East Ridge Tentative Subdivision Map File No. TM14-1521

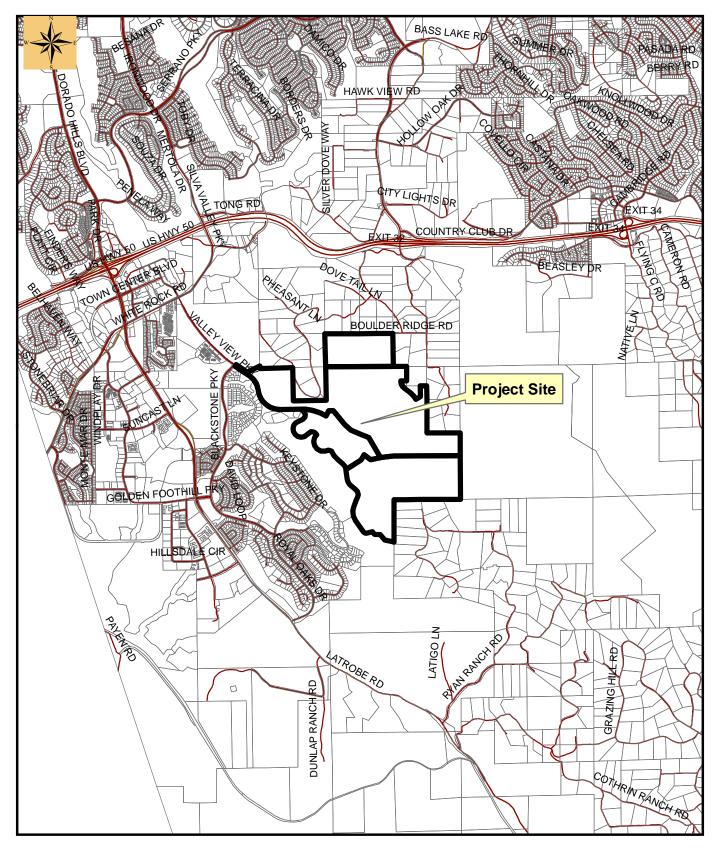
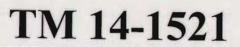
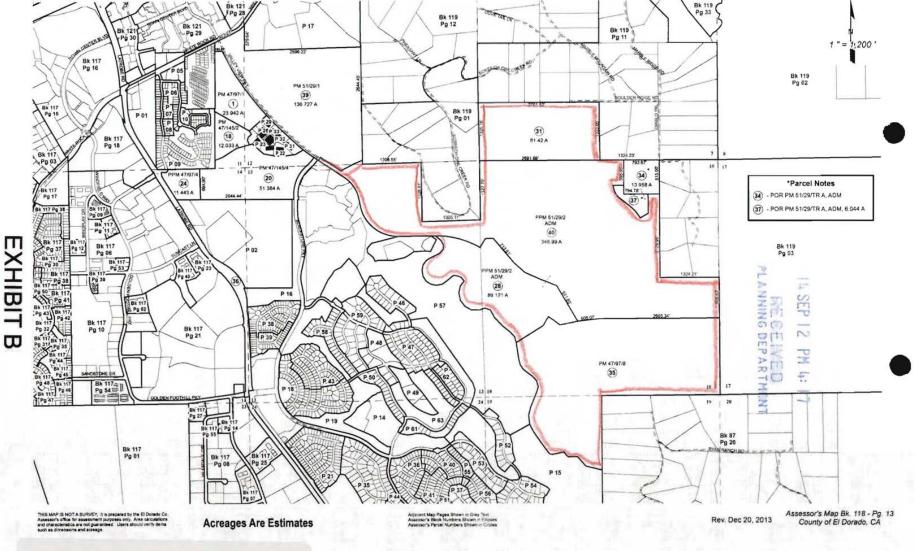


Exhibit A- Location Map

0 550 1,100 2,200 Feet

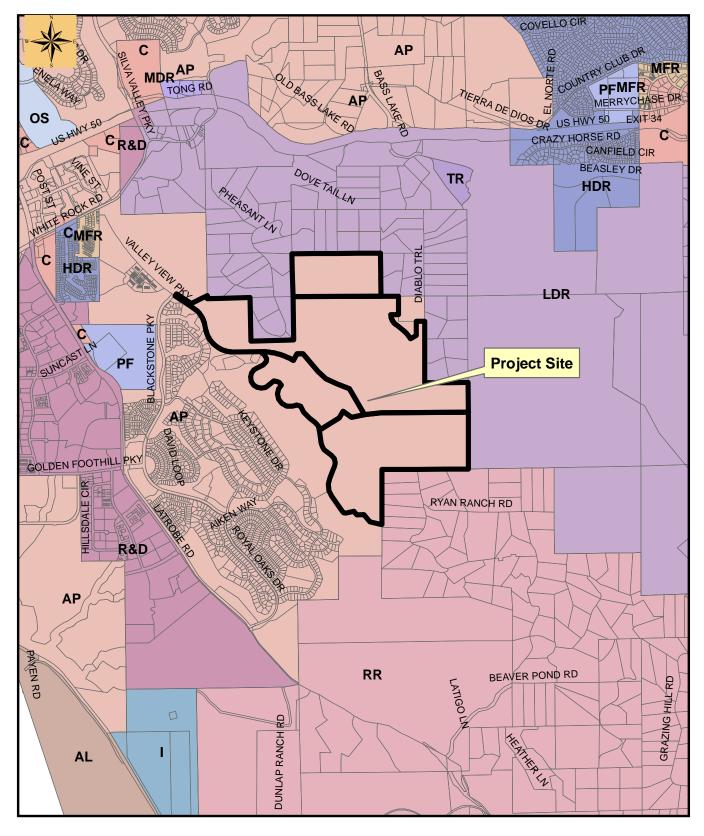






POR. SECS. 11, 12, 13, 14, & 24, T.9N., R.8E., & POR. SECS. 7, 18, & 19, T.9N., R.9E., M.D.M.

