11.1	37.9	15.2	10.1	37.9	26.0		45.1	37.6	
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00		1.00	1.00	
Incremental Delay, d2	36.0	14.4	0.2	105.8	0.8	0.0	64.3	0.2		4.9	0.3	
Delay (s)	81.1	42.4	11.2	143.7	16.1	10.1	102.2	26.2		50.1	37.8	
Level of Service	F	D	B	F	B	B	F	C		D	D	
Approach Delay (s)		34.2			45.1			81.2			38.9	
Approach LOS		C			D			F			D	

Intersection Summary				
HCM Average Control Delay	48.1	HCM Level of Service		D
HCM Volume to Capacity ratio	0.89			
Actuated Cycle Length (s)	92.1	Sum of lost time (s)		12.0
Intersection Capacity Utilization	82.0%	ICU Level of Service		E
Analysis Period (min)	15			

c Critical Lane Group

Movement	EBU	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT
Lane Configurations												
Volume (vph)	32	44	681	326	155	720	17	485	10	105	24	3
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Lane Util. Factor		1.00	1.00	1.00	1.00	0.95		0.95	0.95	1.00		1.00
Frt		1.00	1.00	0.85	1.00	1.00		1.00	1.00	0.85		0.93
Flt Protected		0.95	1.00	1.00	0.95	1.00		0.95	0.95	1.00		0.98
Satd. Flow (prot)		1577	1667	1417	1583	3156		1461	1468	1376		1475
Flt Permitted		0.95	1.00	1.00	0.95	1.00		0.95	0.95	1.00		0.98
Satd. Flow (perm)		1577	1667	1417	1583	3156		1461	1468	1376		1475
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	36	49	757	362	172	800	19	539	11	117	27	3
RTOR Reduction (vph)	0	0	0	112	0	1	0	0	0	62	0	28
Lane Group Flow (vph)	0	85	757	250	172	818	0	275	275	55	0	33
Heavy Vehicles (%)	3%	2%	2%	2%	2%	2%	2%	5%	5%	5%	5%	5%
Turn Type	Prot	Prot		Perm	Prot			Split		Perm	Split	
Protected Phases	7	7	4		3	8		2	2		6	6
Permitted Phases				4						2		
Actuated Green, G (s)		19.8	63.0	63.0	9.0	52.2		25.8	25.8	25.8		11.2
Effective Green, g (s)		19.8	63.0	63.0	9.0	52.2		25.8	25.8	25.8		11.2
Actuated g/C Ratio		0.16	0.50	0.50	0.07	0.42		0.21	0.21	0.21		0.09
Clearance Time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Vehicle Extension (s)		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0		3.0
Lane Grp Cap (vph)		250	840	714	114	1318		302	303	284		132
v/s Ratio Prot		0.05	c0.45		c0.11	0.26		c0.19	0.19			c0.02
v/s Ratio Perm				0.18						0.04		
v/c Ratio		0.34	0.90	0.35	1.51	0.62		0.91	0.91	0.19		0.25
Uniform Delay, d1		46.8	28.2	18.7	58.0	28.6		48.5	48.4	41.0		53.0
Progression Factor		1.00	1.00	1.00	0.98	0.49		1.00	1.00	1.00		1.00
Incremental Delay, d2		0.8	14.7	1.4	264.1	1.9		29.8	28.9	0.3		1.0
Delay (s)		47.6	42.9	20.0	321.1	15.8		78.3	77.3	41.3		54.0
Level of Service		D	D	C	F	B		E	E	D		D
Approach Delay (s)			36.3			68.8			71.4			54.0
Approach LOS			D			E			E			D

Intersection Summary			
HCM Average Control Delay	55.7	HCM Level of Service	E
HCM Volume to Capacity ratio	0.89		
Actuated Cycle Length (s)	125.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	81.6%	ICU Level of Service	D
Analysis Period (min)	15		

c Critical Lane Group

Movement	SBR
Lane Configurations	
Volume (vph)	28
Ideal Flow (vphpl)	1700
Total Lost time (s)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Peak-hour factor, PHF	0.90
Adj. Flow (vph)	31
RTOR Reduction (vph)	0
Lane Group Flow (vph)	0
Heavy Vehicles (%)	5%
Turn Type	
Protected Phases	
Permitted Phases	
Actuated Green, G (s)	
Effective Green, g (s)	
Actuated g/C Ratio	
Clearance Time (s)	
Vehicle Extension (s)	
Lane Grp Cap (vph)	
v/s Ratio Prot	
v/s Ratio Perm	
v/c Ratio	
Uniform Delay, d1	
Progression Factor	
Incremental Delay, d2	
Delay (s)	
Level of Service	
Approach Delay (s)	
Approach LOS	

Intersection Summary

Movement	EBL	EBR	NBU	NBL	NBT	SBT	SBR
Lane Configurations							
Volume (vph)	210	600	41	530	214	268	362
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00		0.97	1.00	1.00	1.00
Frt	1.00	0.85		1.00	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (prot)	1583	1417		2984	1619	1619	1376
Flt Permitted	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (perm)	1583	1417		2984	1619	1619	1376
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	233	667	46	589	238	298	402
RTOR Reduction (vph)	0	457	0	0	0	0	312
Lane Group Flow (vph)	233	210	0	635	238	298	90
Heavy Vehicles (%)	2%	2%	5%	5%	5%	5%	5%
Turn Type		Perm	Prot	Prot			Perm
Protected Phases	4		5	5	2	6	
Permitted Phases		4					6
Actuated Green, G (s)	27.1	27.1		58.0	89.9	27.9	27.9
Effective Green, g (s)	27.1	27.1		58.0	89.9	27.9	27.9
Actuated g/C Ratio	0.22	0.22		0.46	0.72	0.22	0.22
Clearance Time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	343	307		1385	1164	361	307
v/s Ratio Prot	0.15			c0.21	0.15	c0.18	
v/s Ratio Perm		c0.15					0.07
v/c Ratio	0.68	0.68		0.46	0.20	0.83	0.29
Uniform Delay, d1	45.0	45.0		22.8	5.8	46.2	40.3
Progression Factor	0.57	2.62		1.00	1.00	1.00	1.00
Incremental Delay, d2	3.1	3.6		1.1	0.1	14.2	0.5
Delay (s)	28.9	121.6		23.9	5.9	60.5	40.9
Level of Service	C	F		C	A	E	D
Approach Delay (s)	97.6				19.0	49.2	
Approach LOS	F				B	D	

Intersection Summary				
HCM Average Control Delay	56.1	HCM Level of Service		E
HCM Volume to Capacity ratio	0.60			
Actuated Cycle Length (s)	125.0	Sum of lost time (s)		12.0
Intersection Capacity Utilization	85.5%	ICU Level of Service		E
Analysis Period (min)	15			

c Critical Lane Group

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	77	0	0	56	42	729	34	24	864	66
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	86	0	0	62	47	810	38	27	960	73
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								None			None	
Median storage veh)												
Upstream signal (ft)											690	
pX, platoon unblocked	0.85	0.85	0.85	0.85	0.85		0.85					
vC, conflicting volume	2016	1991	997	2021	2009	829	1033			848		
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	2108	2080	906	2115	2101	829	949			848		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)												
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	69	100	100	83	92			97		
cM capacity (veh/h)	24	40	280	20	38	366	603			777		

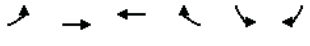
Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	86	62	47	848	27	1033
Volume Left	0	0	47	0	27	0
Volume Right	86	62	0	38	0	73
cSH	280	366	603	1700	777	1700
Volume to Capacity	0.31	0.17	0.08	0.50	0.03	0.61
Queue Length 95th (ft)	31	15	6	0	3	0
Control Delay (s)	23.4	16.8	11.5	0.0	9.8	0.0
Lane LOS	C	C	B		A	
Approach Delay (s)	23.4	16.8	0.6		0.2	
Approach LOS	C	C				

Intersection Summary				
Average Delay	1.8			
Intersection Capacity Utilization	67.3%	ICU Level of Service		C
Analysis Period (min)	15			

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	211	373	66	21	238	378	38	68	47	842	95	176
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00		1.00	1.00	0.97	1.00	
Frt	1.00	0.98		1.00	1.00	0.85		1.00	0.85	1.00	0.90	
Flt Protected	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (prot)	1538	3007		1583	1667	1417		1638	1417	2984	1461	
Flt Permitted	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (perm)	1538	3007		1583	1667	1417		1638	1417	2984	1461	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	234	414	73	23	264	420	42	76	52	936	106	196
RTOR Reduction (vph)	0	17	0	0	0	152	0	0	45	0	69	0
Lane Group Flow (vph)	234	470	0	23	264	268	0	118	7	936	233	0
Heavy Vehicles (%)	5%	5%	5%	2%	2%	2%	2%	2%	2%	5%	5%	5%
Turn Type	Prot			Prot		pm+ov	Split		pm+ov	Split		
Protected Phases	5	2		1	6	4	8	8	1	4	4	
Permitted Phases						6			8			
Actuated Green, G (s)	14.7	29.1		3.4	17.8	43.1		8.1	11.5	25.3	25.3	
Effective Green, g (s)	14.7	29.1		3.4	17.8	43.1		8.1	11.5	25.3	25.3	
Actuated g/C Ratio	0.18	0.36		0.04	0.22	0.53		0.10	0.14	0.31	0.31	
Clearance Time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Vehicle Extension (s)	0.2	3.2		0.2	3.2	3.0		3.0	0.2	3.0	3.0	
Lane Grp Cap (vph)	278	1075		66	365	750		163	200	927	454	
v/s Ratio Prot	c0.15	0.16		0.01	c0.16	0.11		c0.07	0.00	c0.31	0.16	
v/s Ratio Perm						0.08			0.00			
v/c Ratio	0.84	0.44		0.35	0.72	0.36		0.72	0.04	1.01	0.51	
Uniform Delay, d1	32.2	19.9		37.9	29.5	11.1		35.6	30.2	28.1	23.0	
Progression Factor	1.00	1.00		1.00	1.00	1.00		1.00	1.00	1.00	1.00	
Incremental Delay, d2	19.3	0.3		1.2	7.0	0.3		14.7	0.0	32.0	1.0	
Delay (s)	51.5	20.2		39.1	36.5	11.4		50.3	30.2	60.0	24.0	
Level of Service	D	C		D	D	B		D	C	E	C	
Approach Delay (s)		30.4			21.7			44.1			51.2	
Approach LOS		C			C			D			D	

Intersection Summary				
HCM Average Control Delay	38.1	HCM Level of Service	D	
HCM Volume to Capacity ratio	0.86			
Actuated Cycle Length (s)	81.4	Sum of lost time (s)	15.5	
Intersection Capacity Utilization	74.0%	ICU Level of Service	D	
Analysis Period (min)	15			

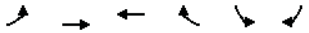
c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (vph)	461	450	203	122	507	393
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Lane Util. Factor	0.97	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	1.00	0.85	1.00	0.85
Flt Protected	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (prot)	2984	1619	1619	1376	1583	1417
Flt Permitted	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (perm)	2984	1619	1619	1376	1583	1417
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	512	500	226	136	563	437
RTOR Reduction (vph)	0	0	0	6	0	155
Lane Group Flow (vph)	512	500	226	130	563	282
Heavy Vehicles (%)	5%	5%	5%	5%	2%	2%
Turn Type	Prot			pm+ov		pm+ov
Protected Phases	5	2	6	4	4	5
Permitted Phases				6		4
Actuated Green, G (s)	13.4	29.1	12.7	40.5	27.8	41.2
Effective Green, g (s)	13.4	29.1	12.7	40.5	27.8	41.2
Actuated g/C Ratio	0.21	0.45	0.20	0.63	0.43	0.64
Clearance Time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Vehicle Extension (s)	0.2	0.2	0.2	3.5	3.5	0.2
Lane Grp Cap (vph)	620	730	319	864	682	905
v/s Ratio Prot	c0.17	c0.31	0.14	0.07	c0.36	0.06
v/s Ratio Perm				0.03		0.13
v/c Ratio	0.83	0.68	0.71	0.15	0.83	0.31
Uniform Delay, d1	24.4	14.1	24.2	4.9	16.2	5.3
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	8.4	2.1	5.8	0.1	8.3	0.1
Delay (s)	32.8	16.2	30.0	5.0	24.5	5.3
Level of Service	C	B	C	A	C	A
Approach Delay (s)		24.6	20.6		16.1	
Approach LOS		C	C		B	

Intersection Summary				
HCM Average Control Delay	20.4	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.77			
Actuated Cycle Length (s)	64.5	Sum of lost time (s)	6.5	
Intersection Capacity Utilization	68.1%	ICU Level of Service	C	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	116	422	544	61	38	147
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	129	469	604	68	42	163
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	672				1365	638
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	672				1365	638
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	86				70	66
cM capacity (veh/h)	904				139	476

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	598	672	206
Volume Left	129	0	42
Volume Right	0	68	163
cSH	904	1700	318
Volume to Capacity	0.14	0.40	0.65
Queue Length 95th (ft)	12	0	105
Control Delay (s)	3.6	0.0	34.8
Lane LOS	A		D
Approach Delay (s)	3.6	0.0	34.8
Approach LOS			D

Intersection Summary			
Average Delay		6.3	
Intersection Capacity Utilization		90.6%	ICU Level of Service E
Analysis Period (min)		15	

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	60	32	22	631	938	34
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	67	36	24	701	1042	38
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)					1251	
pX, platoon unblocked						
vC, conflicting volume	1811	1061	1080			
vC1, stage 1 conf vol	1061					
vC2, stage 2 conf vol	750					
vCu, unblocked vol	1811	1061	1080			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	75	87	96			
cM capacity (veh/h)	268	268	635			

Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	102	24	701	1080
Volume Left	67	24	0	0
Volume Right	36	0	0	38
cSH	268	635	1700	1700
Volume to Capacity	0.38	0.04	0.41	0.64
Queue Length 95th (ft)	43	3	0	0
Control Delay (s)	26.4	10.9	0.0	0.0
Lane LOS	D	B		
Approach Delay (s)	26.4	0.4		0.0
Approach LOS	D			

Intersection Summary			
Average Delay		1.6	
Intersection Capacity Utilization		70.0%	ICU Level of Service C
Analysis Period (min)		15	

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	109	40	16	819	989	88
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	121	44	18	910	1099	98
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)				914		
pX, platoon unblocked						
vC, conflicting volume	2093	1148	1197			
vC1, stage 1 conf vol	1148					
vC2, stage 2 conf vol	946					
vCu, unblocked vol	2093	1148	1197			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	48	82	97			
cM capacity (veh/h)	232	242	573			