118:13



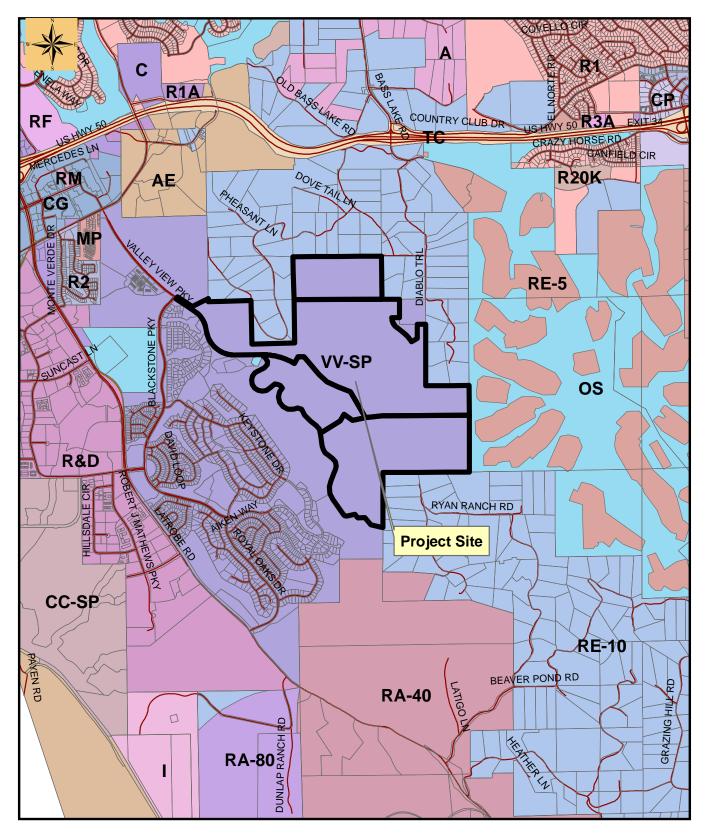
East Ridge Tentative Subdivision Map File No. TM14-1521

Map prepared by: Mel Pabalinas El Dorado County Development Services-Planning

Exhibit C- Land Use Map

0 405 810 1,620 Feet

15-0660 D 3 of 288

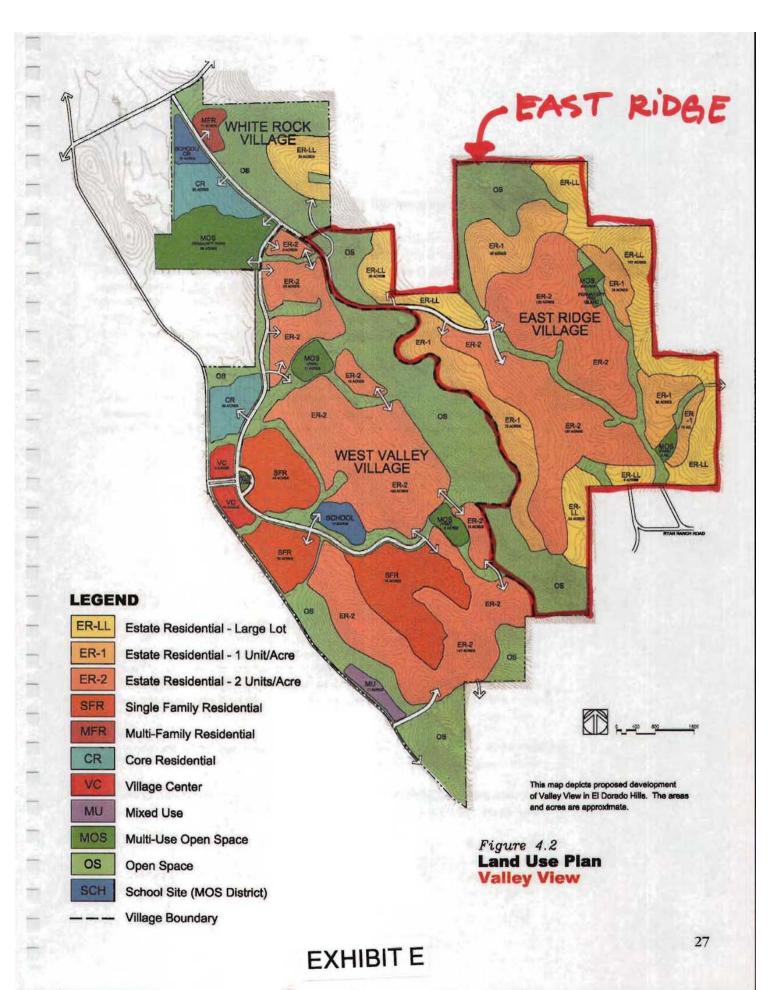


East Ridge Tentative Subdivision Map File No. TM14-1521

Map prepared by: Mel Pabalinas El Dorado County Development Services-Planning

Exhibit D- Zone Map

0 405 810 1,620 Feet



15-0660 D 5 of 288

Valley View Unit Buildout Reconciliation September 2014

Project	TM No.	No Units		Notes	
West Valley Village Projects					
West Valley Village 1-8 and 18	TM 99-1359R	1143			
West Valley Village Lot Y-Z	TM 06-1409	105	Revised to reduce 111 lots to 105 set for PC 11-13-1		
West Valley Village Unit 7A	TM 10-1494	4	Net Increase	6 Total-2 from West Valley 1-8 and 18	
West Valley Village Unit 3C	TM 10-1500	4	Net Increase	8 Total-4 from West Valley 1-8 and 18	
West Valley Village Unit 5C	TM 10-1501	7	Net Increase	12 Total-5 from West Valley 1-8 and 18	
West Valley Village Lot W (12)	TM 12-1506	72			
West Valley Village Lot V (1)	TM 12-1507	70			
West Valley Village Lot X (11)	TM 12-1508	61			
West Valley Village Current Buildout Total	Total	1466			
From West Valley Staff Report-Build Out Potential Table on Page 7	Total	1832			
White Rock Village					
Multi-Family per Section 2.1.2 DA	20%	568			
The Vineyards	Building Permit	344			
Mercy Housing	Building Permit	168			
Lessara	TM 04-1390R	160			
White Rock Village Current Buildout Total	Total	672			
Valley View Specific Plan Maximum		2840			
Valley Specific Balance	SP	702		Proposed East Ridge Village Tentative Subdivision Map (TM14-1521) would create a total of 701 residential lots	

E:\TM14-1521 (East Ridge)\Documents\Misecellaneous\Valley View Unit Count Reconciliation 9-29-14 (1).xlsx

EXHIBIT F

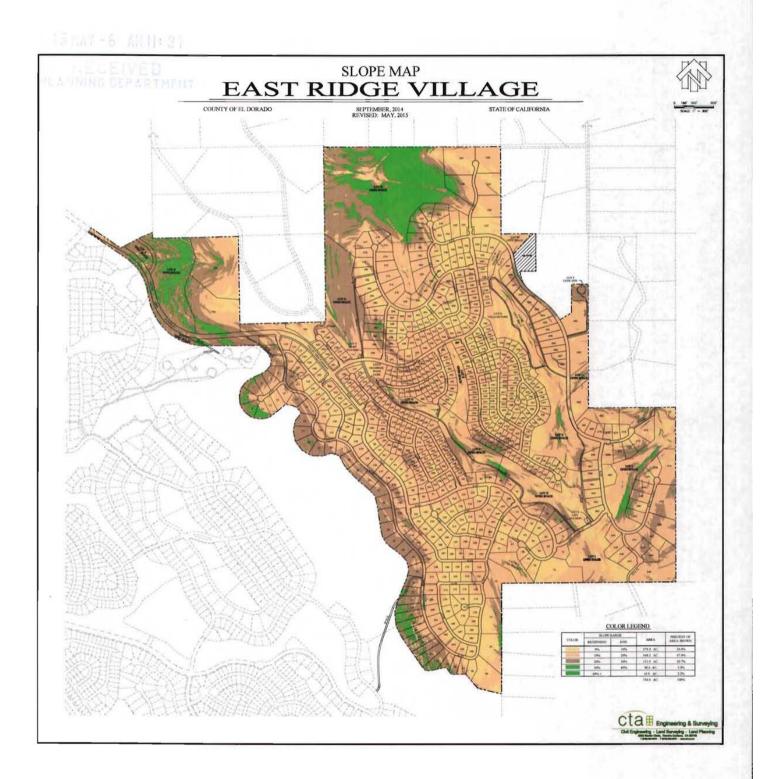
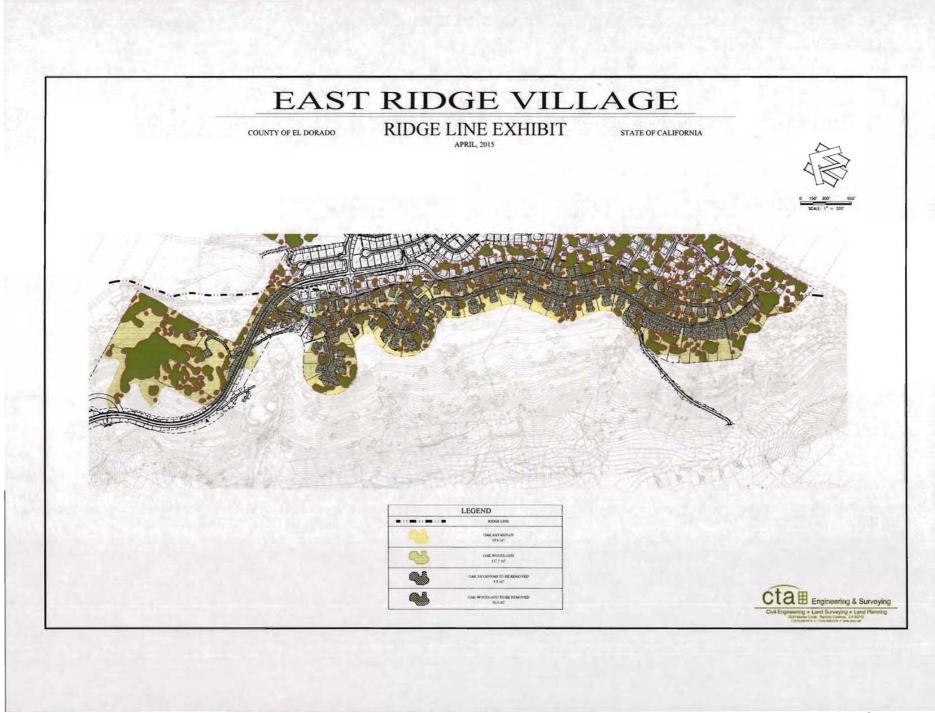