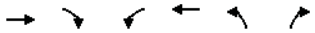
Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	166	18	910	1197
Volume Left	121	18	0	0
Volume Right	44	0	0	98
cSH	235	573	1700	1700
Volume to Capacity	0.70	0.03	0.54	0.70
Queue Length 95th (ft)	116	2	0	0
Control Delay (s)	50.2	11.5	0.0	0.0
Lane LOS	F	B		
Approach Delay (s)	50.2	0.2		0.0
Approach LOS	F			

Intersection Summary				
Average Delay	3.7			
Intersection Capacity Utilization	80.3%	ICU Level of Service		D
Analysis Period (min)	15			

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	9	52	3	198	0	542	115	102	699	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	10	58	3	220	0	602	128	113	777	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	1827	1733	777	1679	1669	666	777			730		
vC1, stage 1 conf vol	1003	1003		666	666							
vC2, stage 2 conf vol	824	730		1013	1003							
vCu, unblocked vol	1827	1733	777	1679	1669	666	777			730		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	97	73	99	52	100			87		
cM capacity (veh/h)	71	214	392	216	243	459	826			874		

Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	10	281	0	730	113	777
Volume Left	0	58	0	0	113	0
Volume Right	10	220	0	128	0	0
cSH	392	370	1700	1700	874	1700
Volume to Capacity	0.03	0.76	0.00	0.43	0.13	0.46
Queue Length 95th (ft)	2	153	0	0	11	0
Control Delay (s)	14.4	39.8	0.0	0.0	9.7	0.0
Lane LOS	B	E			A	
Approach Delay (s)	14.4	39.8	0.0		1.2	
Approach LOS	B	E				

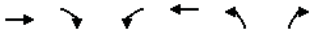
Intersection Summary				
Average Delay	6.5			
Intersection Capacity Utilization	79.7%	ICU Level of Service		D
Analysis Period (min)	15			



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	1159	53	0	1265	0	34
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1288	59	0	1406	0	38
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				679		
pX, platoon unblocked					0.81	
vC, conflicting volume			1347		1991	1288
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1347		1761	1288
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	76
cM capacity (veh/h)			507		62	155

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1
Volume Total	1288	59	703	703	38
Volume Left	0	0	0	0	0
Volume Right	0	59	0	0	38
cSH	1700	1700	1700	1700	155
Volume to Capacity	0.76	0.03	0.41	0.41	0.24
Queue Length 95th (ft)	0	0	0	0	23
Control Delay (s)	0.0	0.0	0.0	0.0	35.6
Lane LOS					E
Approach Delay (s)	0.0		0.0		35.6
Approach LOS					E

Intersection Summary				
Average Delay	0.5			
Intersection Capacity Utilization	78.2%	ICU Level of Service		D
Analysis Period (min)	15			



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	1083	110	0	1265	0	0
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1203	122	0	1406	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				386		
pX, platoon unblocked					0.81	
vC, conflicting volume			1326		1906	1203
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1326		1644	1203
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	100
cM capacity (veh/h)			517		73	176

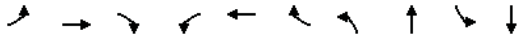
Direction, Lane #	EB 1	EB 2	WB 1	WB 2
Volume Total	1203	122	703	703
Volume Left	0	0	0	0
Volume Right	0	122	0	0
cSH	1700	1700	1700	1700
Volume to Capacity	0.71	0.07	0.41	0.41
Queue Length 95th (ft)	0	0	0	0
Control Delay (s)	0.0	0.0	0.0	0.0
Lane LOS				
Approach Delay (s)	0.0		0.0	
Approach LOS				

Intersection Summary				
Average Delay	0.0			
Intersection Capacity Utilization	67.0%	ICU Level of Service		C
Analysis Period (min)	15			

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	0	112	0	785	842	67
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	124	0	872	936	74
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				None	None	
Median storage veh)						
Upstream signal (ft)					247	
pX, platoon unblocked	0.83	0.83	0.83			
vC, conflicting volume	1226	936	1010			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1171	822	911			
tC, single (s)	6.8	6.9	4.2			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	53	100			
cM capacity (veh/h)	154	264	603			

Direction, Lane #	EB 1	NB 1	NB 2	NB 3	SB 1	SB 2
Volume Total	124	291	291	291	936	74
Volume Left	0	0	0	0	0	0
Volume Right	124	0	0	0	0	74
cSH	264	1700	1700	1700	1700	1700
Volume to Capacity	0.47	0.17	0.17	0.17	0.55	0.04
Queue Length 95th (ft)	59	0	0	0	0	0
Control Delay (s)	30.2	0.0	0.0	0.0	0.0	0.0
Lane LOS	D					
Approach Delay (s)	30.2	0.0			0.0	
Approach LOS	D					

Intersection Summary				
Average Delay		1.9		
Intersection Capacity Utilization		63.9%	ICU Level of Service	B
Analysis Period (min)		15		

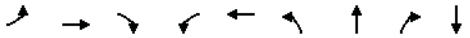


Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	SBL	SBT
Lane Group Flow (vph)	13	1107	421	326	1088	17	573	218	3	31
v/c Ratio	0.11	0.97	0.41	1.08	0.60	0.02	1.00	0.40	0.03	0.16
Control Delay	44.4	51.0	2.9	110.5	17.9	13.8	76.2	6.3	44.3	20.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	44.4	51.0	2.9	110.5	17.9	13.8	76.2	6.3	44.3	20.5
Queue Length 50th (ft)	7	299	0	~195	170	3	~159	4	2	6
Queue Length 95th (ft)	29	#655	55	#487	#552	22	#380	54	12	29
Internal Link Dist (ft)		191			465			499		239
Turn Bay Length (ft)	100		250	325		50	325		50	
Base Capacity (vph)	303	1136	1016	303	1823	818	571	679	303	590
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.04	0.97	0.41	1.08	0.60	0.02	1.00	0.32	0.01	0.05

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.



Lane Group	EBL	EBT	EBR	WBL	WBT	NBL	NBT	NBR	SBT
Lane Group Flow (vph)	85	757	362	172	819	275	275	117	61
v/c Ratio	0.34	0.89	0.43	1.51	0.61	0.91	0.91	0.34	0.35
Control Delay	54.3	43.6	10.9	302.5	16.3	81.7	81.1	18.8	32.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	54.3	43.6	10.9	302.5	16.3	81.7	81.1	18.8	32.1
Queue Length 50th (ft)	62	521	57	~198	262	227	227	26	24
Queue Length 95th (ft)	#145	#1053	192	#348	151	#391	#390	80	55
Internal Link Dist (ft)		306			840		290		465
Turn Bay Length (ft)	175		200	100		50		100	
Base Capacity (vph)	249	850	833	114	1339	316	317	358	400
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.34	0.89	0.43	1.51	0.61	0.87	0.87	0.33	0.15

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Lane Group	EBL	EBR	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	233	667	635	238	298	402
v/c Ratio	0.68	0.87	0.46	0.20	0.82	0.65
Control Delay	30.9	24.7	27.6	7.9	64.5	8.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	30.9	24.7	27.6	7.9	64.5	8.9
Queue Length 50th (ft)	158	388	172	52	229	0
Queue Length 95th (ft)	m159	m540	308	136	323	88
Internal Link Dist (ft)	840			167	281	
Turn Bay Length (ft)	350		350			
Base Capacity (vph)	557	877	1384	1164	428	659
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.42	0.76	0.46	0.20	0.70	0.61

Intersection Summary

m Volume for 95th percentile queue is metered by upstream signal.

13: Pleasant Valley Rd. (SR-49) & Diamond Rd. (SR-49)

PM Peak

Lane Group	EBL	EBT	WBL	WBT	WBR	NBT	NBR	SBL	SBT
Lane Group Flow (vph)	234	487	23	264	420	118	52	936	302
v/c Ratio	0.84	0.44	0.29	0.75	0.44	0.72	0.16	1.00	0.57
Control Delay	57.0	20.0	48.9	45.1	4.2	64.3	10.5	61.3	22.2
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	57.0	20.0	48.9	45.1	4.2	64.3	10.5	61.3	22.2
Queue Length 50th (ft)	117	92	12	126	21	60	0	~270	85
Queue Length 95th (ft)	202	138	37	#232	78	#165	30	#451	193
Internal Link Dist (ft)		219		338		844			640
Turn Bay Length (ft)	180		105		180		75	525	
Base Capacity (vph)	423	1375	139	438	956	164	377	934	526
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.55	0.35	0.17	0.60	0.44	0.72	0.14	1.00	0.57

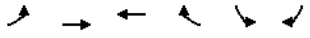
Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

14: Pleasant Valley Rd. (SR-49) & Missouri Flat Rd.

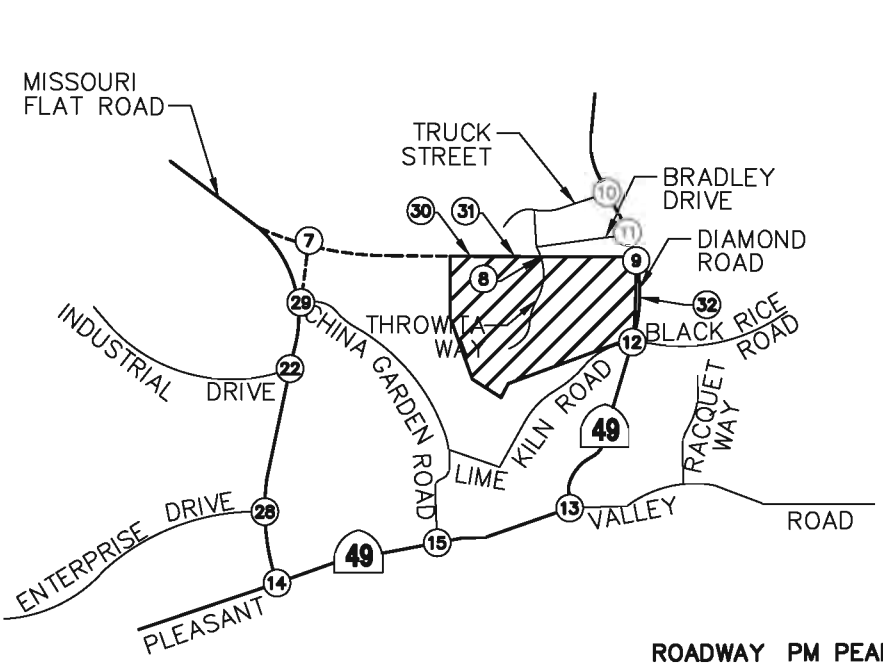
PM Peak



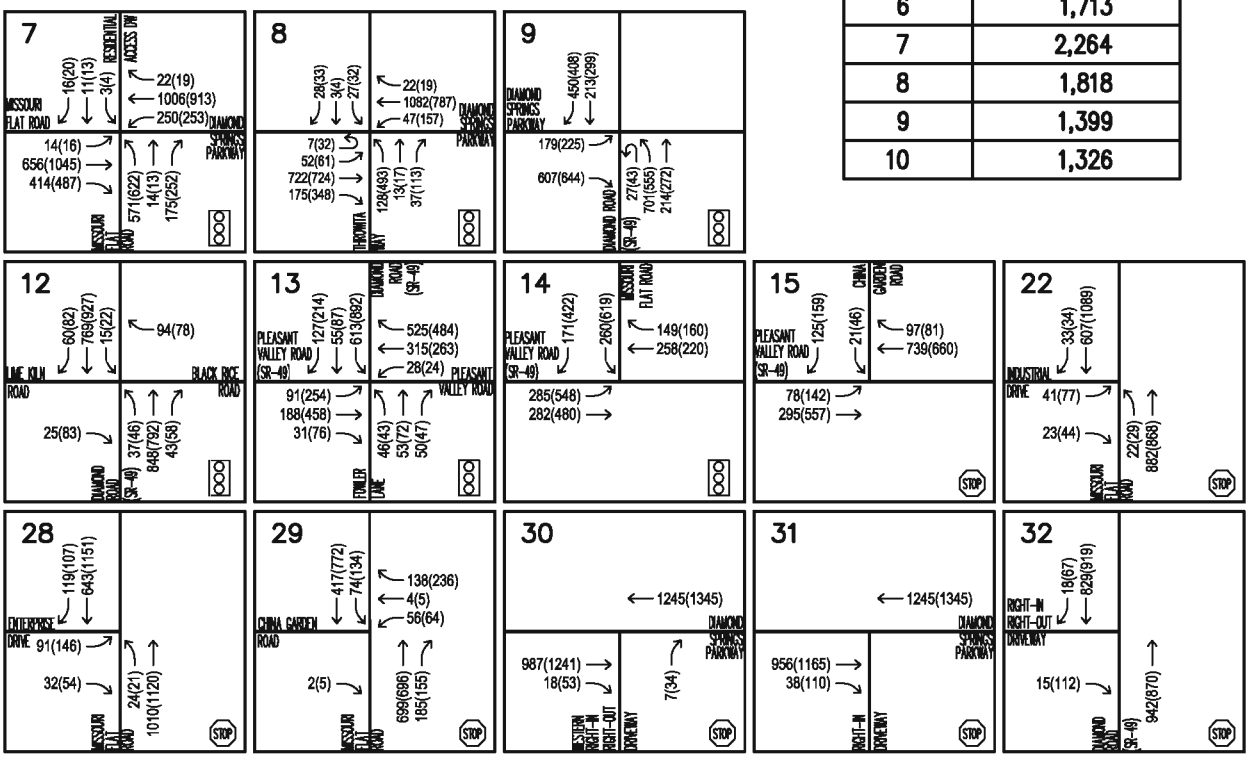
Lane Group	EBL	EBT	WBT	WBR	SBL	SBR
Lane Group Flow (vph)	512	500	226	136	563	437
v/c Ratio	0.83	0.69	0.72	0.14	0.83	0.39
Control Delay	41.6	20.5	37.9	3.0	30.3	1.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	41.6	20.5	37.9	3.0	30.3	1.9
Queue Length 50th (ft)	106	167	90	12	180	1
Queue Length 95th (ft)	#237	265	155	25	#447	35
Internal Link Dist (ft)		1271	1500		834	
Turn Bay Length (ft)	135			150		165
Base Capacity (vph)	617	1053	641	1051	793	1112
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.83	0.47	0.35	0.13	0.71	0.39

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.