EXHIBIT G

15-0660 D 7 of 288



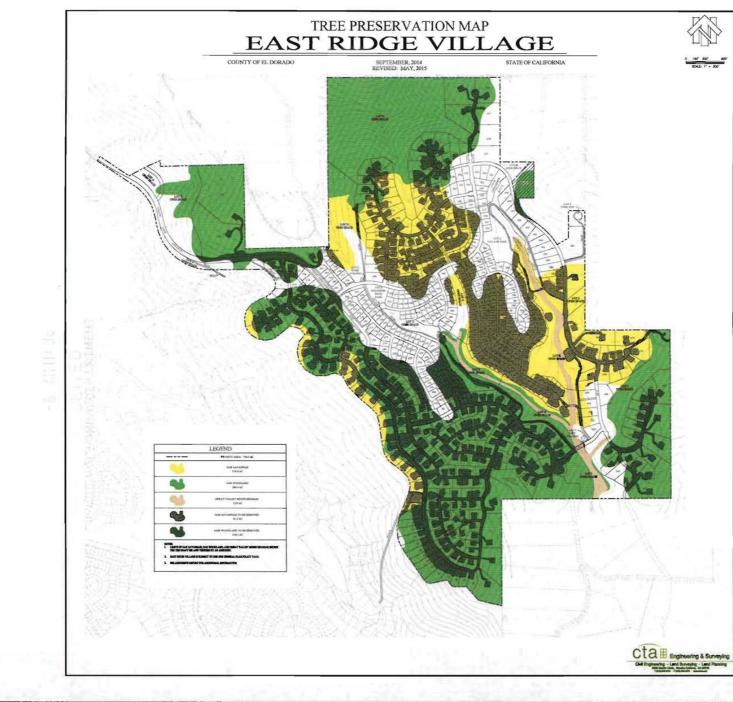


EXHIBIT H

East Ridge Tentative Subdivision Map File No. TM14-1521

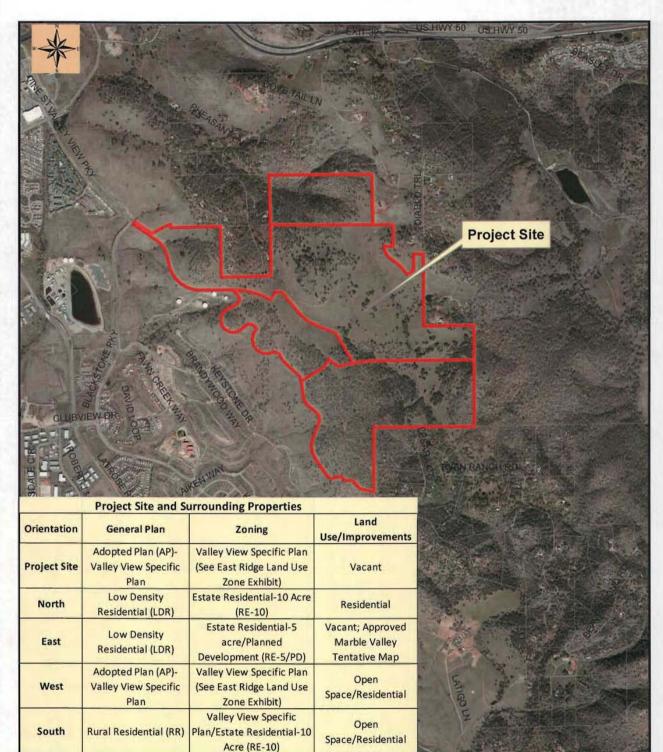
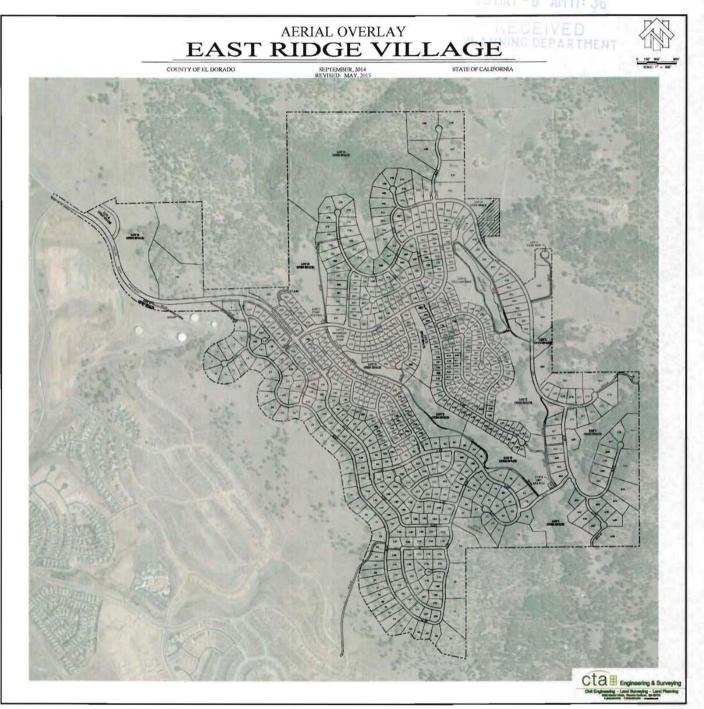
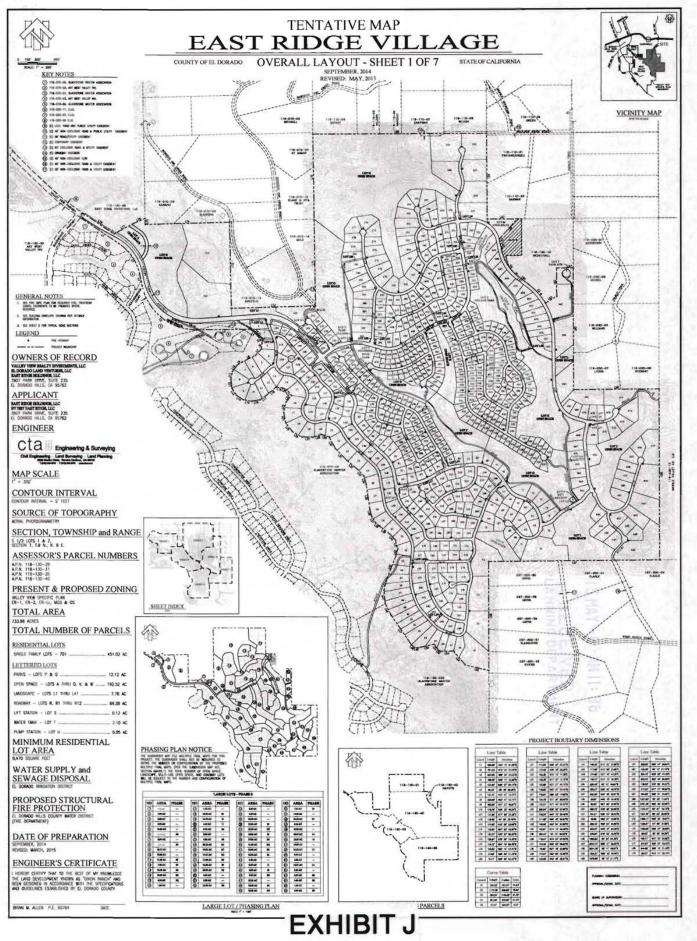




Exhibit I- Aerial Map

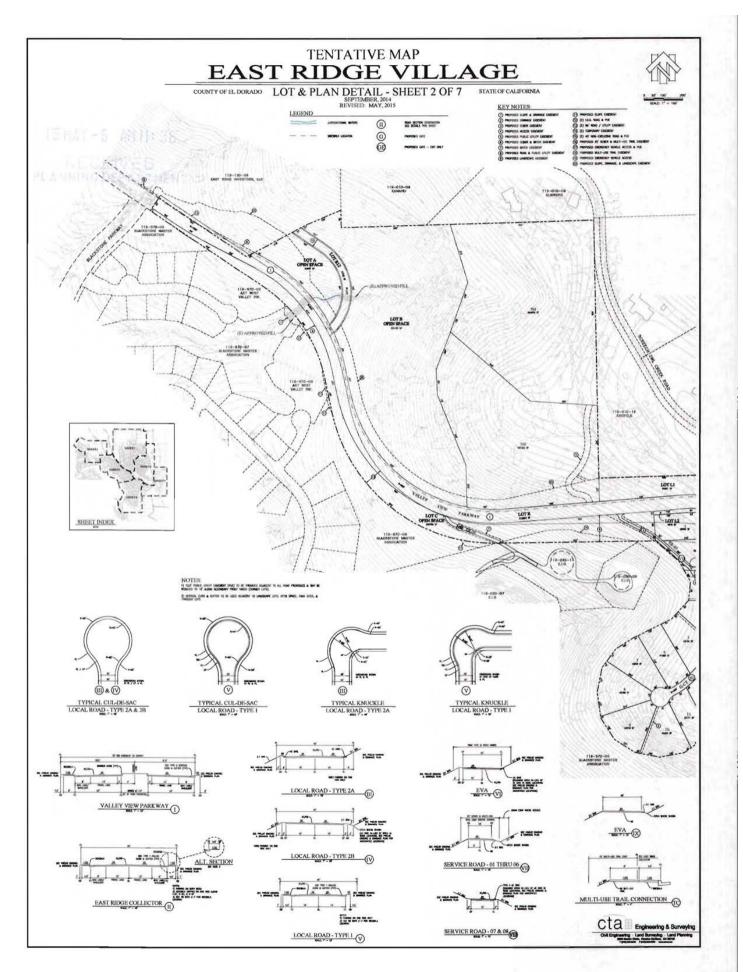
0 345 690 1,380 Fee

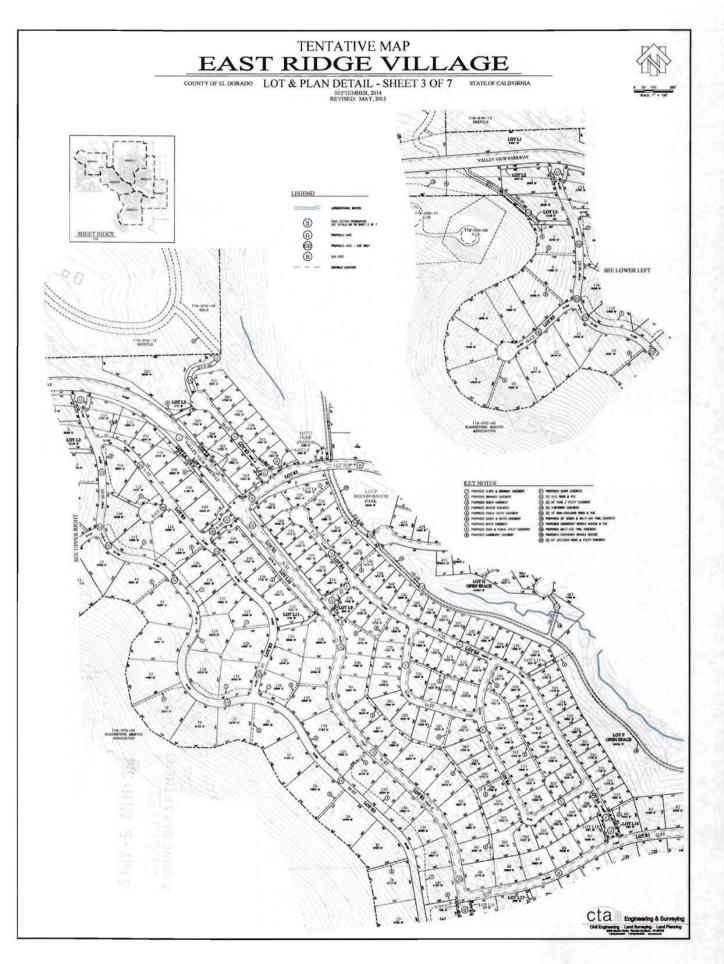




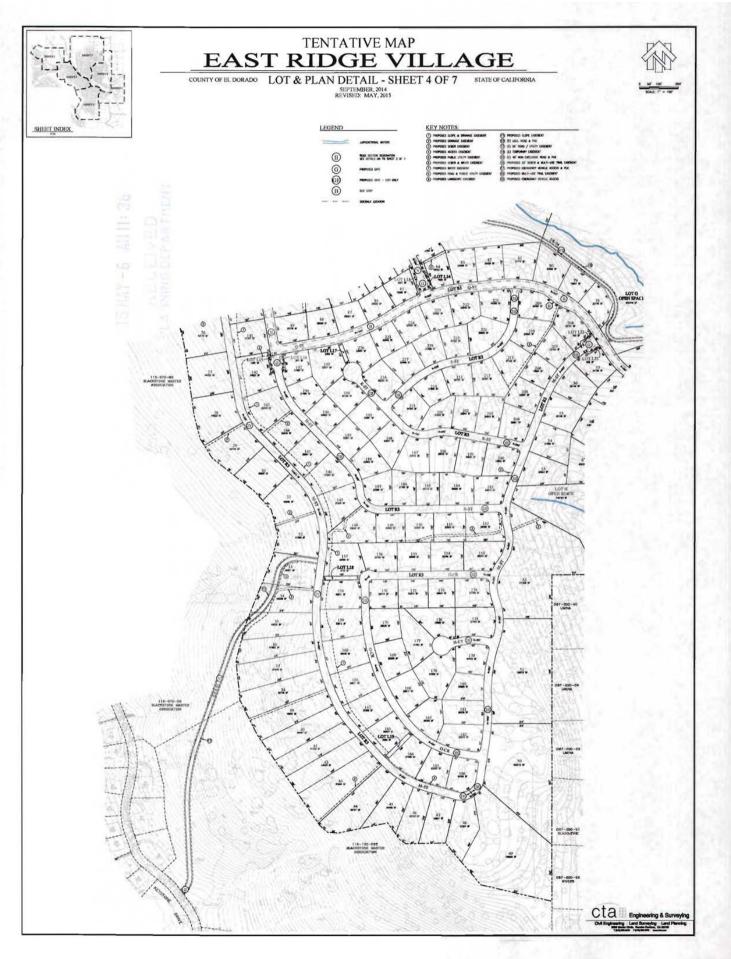
¹⁵⁻⁰⁶⁶⁰ D 12 of 288

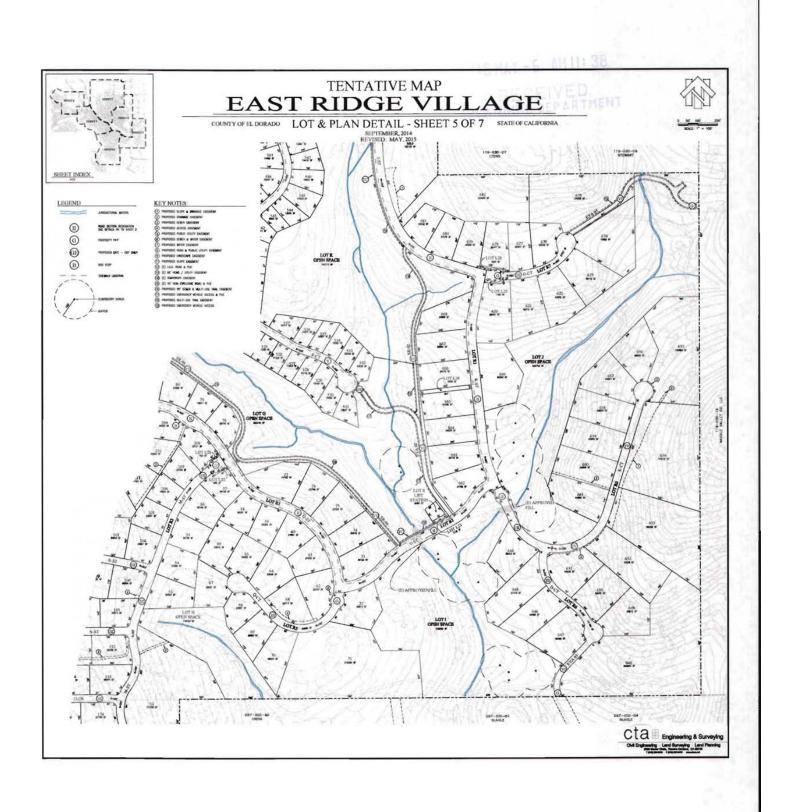