ROADWAY SEGMENT	PM PEAK-HOUR VOLUME
2	1,739
3	1,697
5	1,858
6	1,713
7	2,264
8	1,818
9	1,399
10	1,326



Kimley-Horn and Associates, Inc.

ATTACHMENT E

DIAMOND DORADO RETAIL CENTER
EL DORADO COUNTY, CA

CUMULATIVE (2025) PLUS PROPOSED PROJECT PEAK-HOUR TRAFFIC VOLUMES

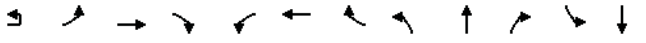
Appendix F:

Cumulative (2025) plus Proposed Project
Analysis Worksheets

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	14	656	414	250	1006	22	571	14	175	3	11	16
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Lane Util. Factor	1.00	0.95	1.00	1.00	0.95	1.00	0.97	1.00		1.00	1.00	
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	0.86		1.00	0.91	
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1583	3167	1417	1583	3167	1417	3013	1408		1583	1517	
Flt Permitted	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (perm)	1583	3167	1417	1583	3167	1417	3013	1408		1583	1517	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	16	729	460	278	1118	24	634	16	194	3	12	18
RTOR Reduction (vph)	0	0	200	0	0	3	0	130	0	0	16	0
Lane Group Flow (vph)	16	729	260	278	1118	21	634	80	0	3	14	0
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	4%	4%	4%	2%	2%	2%
Turn Type	Prot		pm+ov	Prot		Perm	Prot			Prot		
Protected Phases	5	2	7	1	6		7	4		3	8	
Permitted Phases			2			6						
Actuated Green, G (s)	2.7	32.8	59.4	20.6	50.7	50.7	26.6	34.7		1.0	9.1	
Effective Green, g (s)	2.7	32.8	59.4	20.6	50.7	50.7	26.6	34.7		1.0	9.1	
Actuated g/C Ratio	0.03	0.31	0.57	0.20	0.48	0.48	0.25	0.33		0.01	0.09	
Clearance Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	41	988	855	310	1528	684	763	465		15	131	
v/s Ratio Prot	0.01	0.23	0.08	c0.18	c0.35		c0.21	c0.06		0.00	0.01	
v/s Ratio Perm			0.11			0.02						
v/c Ratio	0.39	0.74	0.30	0.90	0.73	0.03	0.83	0.17		0.20	0.10	
Uniform Delay, d1	50.4	32.3	12.0	41.2	21.8	14.3	37.1	25.0		51.7	44.2	
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00		1.00	1.00	
Incremental Delay, d2	6.0	2.9	0.2	26.5	1.8	0.0	7.7	0.2		6.5	0.3	
Delay (s)	56.4	35.2	12.2	67.7	23.6	14.3	44.8	25.2		58.1	44.6	
Level of Service	E	D	B	E	C	B	D	C		E	D	
Approach Delay (s)		26.7			32.1			39.9			45.8	
Approach LOS		C			C			D			D	

Intersection Summary				
HCM Average Control Delay	32.2	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.70			
Actuated Cycle Length (s)	105.1	Sum of lost time (s)	8.0	
Intersection Capacity Utilization	70.6%	ICU Level of Service	C	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBU	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT
Lane Configurations												
Volume (vph)	7	52	722	175	47	1082	22	128	13	37	27	3
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Lane Util. Factor		1.00	1.00	1.00	1.00	0.95		0.95	0.95	1.00		1.00
Frt		1.00	1.00	0.85	1.00	1.00		1.00	1.00	0.85		0.93
Flt Protected		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (prot)		1581	1667	1417	1583	3157		1475	1492	1389		1493
Flt Permitted		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (perm)		1581	1667	1417	1583	3157		1475	1492	1389		1493
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	8	58	802	194	52	1202	24	142	14	41	30	3
RTOR Reduction (vph)	0	0	0	50	0	1	0	0	0	36	0	28
Lane Group Flow (vph)	0	66	802	144	52	1225	0	78	78	5	0	36
Heavy Vehicles (%)	3%	2%	2%	2%	2%	2%	2%	4%	4%	4%	4%	4%
Turn Type	Prot	Prot		Perm	Prot			Split		Perm	Split	
Protected Phases	7	7	4		3	8		2	2		6	6
Permitted Phases				4						2		
Actuated Green, G (s)		4.0	62.0	62.0	4.0	62.0		11.9	11.9	11.9		11.1
Effective Green, g (s)		4.0	62.0	62.0	4.0	62.0		11.9	11.9	11.9		11.1
Actuated g/C Ratio		0.04	0.59	0.59	0.04	0.59		0.11	0.11	0.11		0.11
Clearance Time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Vehicle Extension (s)		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0		3.0
Lane Grp Cap (vph)		60	984	837	60	1864		167	169	157		158
v/s Ratio Prot		c0.04	c0.48		0.03	0.39		c0.05	0.05			c0.02
v/s Ratio Perm				0.10						0.00		
v/c Ratio		1.10	0.82	0.17	0.87	0.66		0.47	0.46	0.03		0.23
Uniform Delay, d1		50.5	17.0	9.8	50.2	14.4		43.6	43.6	41.4		43.0
Progression Factor		1.00	1.00	1.00	0.91	0.73		1.00	1.00	1.00		1.00
Incremental Delay, d2		146.4	7.4	0.4	57.2	1.4		2.1	2.0	0.1		0.7
Delay (s)		196.9	24.4	10.3	102.7	11.8		45.6	45.5	41.5		43.8
Level of Service		F	C	B	F	B		D	D	D		D
Approach Delay (s)			32.5			15.5			44.7			43.8
Approach LOS			C			B			D			D

Intersection Summary				
HCM Average Control Delay	25.4	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.71			
Actuated Cycle Length (s)	105.0	Sum of lost time (s)	16.0	
Intersection Capacity Utilization	66.2%	ICU Level of Service	C	
Analysis Period (min)	15			

c Critical Lane Group

Movement	SBR
Lane Configurations	
Volume (vph)	28
Ideal Flow (vphpl)	1700
Total Lost time (s)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Peak-hour factor, PHF	0.90
Adj. Flow (vph)	31
RTOR Reduction (vph)	0
Lane Group Flow (vph)	0
Heavy Vehicles (%)	4%
Turn Type	
Protected Phases	
Permitted Phases	
Actuated Green, G (s)	
Effective Green, g (s)	
Actuated g/C Ratio	
Clearance Time (s)	
Vehicle Extension (s)	
Lane Grp Cap (vph)	
v/s Ratio Prot	
v/s Ratio Perm	
v/c Ratio	
Uniform Delay, d1	
Progression Factor	
Incremental Delay, d2	
Delay (s)	
Level of Service	
Approach Delay (s)	
Approach LOS	

Intersection Summary

Movement	EBL	EBR	NBU	NBL	NBT	SBT	SBR
Lane Configurations							
Volume (vph)	179	607	27	701	214	213	450
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00		0.97	1.00	1.00	1.00
Frt	1.00	0.85		1.00	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (prot)	1583	1417		3013	1635	1635	1389
Flt Permitted	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (perm)	1583	1417		3013	1635	1635	1389
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	199	674	30	779	238	237	500
RTOR Reduction (vph)	0	491	0	0	0	0	20
Lane Group Flow (vph)	199	183	0	809	238	237	480
Heavy Vehicles (%)	2%	2%	4%	4%	4%	4%	4%
Turn Type		Perm	Prot	Prot			pm+ov
Protected Phases	4		5	5	2	6	4
Permitted Phases		4					6
Actuated Green, G (s)	28.5	28.5		43.1	68.5	21.4	49.9
Effective Green, g (s)	28.5	28.5		43.1	68.5	21.4	49.9
Actuated g/C Ratio	0.27	0.27		0.41	0.65	0.20	0.48
Clearance Time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	430	385		1237	1067	333	713
v/s Ratio Prot	0.13			c0.27	0.15	0.14	c0.18
v/s Ratio Perm		0.13					0.16
v/c Ratio	0.46	0.48		0.65	0.22	0.71	0.67
Uniform Delay, d1	31.9	32.0		24.9	7.4	38.9	21.2
Progression Factor	0.47	4.70		1.00	1.00	1.00	1.00
Incremental Delay, d2	0.5	0.6		2.7	0.1	7.0	2.5
Delay (s)	15.5	150.9		27.6	7.5	45.9	23.8
Level of Service	B	F		C	A	D	C
Approach Delay (s)	120.1				23.1	30.9	
Approach LOS	F				C	C	

Intersection Summary				
HCM Average Control Delay	57.1	HCM Level of Service		E
HCM Volume to Capacity ratio	0.66			
Actuated Cycle Length (s)	105.0	Sum of lost time (s)		8.0
Intersection Capacity Utilization	87.7%	ICU Level of Service		E
Analysis Period (min)	15			

c Critical Lane Group

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	25	0	0	94	37	848	43	15	769	60
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	28	0	0	104	41	942	48	17	854	67
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)						4						
Median type								None			None	
Median storage veh)												
Upstream signal (ft)											690	
pX, platoon unblocked	0.88	0.88	0.88	0.88	0.88		0.88					
vC, conflicting volume	1998	1993	888	1964	2003	966	921			990		
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	2063	2058	808	2024	2068	966	846			990		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)												
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	92	100	100	66	94			98		
cM capacity (veh/h)	22	44	334	32	43	306	692			690		

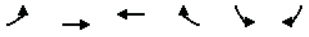
Direction, Lane #	EB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	28	41	990	17	921
Volume Left	0	41	0	17	0
Volume Right	28	0	48	0	67
cSH	334	692	1700	690	1700
Volume to Capacity	0.08	0.06	0.58	0.02	0.54
Queue Length 95th (ft)	7	5	0	2	0
Control Delay (s)	16.7	10.5	0.0	10.3	0.0
Lane LOS	C	B		B	
Approach Delay (s)	16.7	0.4		0.2	
Approach LOS	C				

Intersection Summary				
Average Delay	Err			
Intersection Capacity Utilization	66.0%	ICU Level of Service	C	
Analysis Period (min)	15			

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	91	188	31	28	315	525	46	53	50	613	55	127
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00		1.00	1.00	0.97	1.00	
Frt	1.00	0.98		1.00	1.00	0.85		1.00	0.85	1.00	0.90	
Flt Protected	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (prot)	1553	3041		1583	1667	1417		1629	1417	3013	1463	
Flt Permitted	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (perm)	1553	3041		1583	1667	1417		1629	1417	3013	1463	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	101	209	34	31	350	583	51	59	56	681	61	141
RTOR Reduction (vph)	0	16	0	0	0	246	0	0	47	0	88	0
Lane Group Flow (vph)	101	227	0	31	350	337	0	110	9	681	114	0
Heavy Vehicles (%)	4%	4%	4%	2%	2%	2%	2%	2%	2%	4%	4%	4%
Turn Type	Prot			Prot		pm+ov	Split		pm+ov	Split		
Protected Phases	5	2		1	6	4	8	8	1	4	4	
Permitted Phases						6			8			
Actuated Green, G (s)	6.5	23.0		3.5	20.0	41.3		8.1	11.6	21.3	21.3	
Effective Green, g (s)	6.5	23.0		3.5	20.0	41.3		8.1	11.6	21.3	21.3	
Actuated g/C Ratio	0.09	0.32		0.05	0.28	0.58		0.11	0.16	0.30	0.30	
Clearance Time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Vehicle Extension (s)	0.2	3.2		0.2	3.2	3.0		3.0	0.2	3.0	3.0	
Lane Grp Cap (vph)	141	980		78	467	820		185	230	899	436	
v/s Ratio Prot	c0.07	c0.07		0.02	c0.21	0.12		c0.07	0.00	c0.23	0.08	
v/s Ratio Perm						0.12			0.00			
v/c Ratio	0.72	0.23		0.40	0.75	0.41		0.59	0.04	0.76	0.26	
Uniform Delay, d1	31.6	17.7		32.9	23.4	8.3		30.1	25.2	22.7	19.1	
Progression Factor	1.00	1.00		1.00	1.00	1.00		1.00	1.00	1.00	1.00	
Incremental Delay, d2	13.4	0.1		1.2	6.6	0.3		5.1	0.0	3.7	0.3	
Delay (s)	45.0	17.9		34.1	30.0	8.7		35.1	25.2	26.4	19.4	
Level of Service	D	B		C	C	A		D	C	C	B	
Approach Delay (s)		25.8			17.2			31.8			24.8	
Approach LOS		C			B			C			C	

Intersection Summary				
HCM Average Control Delay	22.3	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.76			
Actuated Cycle Length (s)	71.4	Sum of lost time (s)	19.9	
Intersection Capacity Utilization	63.4%	ICU Level of Service	B	
Analysis Period (min)	15			

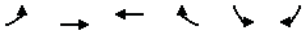
c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (vph)	285	282	258	149	260	171
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Lane Util. Factor	0.97	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	1.00	0.85	1.00	0.85
Flt Protected	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (prot)	3013	1635	1635	1389	1583	1417
Flt Permitted	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (perm)	3013	1635	1635	1389	1583	1417
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	317	313	287	166	289	190
RTOR Reduction (vph)	0	0	0	2	0	103
Lane Group Flow (vph)	317	313	287	164	289	87
Heavy Vehicles (%)	4%	4%	4%	4%	2%	2%
Turn Type	Prot			pm+ov		pm+ov
Protected Phases	5	2	6	4	4	5
Permitted Phases				6		4
Actuated Green, G (s)	5.3	19.4	11.1	24.0	12.9	18.2
Effective Green, g (s)	5.3	19.4	11.1	24.0	12.9	18.2
Actuated g/C Ratio	0.13	0.49	0.28	0.60	0.32	0.46
Clearance Time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Vehicle Extension (s)	0.2	0.2	0.2	3.5	3.5	0.2
Lane Grp Cap (vph)	400	795	455	835	512	646
v/s Ratio Prot	c0.11	0.19	c0.18	0.06	c0.18	0.02
v/s Ratio Perm				0.05		0.04
v/c Ratio	0.79	0.39	0.63	0.20	0.56	0.13
Uniform Delay, d1	16.8	6.5	12.6	3.6	11.2	6.3
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	9.7	0.1	2.1	0.1	1.6	0.0
Delay (s)	26.4	6.6	14.7	3.7	12.7	6.3
Level of Service	C	A	B	A	B	A
Approach Delay (s)		16.6	10.7		10.2	
Approach LOS		B	B		B	