15-0660 D 13 of 288

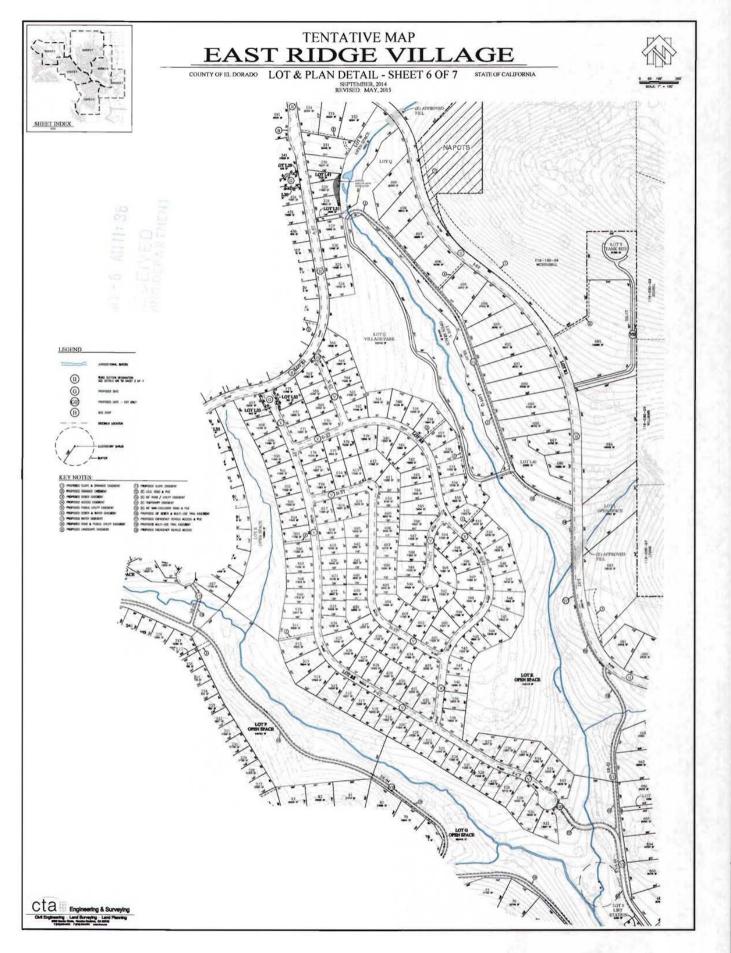


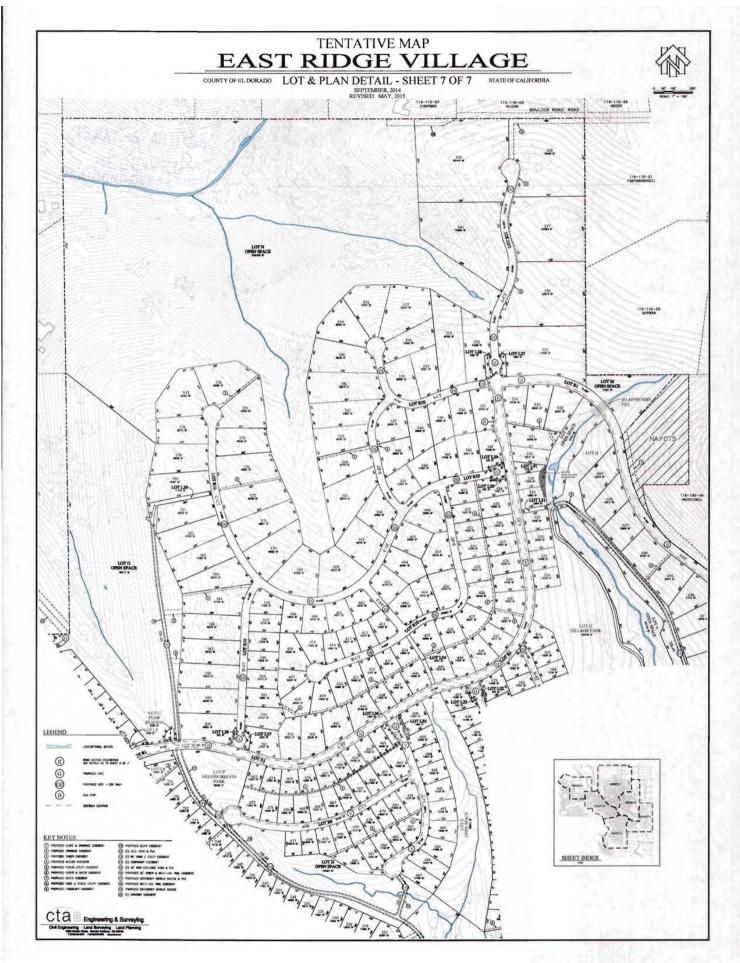


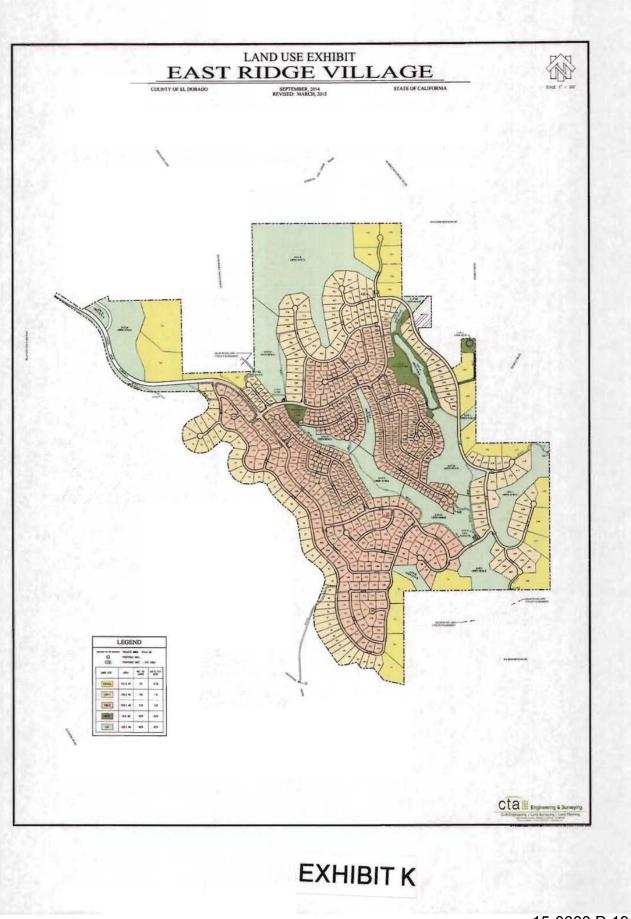
15-0660 D 14 of 288



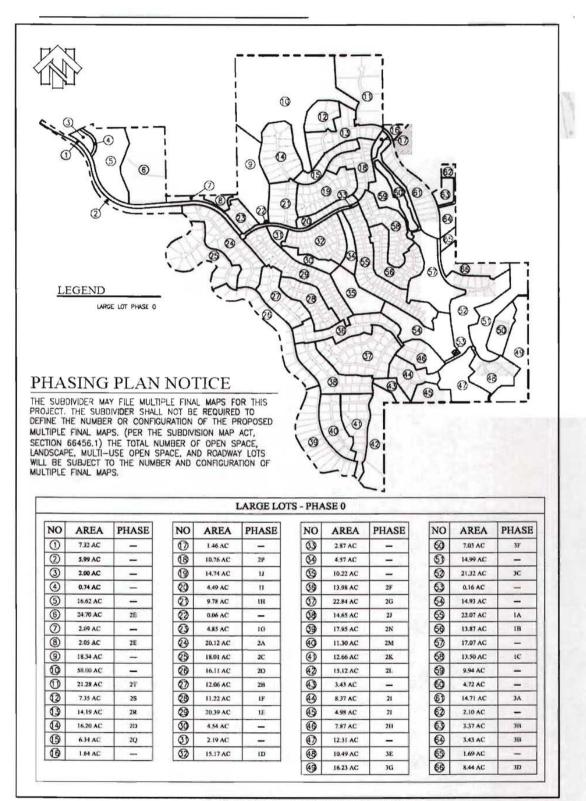








LEGEND					
OPROJECT AREA:734.0 ACGPROPOSED GATEGEPROPOSED GATE - EXIT ONLY					
LAND USE	AREA	NO. OF UNITS	UNITS PER ACRE		
ER-LL	101.3 AC	23	0.23		
ER-1	160.3 AC	160	1.0		
ER-2	259.1 AC	518	2.0		
MOS	14.5 AC	N/A	N/A		
OS	192.5 AC	N/A	N/A		