Intersection Summary				
HCM Average Control Delay	12.9	HCM Level of Service	B	
HCM Volume to Capacity ratio	0.63			
Actuated Cycle Length (s)	39.9	Sum of lost time (s)	10.6	
Intersection Capacity Utilization	50.4%	ICU Level of Service	A	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	78	295	739	97	21	125
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	87	328	821	108	23	139
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	929				1376	875
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	929				1376	875
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	88				83	60
cM capacity (veh/h)	728				141	349

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	414	929	162
Volume Left	87	0	23
Volume Right	0	108	139
cSH	728	1700	288
Volume to Capacity	0.12	0.55	0.56
Queue Length 95th (ft)	10	0	81
Control Delay (s)	3.5	0.0	32.6
Lane LOS	A		D
Approach Delay (s)	3.5	0.0	32.6
Approach LOS			D

Intersection Summary			
Average Delay	4.5		
Intersection Capacity Utilization	92.1%	ICU Level of Service	F
Analysis Period (min)	15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	41	23	22	882	607	33
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	46	26	24	980	674	37
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)					1251	
pX, platoon unblocked						
vC, conflicting volume	1722	693	711			
vC1, stage 1 conf vol	693					
vC2, stage 2 conf vol	1029					
vCu, unblocked vol	1722	693	711			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	84	94	97			
cM capacity (veh/h)	282	440	879			

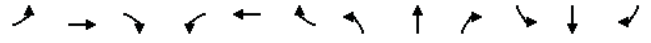
Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	71	24	980	711
Volume Left	46	24	0	0
Volume Right	26	0	0	37
cSH	324	879	1700	1700
Volume to Capacity	0.22	0.03	0.58	0.42
Queue Length 95th (ft)	21	2	0	0
Control Delay (s)	19.2	9.2	0.0	0.0
Lane LOS	C	A		
Approach Delay (s)	19.2	0.2		0.0
Approach LOS	C			

Intersection Summary				
Average Delay		0.9		
Intersection Capacity Utilization		62.7%	ICU Level of Service	B
Analysis Period (min)		15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	91	32	24	1010	643	119
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	101	36	27	1122	714	132
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)				833		
pX, platoon unblocked						
vC, conflicting volume	1956	781	847			
vC1, stage 1 conf vol	781					
vC2, stage 2 conf vol	1176					
vCu, unblocked vol	1956	781	847			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	58	91	97			
cM capacity (veh/h)	241	395	782			

Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	137	27	1122	847
Volume Left	101	27	0	0
Volume Right	36	0	0	132
cSH	268	782	1700	1700
Volume to Capacity	0.51	0.03	0.66	0.50
Queue Length 95th (ft)	67	3	0	0
Control Delay (s)	31.6	9.8	0.0	0.0
Lane LOS	D	A		
Approach Delay (s)	31.6	0.2		0.0
Approach LOS	D			

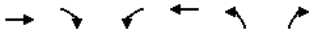
Intersection Summary				
Average Delay		2.1		
Intersection Capacity Utilization		73.9%	ICU Level of Service	D
Analysis Period (min)		15		



Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	2	56	4	138	0	699	185	74	417	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	2	62	4	153	0	777	206	82	463	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	1560	1610	463	1509	1507	879	463			982		
vC1, stage 1 conf vol	628	628		879	879							
vC2, stage 2 conf vol	932	982		630	628							
vCu, unblocked vol	1560	1610	463	1509	1507	879	463			982		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	100	77	98	56	100			88		
cM capacity (veh/h)	90	219	597	271	288	347	1087			703		

Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	2	220	0	982	82	463
Volume Left	0	62	0	0	82	0
Volume Right	2	153	0	206	0	0
cSH	597	320	1700	1700	703	1700
Volume to Capacity	0.00	0.69	0.00	0.58	0.12	0.27
Queue Length 95th (ft)	0	119	0	0	10	0
Control Delay (s)	11.1	37.7	0.0	0.0	10.8	0.0
Lane LOS	B	E			B	
Approach Delay (s)	11.1	37.7	0.0		1.6	
Approach LOS	B	E				

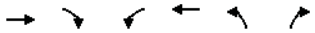
Intersection Summary					
Average Delay	5.3				
Intersection Capacity Utilization	88.1%	ICU Level of Service		E	
Analysis Period (min)	15				



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	987	18	0	1245	0	7
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1097	20	0	1383	0	8
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				686		
pX, platoon unblocked					0.75	
vC, conflicting volume			1117		1788	1097
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1117		1385	1097
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	96
cM capacity (veh/h)			621		101	208

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1
Volume Total	1097	20	692	692	8
Volume Left	0	0	0	0	0
Volume Right	0	20	0	0	8
cSH	1700	1700	1700	1700	208
Volume to Capacity	0.65	0.01	0.41	0.41	0.04
Queue Length 95th (ft)	0	0	0	0	3
Control Delay (s)	0.0	0.0	0.0	0.0	23.0
Lane LOS					C
Approach Delay (s)	0.0		0.0		23.0
Approach LOS					C

Intersection Summary				
Average Delay	0.1			
Intersection Capacity Utilization	68.1%	ICU Level of Service		C
Analysis Period (min)	15			



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	956	38	0	1245	0	0
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1062	42	0	1383	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				391		
pX, platoon unblocked					0.75	
vC, conflicting volume			1104		1754	1062
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1104		1329	1062
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	100
cM capacity (veh/h)			628		109	219

Direction, Lane #	EB 1	EB 2	WB 1	WB 2
Volume Total	1062	42	692	692
Volume Left	0	0	0	0
Volume Right	0	42	0	0
cSH	1700	1700	1700	1700
Volume to Capacity	0.62	0.02	0.41	0.41
Queue Length 95th (ft)	0	0	0	0
Control Delay (s)	0.0	0.0	0.0	0.0
Lane LOS				
Approach Delay (s)	0.0		0.0	
Approach LOS				

Intersection Summary				
Average Delay		0.0		
Intersection Capacity Utilization		59.6%	ICU Level of Service	B
Analysis Period (min)		15		

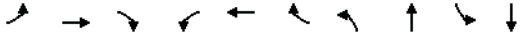
Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	0	15	0	942	829	18
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	17	0	1047	921	20
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				None	None	
Median storage veh)						
Upstream signal (ft)					253	
pX, platoon unblocked	0.87	0.87	0.87			
vC, conflicting volume	1270	921	941			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1236	836	859			
tC, single (s)	6.8	6.9	4.2			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	94	100			
cM capacity (veh/h)	147	271	667			

Direction, Lane #	EB 1	NB 1	NB 2	NB 3	SB 1	SB 2
Volume Total	17	349	349	349	921	20
Volume Left	0	0	0	0	0	0
Volume Right	17	0	0	0	0	20
cSH	271	1700	1700	1700	1700	1700
Volume to Capacity	0.06	0.21	0.21	0.21	0.54	0.01
Queue Length 95th (ft)	5	0	0	0	0	0
Control Delay (s)	19.2	0.0	0.0	0.0	0.0	0.0
Lane LOS	C					
Approach Delay (s)	19.2	0.0			0.0	
Approach LOS	C					

Intersection Summary				
Average Delay		0.2		
Intersection Capacity Utilization		58.8%	ICU Level of Service	B
Analysis Period (min)		15		

7: Missouri Flat Rd. & Diamond Springs Pkwy

AM Peak



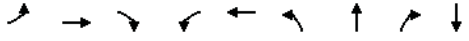
Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	SBL	SBT
Lane Group Flow (vph)	16	729	460	278	1118	24	634	210	3	30
v/c Ratio	0.15	0.76	0.44	0.85	0.69	0.03	0.79	0.34	0.03	0.17
Control Delay	54.0	40.1	2.8	64.9	26.5	19.5	43.3	5.5	54.0	26.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	54.0	40.1	2.8	64.9	26.5	19.5	43.3	5.5	54.0	26.1
Queue Length 50th (ft)	10	225	0	176	259	6	190	6	2	7
Queue Length 95th (ft)	38	#456	53	#449	#697	33	#363	54	13	34
Internal Link Dist (ft)		191			465			499		239
Turn Bay Length (ft)	100		250	325		50	325		50	
Base Capacity (vph)	263	985	1097	328	1616	725	969	683	526	531
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.06	0.74	0.42	0.85	0.69	0.03	0.65	0.31	0.01	0.06

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

8: Diamond Springs Pkwy & Throwita Way

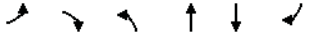
AM Peak



Lane Group	EBL	EBT	EBR	WBL	WBT	NBL	NBT	NBR	SBT
Lane Group Flow (vph)	66	802	194	52	1226	78	78	41	64
v/c Ratio	1.10	0.79	0.21	0.87	0.64	0.42	0.41	0.19	0.32
Control Delay	194.9	28.3	8.7	116.5	17.1	46.7	46.5	12.7	26.1
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	194.9	28.3	8.7	116.5	17.1	46.7	46.5	12.7	26.1
Queue Length 50th (ft)	~50	351	18	35	151	52	52	0	21
Queue Length 95th (ft)	#140	#1069	105	m#68	#769	86	86	27	48
Internal Link Dist (ft)		311			840		290		465
Turn Bay Length (ft)	175			100		50		100	
Base Capacity (vph)	60	1010	906	60	1913	379	384	388	477
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	1.10	0.79	0.21	0.87	0.64	0.21	0.20	0.11	0.13

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.
95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.



Lane Group	EBL	EBR	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	199	674	809	238	237	500
v/c Ratio	0.46	0.77	0.65	0.22	0.71	0.68
Control Delay	17.6	18.2	29.8	8.2	50.0	22.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	17.6	18.2	29.8	8.2	50.0	22.0
Queue Length 50th (ft)	109	256	229	65	151	213
Queue Length 95th (ft)	m13	324	#362	92	205	271
Internal Link Dist (ft)	840			173	281	
Turn Bay Length (ft)	350		350			
Base Capacity (vph)	439	880	1238	1084	498	730
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.45	0.77	0.65	0.22	0.48	0.68

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.
m Volume for 95th percentile queue is metered by upstream signal.

Lane Group	EBL	EBT	WBL	WBT	WBR	NBT	NBR	SBL	SBT
Lane Group Flow (vph)	101	243	31	350	583	110	56	681	202
v/c Ratio	0.62	0.24	0.32	0.75	0.52	0.59	0.15	0.75	0.38
Control Delay	49.4	17.8	43.9	37.4	2.5	49.1	8.9	29.5	11.5
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	49.4	17.8	43.9	37.4	2.5	49.1	8.9	29.5	11.5
Queue Length 50th (ft)	46	38	14	149	0	50	0	145	26
Queue Length 95th (ft)	95	70	42	#308	36	#133	28	221	82
Internal Link Dist (ft)		215		260		844			629
Turn Bay Length (ft)	180		105		180		75	525	
Base Capacity (vph)	499	1608	162	511	1175	190	430	1099	613
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.20	0.15	0.19	0.68	0.50	0.58	0.13	0.62	0.33

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Lane Group	EBL	EBT	WBT	WBR	SBL	SBR
Lane Group Flow (vph)	317	313	287	166	289	190
v/c Ratio	0.80	0.40	0.65	0.17	0.57	0.22
Control Delay	41.6	8.9	20.6	2.0	17.8	2.3
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	41.6	8.9	20.6	2.0	17.8	2.3
Queue Length 50th (ft)	34	38	53	7	48	0
Queue Length 95th (ft)	#145	104	129	14	149	27
Internal Link Dist (ft)		1271	1500		753	
Turn Bay Length (ft)	135			150		165
Base Capacity (vph)	397	1348	1051	1251	834	857
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.80	0.23	0.27	0.13	0.35	0.22

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	16	1045	487	253	913	19	622	13	252	4	13	20
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Lane Util. Factor	1.00	0.95	1.00	1.00	0.95	1.00	0.97	1.00		1.00	1.00	
Frt	1.00	1.00	0.85	1.00	1.00	0.85	1.00	0.86		1.00	0.91	
Flt Protected	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (prot)	1583	3167	1417	1583	3167	1417	3072	1429		1583	1514	
Flt Permitted	0.95	1.00	1.00	0.95	1.00	1.00	0.95	1.00		0.95	1.00	
Satd. Flow (perm)	1583	3167	1417	1583	3167	1417	3072	1429		1583	1514	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	18	1161	541	281	1014	21	691	14	280	4	14	22
RTOR Reduction (vph)	0	0	209	0	0	2	0	184	0	0	20	0
Lane Group Flow (vph)	18	1161	332	281	1014	19	691	110	0	4	16	0
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	2%	2%	2%	2%	2%	2%
Turn Type	Prot		pm+ov	Prot		Perm	Prot			Prot		
Protected Phases	5	2	7	1	6		7	4		3	8	
Permitted Phases			2			6						
Actuated Green, G (s)	2.9	37.6	66.2	16.4	51.1	51.1	28.6	36.9		1.1	9.4	
Effective Green, g (s)	2.9	37.6	66.2	16.4	51.1	51.1	28.6	36.9		1.1	9.4	
Actuated g/C Ratio	0.03	0.35	0.61	0.15	0.47	0.47	0.26	0.34		0.01	0.09	
Clearance Time (s)	4.0	4.0	4.0	4.0	4.0	4.0	4.0	4.0		4.0	4.0	
Vehicle Extension (s)	3.0	3.0	3.0	3.0	3.0	3.0	3.0	3.0		3.0	3.0	
Lane Grp Cap (vph)	43	1103	921	240	1498	670	814	488		16	132	
v/s Ratio Prot	0.01	c0.37	0.10	c0.18	0.32		c0.22	c0.08		0.00	0.01	
v/s Ratio Perm			0.14			0.01						
v/c Ratio	0.42	1.05	0.36	1.17	0.68	0.03	0.85	0.22		0.25	0.12	
Uniform Delay, d1	51.7	35.2	10.4	45.8	22.1	15.2	37.7	25.4		53.0	45.5	
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00	1.00	1.00		1.00	1.00	
Incremental Delay, d2	6.5	42.0	0.2	112.1	1.2	0.0	8.2	0.2		8.1	0.4	
Delay (s)	58.2	77.2	10.6	157.9	23.3	15.2	45.9	25.6		61.1	45.9	
Level of Service	E	E	B	F	C	B	D	C		E	D	
Approach Delay (s)		56.1			51.9			39.8			47.4	
Approach LOS		E			D			D			D	

Intersection Summary					
HCM Average Control Delay	50.7	HCM Level of Service		D	
HCM Volume to Capacity ratio	0.89				
Actuated Cycle Length (s)	108.0	Sum of lost time (s)		12.0	
Intersection Capacity Utilization	84.4%	ICU Level of Service		E	
Analysis Period (min)	15				

c Critical Lane Group

Movement	EBU	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT
Lane Configurations												
Volume (vph)	32	61	724	348	157	787	19	493	17	113	32	4
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Lane Util. Factor		1.00	1.00	1.00	1.00	0.95		0.95	0.95	1.00		1.00
Frt		1.00	1.00	0.85	1.00	1.00		1.00	1.00	0.85		0.94
Flt Protected		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (prot)		1583	1667	1417	1583	3156		1475	1484	1389		1494
Flt Permitted		0.95	1.00	1.00	0.95	1.00		0.95	0.96	1.00		0.98
Satd. Flow (perm)		1583	1667	1417	1583	3156		1475	1484	1389		1494
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	36	68	804	387	174	874	21	548	19	126	36	4
RTOR Reduction (vph)	0	0	0	111	0	1	0	0	0	62	0	31
Lane Group Flow (vph)	0	104	804	276	174	894	0	285	282	64	0	46
Heavy Vehicles (%)	2%	2%	2%	2%	2%	2%	2%	4%	4%	4%	4%	4%
Turn Type	Prot	Prot		Perm	Prot			Split		Perm	Split	
Protected Phases	7	7	4		3	8		2	2		6	6
Permitted Phases				4						2		
Actuated Green, G (s)		12.0	65.6	65.6	10.0	63.6		26.5	26.5	26.5		11.9
Effective Green, g (s)		12.0	65.6	65.6	10.0	63.6		26.5	26.5	26.5		11.9
Actuated g/C Ratio		0.09	0.50	0.50	0.08	0.49		0.20	0.20	0.20		0.09
Clearance Time (s)		4.0	4.0	4.0	4.0	4.0		4.0	4.0	4.0		4.0
Vehicle Extension (s)		3.0	3.0	3.0	3.0	3.0		3.0	3.0	3.0		3.0
Lane Grp Cap (vph)		146	841	715	122	1544		301	303	283		137
v/s Ratio Prot		0.07	c0.48		c0.11	0.28		c0.19	0.19			c0.03
v/s Ratio Perm				0.19						0.05		
v/c Ratio		0.71	0.96	0.39	1.43	0.58		0.95	0.93	0.23		0.34
Uniform Delay, d1		57.3	30.8	19.8	60.0	23.7		51.1	50.8	43.2		55.4
Progression Factor		1.00	1.00	1.00	0.91	0.68		1.00	1.00	1.00		1.00
Incremental Delay, d2		15.1	22.0	1.6	226.4	1.3		37.5	33.9	0.4		1.5
Delay (s)		72.5	52.8	21.4	281.2	17.5		88.6	84.8	43.6		56.8
Level of Service		E	D	C	F	B		F	F	D		E
Approach Delay (s)			45.0			60.4			78.8			56.8
Approach LOS			D			E			E			E

Intersection Summary			
HCM Average Control Delay	58.0	HCM Level of Service	E
HCM Volume to Capacity ratio	0.93		
Actuated Cycle Length (s)	130.0	Sum of lost time (s)	16.0
Intersection Capacity Utilization	84.7%	ICU Level of Service	E
Analysis Period (min)	15		

c Critical Lane Group

Movement	SBR
Lane Configurations	
Volume (vph)	33
Ideal Flow (vphpl)	1700
Total Lost time (s)	
Lane Util. Factor	
Frt	
Flt Protected	
Satd. Flow (prot)	
Flt Permitted	
Satd. Flow (perm)	
Peak-hour factor, PHF	0.90
Adj. Flow (vph)	37
RTOR Reduction (vph)	0
Lane Group Flow (vph)	0
Heavy Vehicles (%)	4%
Turn Type	
Protected Phases	
Permitted Phases	
Actuated Green, G (s)	
Effective Green, g (s)	
Actuated g/C Ratio	
Clearance Time (s)	
Vehicle Extension (s)	
Lane Grp Cap (vph)	
v/s Ratio Prot	
v/s Ratio Perm	
v/c Ratio	
Uniform Delay, d1	
Progression Factor	
Incremental Delay, d2	
Delay (s)	
Level of Service	
Approach Delay (s)	
Approach LOS	

Intersection Summary

Movement	EBL	EBR	NBU	NBL	NBT	SBT	SBR
Lane Configurations							
Volume (vph)	225	644	43	555	272	299	408
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Lane Util. Factor	1.00	1.00		0.97	1.00	1.00	1.00
Frt	1.00	0.85		1.00	1.00	1.00	0.85
Flt Protected	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (prot)	1583	1417		3013	1635	1635	1389
Flt Permitted	0.95	1.00		0.95	1.00	1.00	1.00
Satd. Flow (perm)	1583	1417		3013	1635	1635	1389
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	250	716	48	617	302	332	453
RTOR Reduction (vph)	0	397	0	0	0	0	29
Lane Group Flow (vph)	250	319	0	665	302	332	424
Heavy Vehicles (%)	2%	2%	4%	4%	4%	4%	4%
Turn Type		Perm	Prot	Prot			pm+ov
Protected Phases	4		5	5	2	6	4
Permitted Phases		4					6
Actuated Green, G (s)	37.5	37.5		50.1	84.5	30.4	67.9
Effective Green, g (s)	37.5	37.5		50.1	84.5	30.4	67.9
Actuated g/C Ratio	0.29	0.29		0.39	0.65	0.23	0.52
Clearance Time (s)	4.0	4.0		4.0	4.0	4.0	4.0
Vehicle Extension (s)	3.0	3.0		3.0	3.0	3.0	3.0
Lane Grp Cap (vph)	457	409		1161	1063	382	768
v/s Ratio Prot	0.16			c0.22	0.18	c0.20	0.16
v/s Ratio Perm		c0.23					0.15
v/c Ratio	0.55	0.78		0.57	0.28	0.87	0.55
Uniform Delay, d1	39.1	42.5		31.5	9.8	47.9	20.8
Progression Factor	0.45	1.45		1.00	1.00	1.00	1.00
Incremental Delay, d2	0.7	4.9		2.1	0.1	18.5	0.9
Delay (s)	18.1	66.6		33.6	9.9	66.4	21.7
Level of Service	B	E		C	A	E	C
Approach Delay (s)	54.0				26.2	40.6	
Approach LOS	D				C	D	

Intersection Summary				
HCM Average Control Delay	40.2	HCM Level of Service		D
HCM Volume to Capacity ratio	0.71			
Actuated Cycle Length (s)	130.0	Sum of lost time (s)		12.0
Intersection Capacity Utilization	91.2%	ICU Level of Service		F
Analysis Period (min)	15			

c Critical Lane Group

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	83	0	0	78	46	792	58	22	927	82
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	92	0	0	87	51	880	64	24	1030	91
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)						4						
Median type								None			None	
Median storage veh)												
Upstream signal (ft)											690	
pX, platoon unblocked	0.82	0.82	0.82	0.82	0.82		0.82					
vC, conflicting volume	2150	2171	1076	2186	2184	912	1121			944		
vC1, stage 1 conf vol												
vC2, stage 2 conf vol												
vCu, unblocked vol	2289	2315	985	2333	2331	912	1040			944		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)												
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	62	100	100	74	91			97		
cM capacity (veh/h)	15	27	246	12	26	329	544			718		

Direction, Lane #	EB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	92	51	944	24	1121
Volume Left	0	51	0	24	0
Volume Right	92	0	64	0	91
cSH	246	544	1700	718	1700
Volume to Capacity	0.38	0.09	0.56	0.03	0.66
Queue Length 95th (ft)	41	8	0	3	0
Control Delay (s)	28.2	12.3	0.0	10.2	0.0
Lane LOS	D	B		B	
Approach Delay (s)	28.2	0.6		0.2	
Approach LOS	D				

Intersection Summary				
Average Delay		Err		
Intersection Capacity Utilization		72.5%	ICU Level of Service	C
Analysis Period (min)		15		

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (vph)	254	458	76	24	263	484	43	72	47	892	87	214
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Lane Util. Factor	1.00	0.95		1.00	1.00	1.00		1.00	1.00	0.97	1.00	
Frt	1.00	0.98		1.00	1.00	0.85		1.00	0.85	1.00	0.89	
Flt Protected	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (prot)	1553	3040		1583	1667	1417		1636	1417	3013	1460	
Flt Permitted	0.95	1.00		0.95	1.00	1.00		0.98	1.00	0.95	1.00	
Satd. Flow (perm)	1553	3040		1583	1667	1417		1636	1417	3013	1460	
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	282	509	84	27	292	538	48	80	52	991	97	238
RTOR Reduction (vph)	0	15	0	0	0	127	0	0	45	0	94	0
Lane Group Flow (vph)	282	578	0	27	292	411	0	128	7	991	241	0
Heavy Vehicles (%)	4%	4%	4%	2%	2%	2%	2%	2%	2%	4%	4%	4%
Turn Type	Prot			Prot		pm+ov	Split		pm+ov	Split		
Protected Phases	5	2		1	6	4	8	8	1	4	4	
Permitted Phases						6			8			
Actuated Green, G (s)	17.5	33.0		3.7	19.2	44.4		8.1	11.8	25.2	25.2	
Effective Green, g (s)	17.5	33.0		3.7	19.2	44.4		8.1	11.8	25.2	25.2	
Actuated g/C Ratio	0.20	0.39		0.04	0.22	0.52		0.09	0.14	0.29	0.29	
Clearance Time (s)	3.0	4.4		3.0	4.4	4.1		4.0	3.0	4.1	4.1	
Vehicle Extension (s)	0.2	3.2		0.2	3.2	3.0		3.0	0.2	3.0	3.0	
Lane Grp Cap (vph)	318	1173		69	374	736		155	196	888	430	
v/s Ratio Prot	c0.18	0.19		0.02	c0.18	0.16		c0.08	0.00	c0.33	0.17	
v/s Ratio Perm						0.13			0.00			
v/c Ratio	0.89	0.49		0.39	0.78	0.56		0.83	0.04	1.12	0.56	
Uniform Delay, d1	33.0	19.9		39.8	31.2	13.9		38.0	31.9	30.1	25.5	
Progression Factor	1.00	1.00		1.00	1.00	1.00		1.00	1.00	1.00	1.00	
Incremental Delay, d2	23.7	0.4		1.3	10.2	0.9		28.7	0.0	67.3	1.7	
Delay (s)	56.8	20.3		41.1	41.4	14.8		66.7	32.0	97.5	27.2	
Level of Service	E	C		D	D	B		E	C	F	C	
Approach Delay (s)		32.0			24.7			56.7			79.7	
Approach LOS		C			C			E			E	

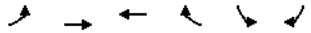
Intersection Summary				
HCM Average Control Delay	51.0	HCM Level of Service	D	
HCM Volume to Capacity ratio	0.93			
Actuated Cycle Length (s)	85.5	Sum of lost time (s)	15.5	
Intersection Capacity Utilization	80.3%	ICU Level of Service	D	
Analysis Period (min)	15			

c Critical Lane Group

Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (vph)	548	480	220	160	619	422
Ideal Flow (vphpl)	1700	1700	1700	1700	1700	1700
Total Lost time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Lane Util. Factor	0.97	1.00	1.00	1.00	1.00	1.00
Frt	1.00	1.00	1.00	0.85	1.00	0.85
Flt Protected	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (prot)	3013	1635	1635	1389	1583	1417
Flt Permitted	0.95	1.00	1.00	1.00	0.95	1.00
Satd. Flow (perm)	3013	1635	1635	1389	1583	1417
Peak-hour factor, PHF	0.90	0.90	0.90	0.90	0.90	0.90
Adj. Flow (vph)	609	533	244	178	688	469
RTOR Reduction (vph)	0	0	0	3	0	110
Lane Group Flow (vph)	609	533	244	175	688	359
Heavy Vehicles (%)	4%	4%	4%	4%	2%	2%
Turn Type	Prot			pm+ov		pm+ov
Protected Phases	5	2	6	4	4	5
Permitted Phases				6		4
Actuated Green, G (s)	16.1	33.9	14.8	53.5	38.7	54.8
Effective Green, g (s)	16.1	33.9	14.8	53.5	38.7	54.8
Actuated g/C Ratio	0.20	0.42	0.18	0.67	0.48	0.68
Clearance Time (s)	3.0	4.1	4.1	3.5	3.5	3.0
Vehicle Extension (s)	0.2	0.2	0.2	3.5	3.5	0.2
Lane Grp Cap (vph)	605	691	302	927	764	968
v/s Ratio Prot	c0.20	c0.33	0.15	0.09	c0.43	0.07
v/s Ratio Perm				0.03		0.18
v/c Ratio	1.01	0.77	0.81	0.19	0.90	0.37
Uniform Delay, d1	32.0	19.8	31.3	5.1	19.0	5.4
Progression Factor	1.00	1.00	1.00	1.00	1.00	1.00
Incremental Delay, d2	38.2	4.9	13.8	0.1	14.0	0.1
Delay (s)	70.3	24.7	45.2	5.2	33.0	5.5
Level of Service	E	C	D	A	C	A
Approach Delay (s)		49.0	28.3		21.8	
Approach LOS		D	C		C	

Intersection Summary				
HCM Average Control Delay	34.2	HCM Level of Service	C	
HCM Volume to Capacity ratio	0.87			
Actuated Cycle Length (s)	80.2	Sum of lost time (s)	6.5	
Intersection Capacity Utilization	78.8%	ICU Level of Service	D	
Analysis Period (min)	15			

c Critical Lane Group



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	142	557	660	81	46	159
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	158	619	733	90	51	177
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	823				1713	778
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	823				1713	778
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	80				36	55
cM capacity (veh/h)	798				80	396

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	777	823	228
Volume Left	158	0	51
Volume Right	0	90	177
cSH	798	1700	210
Volume to Capacity	0.20	0.48	1.09
Queue Length 95th (ft)	18	0	261
Control Delay (s)	4.8	0.0	135.5
Lane LOS	A		F
Approach Delay (s)	4.8	0.0	135.5
Approach LOS			F

Intersection Summary				
Average Delay		18.9		
Intersection Capacity Utilization		109.7%	ICU Level of Service	H
Analysis Period (min)		15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	77	44	29	868	1089	34
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	86	49	32	964	1210	38
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)					1251	
pX, platoon unblocked						
vC, conflicting volume	2258	1229	1248			
vC1, stage 1 conf vol	1229					
vC2, stage 2 conf vol	1029					
vCu, unblocked vol	2258	1229	1248			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	58	77	94			
cM capacity (veh/h)	206	215	558			

Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	134	32	964	1248
Volume Left	86	32	0	0
Volume Right	49	0	0	38
cSH	209	558	1700	1700
Volume to Capacity	0.64	0.06	0.57	0.73
Queue Length 95th (ft)	96	5	0	0
Control Delay (s)	48.9	11.8	0.0	0.0
Lane LOS	E	B		
Approach Delay (s)	48.9	0.4		0.0
Approach LOS	E			

Intersection Summary				
Average Delay		2.9		
Intersection Capacity Utilization		80.8%	ICU Level of Service	D
Analysis Period (min)		15		

Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	146	54	21	1120	1151	107
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	162	60	23	1244	1279	119
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				TWLTL	TWLTL	
Median storage veh)				2	2	
Upstream signal (ft)				833		
pX, platoon unblocked						
vC, conflicting volume	2629	1338	1398			
vC1, stage 1 conf vol	1338					
vC2, stage 2 conf vol	1291					
vCu, unblocked vol	2629	1338	1398			
tC, single (s)	6.4	6.2	4.1			
tC, 2 stage (s)	5.4					
tF (s)	3.5	3.3	2.2			
p0 queue free %	3	68	95			
cM capacity (veh/h)	168	187	489			

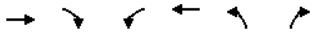
Direction, Lane #	EB 1	NB 1	NB 2	SB 1
Volume Total	222	23	1244	1398
Volume Left	162	23	0	0
Volume Right	60	0	0	119
cSH	172	489	1700	1700
Volume to Capacity	1.29	0.05	0.73	0.82
Queue Length 95th (ft)	319	4	0	0
Control Delay (s)	218.6	12.7	0.0	0.0
Lane LOS	F	B		
Approach Delay (s)	218.6	0.2		0.0
Approach LOS	F			

Intersection Summary				
Average Delay		16.9		
Intersection Capacity Utilization		94.3%	ICU Level of Service	F
Analysis Period (min)		15		

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	5	64	5	236	0	696	155	134	772	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	6	71	6	262	0	773	172	149	858	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)												
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	2194	2101	858	2021	2015	859	858			946		
vC1, stage 1 conf vol	1156	1156		859	859							
vC2, stage 2 conf vol	1038	946		1161	1156							
vCu, unblocked vol	2194	2101	858	2021	2015	859	858			946		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	98	56	97	26	100			79		
cM capacity (veh/h)	7	144	355	162	186	356	783			726		

Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	6	339	0	946	149	858
Volume Left	0	71	0	0	149	0
Volume Right	6	262	0	172	0	0
cSH	355	281	1700	1700	726	1700
Volume to Capacity	0.02	1.21	0.00	0.56	0.21	0.50
Queue Length 95th (ft)	1	386	0	0	19	0
Control Delay (s)	15.3	159.5	0.0	0.0	11.2	0.0
Lane LOS	C	F			B	
Approach Delay (s)	15.3	159.5	0.0		1.7	
Approach LOS	C	F				

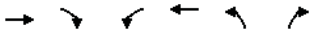
Intersection Summary				
Average Delay		24.3		
Intersection Capacity Utilization		96.9%	ICU Level of Service	F
Analysis Period (min)		15		



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	1241	53	0	1345	0	34
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1379	59	0	1494	0	38
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				686		
pX, platoon unblocked					0.81	
vC, conflicting volume			1438		2126	1379
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1438		1927	1379
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	72
cM capacity (veh/h)			468		48	134

Direction, Lane #	EB 1	EB 2	WB 1	WB 2	NB 1
Volume Total	1379	59	747	747	38
Volume Left	0	0	0	0	0
Volume Right	0	59	0	0	38
cSH	1700	1700	1700	1700	134
Volume to Capacity	0.81	0.03	0.44	0.44	0.28
Queue Length 95th (ft)	0	0	0	0	27
Control Delay (s)	0.0	0.0	0.0	0.0	42.0
Lane LOS					E
Approach Delay (s)	0.0		0.0		42.0
Approach LOS					E

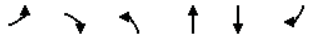
Intersection Summary				
Average Delay	0.5			
Intersection Capacity Utilization	83.0%	ICU Level of Service		E
Analysis Period (min)	15			



Movement	EBT	EBR	WBL	WBT	NBL	NBR
Lane Configurations						
Volume (veh/h)	1165	110	0	1345	0	0
Sign Control	Free			Free	Stop	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	1294	122	0	1494	0	0
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type	None			None		
Median storage veh)						
Upstream signal (ft)				391		
pX, platoon unblocked					0.81	
vC, conflicting volume			1417		2042	1294
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol			1417		1813	1294
tC, single (s)			4.1		6.8	6.9
tC, 2 stage (s)						
tF (s)			2.2		3.5	3.3
p0 queue free %			100		100	100
cM capacity (veh/h)			477		56	153

Direction, Lane #	EB 1	EB 2	WB 1	WB 2
Volume Total	1294	122	747	747
Volume Left	0	0	0	0
Volume Right	0	122	0	0
cSH	1700	1700	1700	1700
Volume to Capacity	0.76	0.07	0.44	0.44
Queue Length 95th (ft)	0	0	0	0
Control Delay (s)	0.0	0.0	0.0	0.0
Lane LOS				
Approach Delay (s)	0.0		0.0	
Approach LOS				

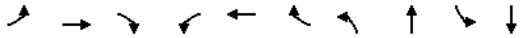
Intersection Summary				
Average Delay	0.0			
Intersection Capacity Utilization	71.9%	ICU Level of Service		C
Analysis Period (min)	15			



Movement	EBL	EBR	NBL	NBT	SBT	SBR
Lane Configurations						
Volume (veh/h)	0	112	0	870	919	67
Sign Control	Stop			Free	Free	
Grade	0%			0%	0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	124	0	967	1021	74
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						
Median type				None	None	
Median storage veh)						
Upstream signal (ft)					253	
pX, platoon unblocked	0.81	0.81	0.81			
vC, conflicting volume	1343	1021	1096			
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	1307	910	1002			
tC, single (s)	6.8	6.9	4.2			
tC, 2 stage (s)						
tF (s)	3.5	3.3	2.2			
p0 queue free %	100	45	100			
cM capacity (veh/h)	123	225	548			

Direction, Lane #	EB 1	NB 1	NB 2	NB 3	SB 1	SB 2
Volume Total	124	322	322	322	1021	74
Volume Left	0	0	0	0	0	0
Volume Right	124	0	0	0	0	74
cSH	225	1700	1700	1700	1700	1700
Volume to Capacity	0.55	0.19	0.19	0.19	0.60	0.04
Queue Length 95th (ft)	75	0	0	0	0	0
Control Delay (s)	39.2	0.0	0.0	0.0	0.0	0.0
Lane LOS	E					
Approach Delay (s)	39.2	0.0			0.0	
Approach LOS	E					

Intersection Summary				
Average Delay		2.2		
Intersection Capacity Utilization		68.5%	ICU Level of Service	C
Analysis Period (min)		15		

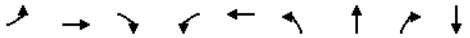


Lane Group	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	SBL	SBT
Lane Group Flow (vph)	18	1161	541	281	1014	21	691	294	4	36
v/c Ratio	0.17	1.07	0.48	1.11	0.64	0.03	0.80	0.42	0.04	0.21
Control Delay	54.8	84.1	2.7	129.9	26.3	20.6	43.6	5.0	54.5	25.8
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	54.8	84.1	2.7	129.9	26.3	20.6	43.6	5.0	54.5	25.8
Queue Length 50th (ft)	12	~468	0	~221	238	5	212	6	3	9
Queue Length 95th (ft)	41	#825	52	#500	#612	31	#405	60	16	38
Internal Link Dist (ft)		191			465			499		239
Turn Bay Length (ft)	100		250	325		50	325		50	
Base Capacity (vph)	254	1080	1156	254	1584	710	987	740	508	501
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.07	1.07	0.47	1.11	0.64	0.03	0.70	0.40	0.01	0.07

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.



Lane Group	EBL	EBT	EBR	WBL	WBT	NBL	NBT	NBR	SBT
Lane Group Flow (vph)	104	804	387	174	895	285	282	126	77
v/c Ratio	0.71	0.94	0.46	1.43	0.57	0.95	0.93	0.37	0.43
Control Delay	83.4	51.9	12.1	265.9	19.3	91.5	88.2	21.6	37.0
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	83.4	51.9	12.1	265.9	19.3	91.5	88.2	21.6	37.0
Queue Length 50th (ft)	87	607	75	~202	302	250	247	34	35
Queue Length 95th (ft)	#175	#1148	221	#353	458	#432	#424	93	72
Internal Link Dist (ft)		311			840		290		465
Turn Bay Length (ft)	175			100				100	
Base Capacity (vph)	146	851	833	122	1563	306	308	350	393
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.71	0.94	0.46	1.43	0.57	0.93	0.92	0.36	0.20

Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Lane Group	EBL	EBR	NBL	NBT	SBT	SBR
Lane Group Flow (vph)	250	716	665	302	332	453
v/c Ratio	0.55	0.89	0.57	0.28	0.87	0.57
Control Delay	19.3	21.3	36.6	11.9	70.0	17.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	19.3	21.3	36.6	11.9	70.0	17.9
Queue Length 50th (ft)	130	464	226	98	266	207
Queue Length 95th (ft)	m36	m157	338	184	#398	232
Internal Link Dist (ft)	840			173	281	
Turn Bay Length (ft)	350		350			
Base Capacity (vph)	572	869	1161	1063	432	793
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	0.44	0.82	0.57	0.28	0.77	0.57

Intersection Summary

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

m Volume for 95th percentile queue is metered by upstream signal.

13: Pleasant Valley Rd. (SR-49) & Diamond Rd. (SR-49)

PM Peak

Lane Group	EBL	EBT	WBL	WBT	WBR	NBT	NBR	SBL	SBT
Lane Group Flow (vph)	282	593	27	292	538	128	52	991	335
v/c Ratio	0.88	0.50	0.33	0.80	0.59	0.82	0.16	1.11	0.63
Control Delay	61.6	20.6	51.7	50.3	9.0	79.5	10.5	95.0	22.9
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	61.6	20.6	51.7	50.3	9.0	79.5	10.5	95.0	22.9
Queue Length 50th (ft)	152	120	15	152	82	72	0	~344	98
Queue Length 95th (ft)	#272	175	42	#279	187	#182	30	#484	203
Internal Link Dist (ft)		215		260		844			629
Turn Bay Length (ft)	180		105		180		75	525	
Base Capacity (vph)	406	1331	132	416	918	156	360	895	528
Starvation Cap Reductn	0	0	0	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0	0	0	0
Reduced v/c Ratio	0.69	0.45	0.20	0.70	0.59	0.82	0.14	1.11	0.63

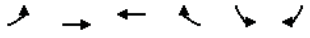
Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

14: Pleasant Valley Rd. (SR-49) & Missouri Flat Rd.

PM Peak



Lane Group	EBL	EBT	WBT	WBR	SBL	SBR
Lane Group Flow (vph)	609	533	244	178	688	469
v/c Ratio	1.01	0.77	0.81	0.18	0.90	0.42
Control Delay	73.7	28.2	51.4	3.8	38.2	2.7
Queue Delay	0.0	0.0	0.0	0.0	0.0	0.0
Total Delay	73.7	28.2	51.4	3.8	38.2	2.7
Queue Length 50th (ft)	~158	220	118	22	297	14
Queue Length 95th (ft)	#310	339	194	40	#620	61
Internal Link Dist (ft)		1271	1500		753	
Turn Bay Length (ft)	135			150		165
Base Capacity (vph)	604	899	510	1000	763	1124
Starvation Cap Reductn	0	0	0	0	0	0
Spillback Cap Reductn	0	0	0	0	0	0
Storage Cap Reductn	0	0	0	0	0	0
Reduced v/c Ratio	1.01	0.59	0.48	0.18	0.90	0.42

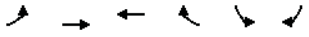
Intersection Summary

~ Volume exceeds capacity, queue is theoretically infinite.
Queue shown is maximum after two cycles.

95th percentile volume exceeds capacity, queue may be longer.
Queue shown is maximum after two cycles.

Appendix G:

Cumulative (2025) plus Proposed Project (Mitigated)
Analysis Worksheets



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	78	295	739	97	21	125
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	87	328	821	108	23	139
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						2
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	929				1376	875
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	929				1376	875
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	88				83	60
cM capacity (veh/h)	728				141	349

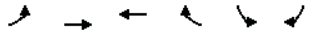
Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	414	929	162
Volume Left	87	0	23
Volume Right	0	108	139
cSH	728	1700	407
Volume to Capacity	0.12	0.55	0.40
Queue Length 95th (ft)	10	0	47
Control Delay (s)	3.5	0.0	24.0
Lane LOS	A		C
Approach Delay (s)	3.5	0.0	24.0
Approach LOS			C

Intersection Summary				
Average Delay		3.5		
Intersection Capacity Utilization		85.6%	ICU Level of Service	E
Analysis Period (min)		15		

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	2	56	4	138	0	699	185	74	417	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	2	62	4	153	0	777	206	82	463	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)						2						
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	1483	1610	463	1509	1507	879	463			982		
vC1, stage 1 conf vol	628	628		879	879							
vC2, stage 2 conf vol	856	982		630	628							
vCu, unblocked vol	1483	1610	463	1509	1507	879	463			982		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	100	77	98	56	100			88		
cM capacity (veh/h)	107	219	597	271	288	347	1087			703		

Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	2	220	0	982	82	463
Volume Left	0	62	0	0	82	0
Volume Right	2	153	0	206	0	0
cSH	597	497	1700	1700	703	1700
Volume to Capacity	0.00	0.44	0.00	0.58	0.12	0.27
Queue Length 95th (ft)	0	56	0	0	10	0
Control Delay (s)	11.1	23.1	0.0	0.0	10.8	0.0
Lane LOS	B	C			B	
Approach Delay (s)	11.1	23.1	0.0		1.6	
Approach LOS	B	C				

Intersection Summary				
Average Delay		3.4		
Intersection Capacity Utilization		78.6%	ICU Level of Service	D
Analysis Period (min)		15		



Movement	EBL	EBT	WBT	WBR	SBL	SBR
Lane Configurations						
Volume (veh/h)	142	557	660	81	46	159
Sign Control		Free	Free		Stop	
Grade		0%	0%		0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	158	619	733	90	51	177
Pedestrians						
Lane Width (ft)						
Walking Speed (ft/s)						
Percent Blockage						
Right turn flare (veh)						2
Median type		None	None			
Median storage veh)						
Upstream signal (ft)						
pX, platoon unblocked						
vC, conflicting volume	823				1713	778
vC1, stage 1 conf vol						
vC2, stage 2 conf vol						
vCu, unblocked vol	823				1713	778
tC, single (s)	4.1				6.4	6.2
tC, 2 stage (s)						
tF (s)	2.2				3.5	3.3
p0 queue free %	80				36	55
cM capacity (veh/h)	798				80	396

Direction, Lane #	EB 1	WB 1	SB 1
Volume Total	777	823	228
Volume Left	158	0	51
Volume Right	0	90	177
cSH	798	1700	307
Volume to Capacity	0.20	0.48	0.74
Queue Length 95th (ft)	18	0	139
Control Delay (s)	4.8	0.0	44.1
Lane LOS	A		E
Approach Delay (s)	4.8	0.0	44.1
Approach LOS			E

Intersection Summary				
Average Delay	7.5			
Intersection Capacity Utilization	99.2%	ICU Level of Service		F
Analysis Period (min)	15			

Movement	EBL	EBT	EBR	WBL	WBT	WBR	NBL	NBT	NBR	SBL	SBT	SBR
Lane Configurations												
Volume (veh/h)	0	0	5	64	5	236	0	696	155	134	772	0
Sign Control		Stop			Stop			Free			Free	
Grade		0%			0%			0%			0%	
Peak Hour Factor	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90	0.90
Hourly flow rate (vph)	0	0	6	71	6	262	0	773	172	149	858	0
Pedestrians												
Lane Width (ft)												
Walking Speed (ft/s)												
Percent Blockage												
Right turn flare (veh)						2						
Median type								TWLTL			None	
Median storage veh)								2				
Upstream signal (ft)											579	
pX, platoon unblocked												
vC, conflicting volume	2063	2101	858	2021	2015	859	858			946		
vC1, stage 1 conf vol	1156	1156		859	859							
vC2, stage 2 conf vol	907	946		1161	1156							
vCu, unblocked vol	2063	2101	858	2021	2015	859	858			946		
tC, single (s)	7.1	6.5	6.2	7.1	6.5	6.2	4.1			4.1		
tC, 2 stage (s)	6.1	5.5		6.1	5.5							
tF (s)	3.5	4.0	3.3	3.5	4.0	3.3	2.2			2.2		
p0 queue free %	100	100	98	56	97	26	100			79		
cM capacity (veh/h)	9	144	355	162	186	356	783			726		

Direction, Lane #	EB 1	WB 1	NB 1	NB 2	SB 1	SB 2
Volume Total	6	339	0	946	149	858
Volume Left	0	71	0	0	149	0
Volume Right	6	262	0	172	0	0
cSH	355	460	1700	1700	726	1700
Volume to Capacity	0.02	0.74	0.00	0.56	0.21	0.50
Queue Length 95th (ft)	1	150	0	0	19	0
Control Delay (s)	15.3	40.2	0.0	0.0	11.2	0.0
Lane LOS	C	E			B	
Approach Delay (s)	15.3	40.2	0.0		1.7	
Approach LOS	C	E				

Intersection Summary				
Average Delay	6.7			
Intersection Capacity Utilization	81.1%	ICU Level of Service		D
Analysis Period (min)	15			

Appendix H:

Signal Warrant Analysis Worksheets

Scenario Report

Scenario:	EPAP+PP AM
Command:	Default Command
Volume:	EPAP+PP AM
Geometry:	Default Geometry
Impact Fee:	Default Impact Fee
Trip Generation:	Default Trip Generation
Trip Distribution:	Default Trip Distribution
Paths:	Default Path
Routes:	Default Route
Configuration:	Default Configuration

Signal Warrant Summary Report

Intersection	Base Met [Del / Vol]	Future Met [Del / Vol]
# 12 Lime Kiln @ SR-49	No / No	??? / ???
# 15 Pleasant Valley Rd. (SR-49) & China	No / No	??? / ???
# 22 Industrial Dr. & Missouri Flat Rd.	No / No	??? / ???
# 28 Enterprise Dr. & Missouri Flat Rd.	No / No	??? / ???
# 29 China Garden Rd. & Missouri Flat Rd	No / No	??? / ???
# 30 Diamond Springs Pkwy & Western DW	No / No	??? / ???
# 31 Diamond Springs Pkwy & Right-in DW	No / No	??? / ???
# 32 Right-in/Right-out DW & Diamond Rd.	No / No	??? / ???

Peak Hour Delay Signal Warrant Report

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	34	828	26	17	667	49	0	0	22	0	0	67
ApproachDel:	xxxxxx			xxxxxx			13.5			17.0		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=22]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1710]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.3]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=67]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1710]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	34	828	26	17	667	49	0	0	22	0	0	67

Major Street Volume: 1621
Minor Approach Volume: 67
Minor Approach Volume Threshold: 118

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	18	0	115	64	229	0	0	588	79
ApproachDel:	xxxxxx			16.8			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.6]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=133]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1093]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	18	0	115	64	229	0	0	588	79

Major Street Volume: 960
Minor Approach Volume: 133
Minor Approach Volume Threshold: 230

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	1	0	0	0	0	0	1	0	0	0	1!	0	0	0	0	0	0	0	0
Initial Vol:	16	679	0	0	505	28	35	0	17	0	0	0
ApproachDel:	xxxxxx			xxxxxx			23.3			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.3]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=52]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1280]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	1	0	0	0	0	0	1	0	0	0	1!	0	0	0	0	0	0	0	0
Initial Vol:	16	679	0	0	505	28	35	0	17	0	0	0

Major Street Volume: 1228
Minor Approach Volume: 52
Minor Approach Volume Threshold: 214

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	18	774	0	0	486	89	67	0	24	0	0	0
ApproachDel:	xxxxxx			xxxxxx			35.8			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.9]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=91]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1458]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	18	774	0	0	486	89	67	0	24	0	0	0

Major Street Volume: 1367
Minor Approach Volume: 91
Minor Approach Volume Threshold: 177

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	1! 0	0
Initial Vol:	0	553	138	56	358	0	0	0	3	45	3	114
ApproachDel:	xxxxxx			xxxxxx			10.2			26.1		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=3]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1270]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=1.2]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=162]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1270]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	1! 0	0
Initial Vol:	0	553	138	56	358	0	0	0	3	45	3	114

Major Street Volume: 1105
Minor Approach Volume: 162
Minor Approach Volume Threshold: 250

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	7	0	0	0	0	856	18	0	1205	0
ApproachDel:	11.3			xxxxxx			xxxxxx			xxxxxx		

Approach[northbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=7]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2086]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	7	0	0	0	0	856	18	0	1205	0

Major Street Volume: 2079
Minor Approach Volume: 7
Minor Approach Volume Threshold: 33 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
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Peak Hour Delay Signal Warrant Report

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	825	38		0	1205	0	
ApproachDel:	xxxxxx				xxxxxx				xxxxxx				xxxxxx			

SIGNAL WARRANT DISCLAIMER
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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	825	38		0	1205	0	

Major Street Volume: 2068
Minor Approach Volume: 0
Minor Approach Volume Threshold: 35 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
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Peak Hour Delay Signal Warrant Report

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0	3	0	0	0	0	0	1	0	0	0
Initial Vol:	0	895	0	0	718	18	0	0	15	0	0	0
ApproachDel:	xxxxxx			xxxxxx			10.7			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=15]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1646]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0	3	0	0	0	0	2	0	1	0	0	0	0	1	0	0	0	0	0
Initial Vol:	0	895	0	0	718	18	0	0	15	0	0	0

Major Street Volume: 1631
Minor Approach Volume: 15
Minor Approach Volume Threshold: 116

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Scenario Report

Scenario:	EPAP+PP PM
Command:	Default Command
Volume:	EPAP+PP PM
Geometry:	Default Geometry
Impact Fee:	Default Impact Fee
Trip Generation:	Default Trip Generation
Trip Distribution:	Default Trip Distribution
Paths:	Default Path
Routes:	Default Route
Configuration:	Default Configuration

Signal Warrant Summary Report

Intersection	Base Met [Del / Vol]	Future Met [Del / Vol]
# 12 Lime Kiln @ SR-49	No / No	??? / ???
# 15 Pleasant Valley Rd. (SR-49) & China	No / Yes	??? / ???
# 22 Industrial Dr. & Missouri Flat Rd.	No / No	??? / ???
# 28 Enterprise Dr. & Missouri Flat Rd.	Yes / Yes	??? / ???
# 29 China Garden Rd. & Missouri Flat Rd	Yes / Yes	??? / ???
# 30 Diamond Springs Pkwy & Western DW	No / No	??? / ???
# 31 Diamond Springs Pkwy & Right-in DW	No / No	??? / ???
# 32 Right-in/Right-out DW & Diamond Rd.	No / Yes	??? / ???

Peak Hour Delay Signal Warrant Report

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	42	729	34	24	864	66	0	0	77	0	0	56
ApproachDel:	xxxxxx			xxxxxx			18.6			15.0		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.4]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=77]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1892]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.2]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=56]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1892]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	42	729	34	24	864	66	0	0	77	0	0	56

Major Street Volume: 1759
Minor Approach Volume: 77
Minor Approach Volume Threshold: 90 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	38	0	147	116	422	0	0	544	61
ApproachDel:	xxxxxx			23.6			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=1.2]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=185]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1328]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	38	0	147	116	422	0	0	544	61

Major Street Volume: 1143
Minor Approach Volume: 185
Minor Approach Volume Threshold: 184

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	22	631	0	0	938	34	60	0	32	0	0	0
ApproachDel:	xxxxxx			xxxxxx			67.4			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=1.7]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=92]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1717]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	22	631	0	0	938	34	60	0	32	0	0	0

Major Street Volume: 1625
Minor Approach Volume: 92
Minor Approach Volume Threshold: 118

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	16	819	0	0	989	88	109	0	40	0	0	0
ApproachDel:	xxxxxx			xxxxxx			370.1			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=15.3]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=149]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2061]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	16	819	0	0	989	88	109	0	40	0	0	0

Major Street Volume: 1912
Minor Approach Volume: 149
Minor Approach Volume Threshold: 62 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	- T	- R	L	- T	- R	L	- T	- R	L	- T	- R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 0	1 0	1	0 0	1 0	0	0 0	0 1	0	0 1!	0 0
Initial Vol:	0	542	115	102	699	0	0	0	9	52	3	198
ApproachDel:	xxxxxx			xxxxxx			13.3			98.1		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=9]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1720]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=6.9]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=253]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1720]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	- T	- R	L	- T	- R	L	- T	- R	L	- T	- R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 0	1 0	1	0 0	1 0	0	0 0	0 1	0	0 1!	0 0
Initial Vol:	0	542	115	102	699	0	0	0	9	52	3	198

Major Street Volume: 1458
Minor Approach Volume: 253
Minor Approach Volume Threshold: 155

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	34	0	0	0	0	1159	53	0	1265	0
ApproachDel:	13.4			xxxxxx			xxxxxx			xxxxxx		

Approach[northbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=34]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2511]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	34	0	0	0	0	1159	53	0	1265	0

Major Street Volume: 2477
Minor Approach Volume: 34
Minor Approach Volume Threshold: -28 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	1083	110		0	1265	0	
ApproachDel:	xxxxxx				xxxxxx				xxxxxx				xxxxxx			

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	1083	110		0	1265	0	

Major Street Volume: 2458
Minor Approach Volume: 0
Minor Approach Volume Threshold: -25 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0	3	0	0	0	0	0	1	0	0	0
Initial Vol:	0	785	0	0	842	67	0	0	112	0	0	0
ApproachDel:	xxxxxx			xxxxxx			12.6			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.4]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=112]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1806]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0	3	0	0	0	0	0	2	0	1	0	0	0	0	1	0	0	0	0	0
Initial Vol:	0	785	0	0	842	67	0	0	112	0	0	0

Major Street Volume: 1694
Minor Approach Volume: 112
Minor Approach Volume Threshold: 103

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Scenario Report

Scenario:	CUM+PP AM
Command:	Default Command
Volume:	CUM+PP AM
Geometry:	Default Geometry
Impact Fee:	Default Impact Fee
Trip Generation:	Default Trip Generation
Trip Distribution:	Default Trip Distribution
Paths:	Default Path
Routes:	Default Route
Configuration:	Default Configuration

Signal Warrant Summary Report

Intersection	Base Met [Del / Vol]	Future Met [Del / Vol]
# 12 Lime Kiln @ SR-49	No / No	??? / ???
# 15 Pleasant Valley Rd. (SR-49) & China	No / No	??? / ???
# 22 Industrial Dr. & Missouri Flat Rd.	No / No	??? / ???
# 28 Enterprise Dr. & Missouri Flat Rd.	Yes / Yes	??? / ???
# 29 China Garden Rd. & Missouri Flat Rd	No / Yes	??? / ???
# 30 Diamond Springs Pkwy & Western DW	No / No	??? / ???
# 31 Diamond Springs Pkwy & Right-in DW	No / No	??? / ???
# 32 Right-in/Right-out DW & Diamond Rd.	No / No	??? / ???

Peak Hour Delay Signal Warrant Report

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Uncontrolled				Uncontrolled				Stop Sign				Stop Sign			
Lanes:	1	0	0	1 0	1	0	0	1 0	0	0	0	0 1	0	0	0	0 1
Initial Vol:	37	848		43	15	769		60	0	0		25	0	0		94
ApproachDel:	xxxxxx				xxxxxx				14.9				18.8			

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=25]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1891]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.5]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=94]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1891]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Uncontrolled				Uncontrolled				Stop Sign				Stop Sign			
Lanes:	1	0	0	1 0	1	0	0	1 0	0	0	0	0 1	0	0	0	0 1
Initial Vol:	37	848		43	15	769		60	0	0		25	0	0		94

Major Street Volume: 1772
Minor Approach Volume: 94
Minor Approach Volume Threshold: 88 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	21	0	125	78	295	0	0	739	97
ApproachDel:	xxxxxx			23.6			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=1.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=146]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1355]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	21	0	125	78	295	0	0	739	97

Major Street Volume: 1209
Minor Approach Volume: 146
Minor Approach Volume Threshold: 169

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	22	882	0	0	607	33	41	0	23	0	0	0
ApproachDel:	xxxxxx			xxxxxx			38.4			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.7]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=64]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1608]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	22	882	0	0	607	33	41	0	23	0	0	0

Major Street Volume: 1544
Minor Approach Volume: 64
Minor Approach Volume Threshold: 135

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	24	1010	0	0	643	119	91	0	32	0	0	0
ApproachDel:	xxxxxx			xxxxxx			172.8			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=5.9]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=123]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1919]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	24	1010	0	0	643	119	91	0	32	0	0	0

Major Street Volume: 1796
Minor Approach Volume: 123
Minor Approach Volume Threshold: 83 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	0	1	0	1	0	0	0	0	1	0	0	1!	0	0
Initial Vol:	0	699	185	74	417	0	0	0	2	56	4	138
ApproachDel:	xxxxxx			xxxxxx			10.6			72.3		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=2]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1575]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=4.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=198]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=1575]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	0	1	0	1	0	0	0	0	1	0	0	1!	0	0
Initial Vol:	0	699	185	74	417	0	0	0	2	56	4	138

Major Street Volume: 1375
Minor Approach Volume: 198
Minor Approach Volume Threshold: 175

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	7	0	0	0	0	987		18	0	1245	0
ApproachDel:	11.9			xxxxxx			xxxxxx			xxxxxx		

Approach[northbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=7]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2257]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	7	0	0	0	0	987		18	0	1245	0

Major Street Volume: 2250
Minor Approach Volume: 7
Minor Approach Volume Threshold: 5 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	956	38		0	1245		0
ApproachDel:	xxxxxx				xxxxxx				xxxxxx				xxxxxx			

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound				South Bound				East Bound				West Bound			
Movement:	L	-	T	- R	L	-	T	- R	L	-	T	- R	L	-	T	- R
Control:	Stop Sign				Stop Sign				Uncontrolled				Uncontrolled			
Lanes:	0	0	0	0 1	0	0	0	0 0	0	0	2	0 1	0	0	2	0 0
Initial Vol:	0	0	0		0	0	0		0	956	38		0	1245		0

Major Street Volume: 2239
Minor Approach Volume: 0
Minor Approach Volume Threshold: 7 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0 3	0 0	0	0 2	0 1	0	0 0	0 1	0	0 0	0 0
Initial Vol:	0	942	0	0	829	18	0	0	15	0	0	0
ApproachDel:	xxxxxx			xxxxxx			11.2			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=15]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1804]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0 3	0 0	0	0 2	0 1	0	0 0	0 1	0	0 0	0 0
Initial Vol:	0	942	0	0	829	18	0	0	15	0	0	0

Major Street Volume: 1789
Minor Approach Volume: 15
Minor Approach Volume Threshold: 84 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
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Scenario Report

Scenario:	CUM+PP PM
Command:	Default Command
Volume:	CUM+PP PM
Geometry:	Default Geometry
Impact Fee:	Default Impact Fee
Trip Generation:	Default Trip Generation
Trip Distribution:	Default Trip Distribution
Paths:	Default Path
Routes:	Default Route
Configuration:	Default Configuration

Signal Warrant Summary Report

Intersection	Base Met [Del / Vol]	Future Met [Del / Vol]
# 12 Lime Kiln @ SR-49	No / No	??? / ???
# 15 Pleasant Valley Rd. (SR-49) & China	No / Yes	??? / ???
# 22 Industrial Dr. & Missouri Flat Rd.	Yes / Yes	??? / ???
# 28 Enterprise Dr. & Missouri Flat Rd.	Yes / Yes	??? / ???
# 29 China Garden Rd. & Missouri Flat Rd	Yes / Yes	??? / ???
# 30 Diamond Springs Pkwy & Western DW	No / No	??? / ???
# 31 Diamond Springs Pkwy & Right-in DW	No / No	??? / ???
# 32 Right-in/Right-out DW & Diamond Rd.	No / Yes	??? / ???

Peak Hour Delay Signal Warrant Report

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	46	792	58	22	927	82	0	0	83	0	0	78
ApproachDel:	xxxxxx			xxxxxx			20.8			17.0		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.5]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=83]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=2088]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.4]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=78]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=2088]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #12 Lime Kiln @ SR-49

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1 0	0	1 0	1 0	0	1 0	0 0	0	1	0 0	0	1
Initial Vol:	46	792	58	22	927	82	0	0	83	0	0	78

Major Street Volume: 1927
Minor Approach Volume: 83
Minor Approach Volume Threshold: 59 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	46	0	159	142	557	0	0	660	81
ApproachDel:	xxxxxx			53.4			xxxxxx			xxxxxx		

Approach[southbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=3.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=205]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1645]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #15 Pleasant Valley Rd. (SR-49) & China Garden Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	1	0	0	0	0
Initial Vol:	0	0	0	46	0	159	142	557	0	0	660	81

Major Street Volume: 1440
Minor Approach Volume: 205
Minor Approach Volume Threshold: 122

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	29	868	0	0	1089	34	77	0	44	0	0	0
ApproachDel:	xxxxxx			xxxxxx			333.1			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=11.2]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=121]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2141]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #22 Industrial Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	29	868	0	0	1089	34	77	0	44	0	0	0

Major Street Volume: 2020
Minor Approach Volume: 121
Minor Approach Volume Threshold: 43 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Delay Signal Warrant Report

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	21	1120	0	0	1151	107	146	0	54	0	0	0
ApproachDel:	xxxxxx			xxxxxx			1554.2			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=86.3]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=200]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2599]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #28 Enterprise Dr. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0 1	0	0	0 0 1	0	0	0 1! 0	0	0	0 0 0	0
Initial Vol:	21	1120	0	0	1151	107	146	0	54	0	0	0

Major Street Volume: 2399
Minor Approach Volume: 200
Minor Approach Volume Threshold: -17 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	0	1	0	1	0	0	0	0	1	0	0	1!	0	0
Initial Vol:	0	696	155	134	772	0	0	0	5	64	5	236
ApproachDel:	xxxxxx			xxxxxx			14.1			467.7		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.0]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=5]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=2067]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

Approach[westbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=39.6]
SUCCEED - Vehicle-hours greater than or equal to 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=305]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=4][total volume=2067]
SUCCEED - Total volume greater than or equal to 800 for intersection with four or more approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #29 China Garden Rd. & Missouri Flat Rd.

Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	1	0	0	1	0	1	0	0	0	0	1	0	0	1!	0	0
Initial Vol:	0	696	155	134	772	0	0	0	5	64	5	236

Major Street Volume: 1757
Minor Approach Volume: 305
Minor Approach Volume Threshold: 91 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	34	0	0	0	0	1241	53	0	1345	0
ApproachDel:	14.0			xxxxxx			xxxxxx			xxxxxx		

Approach[northbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.1]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=34]
FAIL - Approach volume less than 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=2673]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #30 Diamond Springs Pkwy & Western DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	0	0	2	0	1	1	0	2	0	0
Initial Vol:	0	0	34	0	0	0	0	1241	53	0	1345	0

Major Street Volume: 2639
Minor Approach Volume: 34
Minor Approach Volume Threshold: -49 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER

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The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	0	0	0	2	1	0	2	0
Initial Vol:	0	0	0	0	0	0	1165	110	0	1345	0	
ApproachDel:	xxxxxx			xxxxxx			xxxxxx			xxxxxx		

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

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Peak Hour Volume Signal Warrant Report [Urban]

Intersection #31 Diamond Springs Pkwy & Right-in DW

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Stop Sign			Stop Sign			Uncontrolled			Uncontrolled		
Lanes:	0	0	0	0	1	0	0	0	0	0	2	0	1	0	0	2	0	0
Initial Vol:	0	0	0	0	0	0	1165	110	0	1345	0	

Major Street Volume: 2620
Minor Approach Volume: 0
Minor Approach Volume Threshold: -47 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER

This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Delay Signal Warrant Report

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

Base Volume Alternative: Peak Hour Warrant NOT Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0 3	0 0	0	0 2	0 1	0	0 0	0 1	0	0 0	0 0
Initial Vol:	0	870	0	0	919	67	0	0	112	0	0	0
ApproachDel:	xxxxxx			xxxxxx			13.1			xxxxxx		

Approach[eastbound][lanes=1][control=Stop Sign]
Signal Warrant Rule #1: [vehicle-hours=0.4]
FAIL - Vehicle-hours less than 4 for one lane approach.
Signal Warrant Rule #2: [approach volume=112]
SUCCEED - Approach volume greater than or equal to 100 for one lane approach.
Signal Warrant Rule #3: [approach count=3][total volume=1968]
SUCCEED - Total volume greater than or equal to 650 for intersection with less than four approaches.

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.

Peak Hour Volume Signal Warrant Report [Urban]

Intersection #32 Right-in/Right-out DW & Diamond Rd. (SR-49)

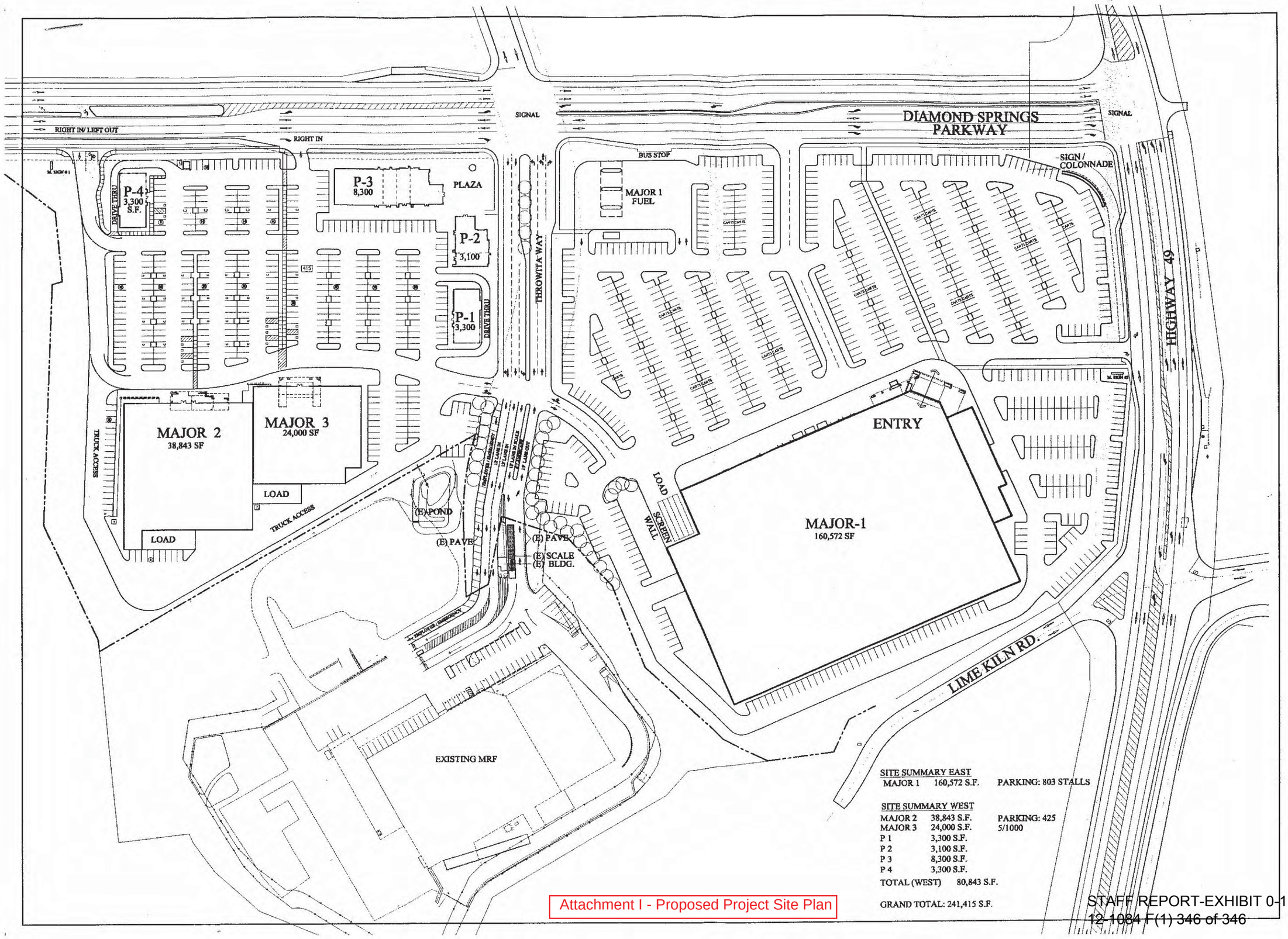
Base Volume Alternative: Peak Hour Warrant Met

Approach:	North Bound			South Bound			East Bound			West Bound		
Movement:	L	T	R	L	T	R	L	T	R	L	T	R
Control:	Uncontrolled			Uncontrolled			Stop Sign			Stop Sign		
Lanes:	0	0 3	0 0	0	0 2	0 1	0	0 0	0 1	0	0 0	0 0
Initial Vol:	0	870	0	0	919	67	0	0	112	0	0	0

Major Street Volume: 1856
Minor Approach Volume: 112
Minor Approach Volume Threshold: 72 [less than minimum of 100]

SIGNAL WARRANT DISCLAIMER
This peak hour signal warrant analysis should be considered solely as an "indicator" of the likelihood of an unsignalized intersection warranting a traffic signal in the future. Intersections that exceed this warrant are probably more likely to meet one or more of the other volume based signal warrant (such as the 4-hour or 8-hour warrants).

The peak hour warrant analysis in this report is not intended to replace a rigorous and complete traffic signal warrant analysis by the responsible jurisdiction. Consideration of the other signal warrants, which is beyond the scope of this software, may yield different results.



SITE SUMMARY EAST

MAJOR 1	160,572 S.F.	PARKING: 803 STALLS

SITE SUMMARY WEST

MAJOR 2	38,843 S.F.	PARKING: 425
MAJOR 3	24,000 S.F.	5/1000
P 1	3,300 S.F.	
P 2	3,100 S.F.	
P 3	8,300 S.F.	
P 4	3,300 S.F.	
TOTAL (WEST)	80,843 S.F.	

GRAND TOTAL: 241,415 S.F.

BRIAN WICKERT- ARCHITECT

P.O. BOX 2106
SHINGLE SPRINGS, CA 95682
PH: 530-401-3390

10-19-09
11-3-09
11-5-09
11-12-09
12-15-09
1-11-10

DIAMOND DORADO CENTER

MASTER PLAN

NORTH

SCALE 1" = 60'-0"
DATE 1-24-12

SHT A-1

Attachment I - Proposed Project Site Plan