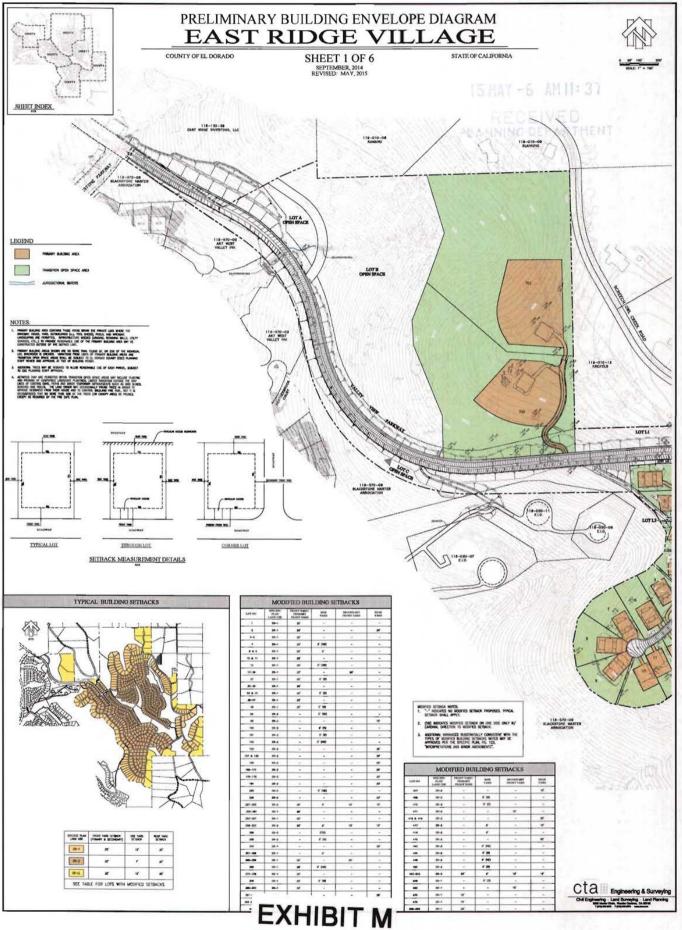


LARGE LOT / PHASING PLAN

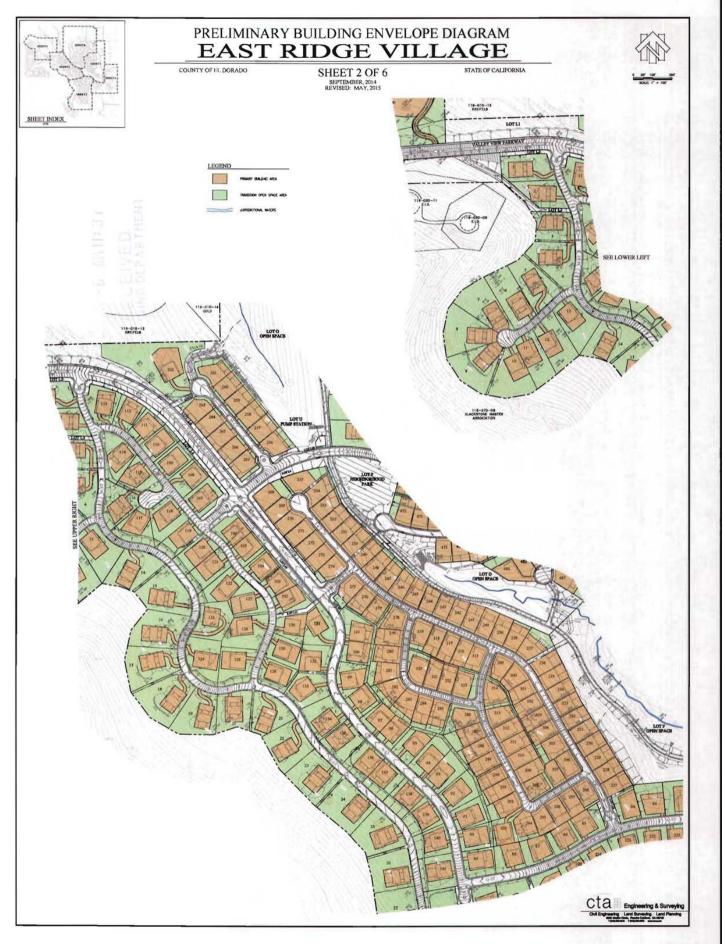
SCALE: 1" = 1000'

EXHIBIT L

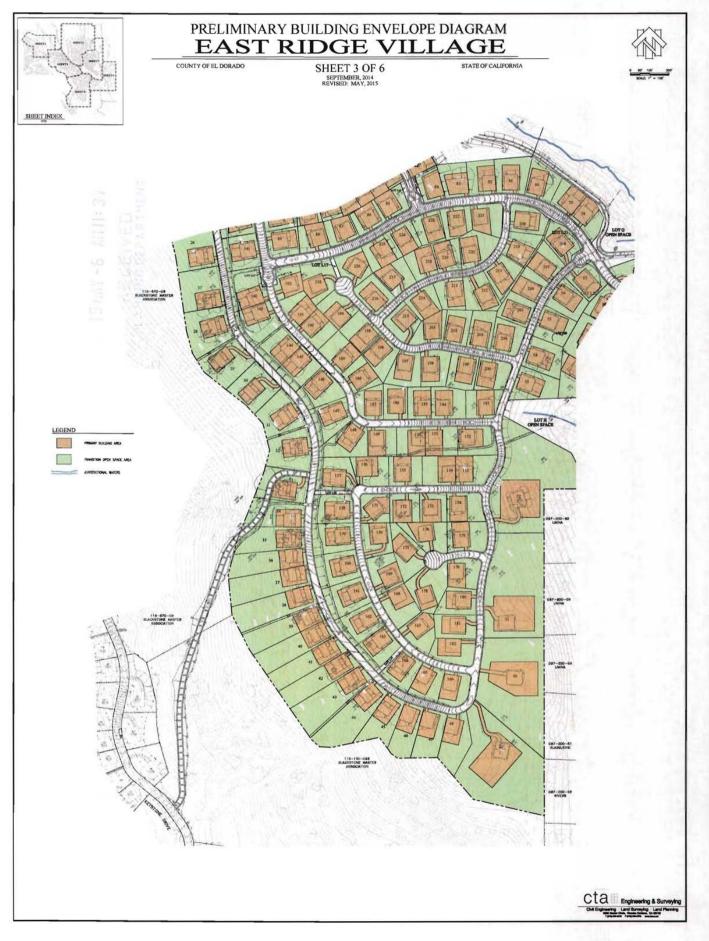
15-0660 D 21 of 288

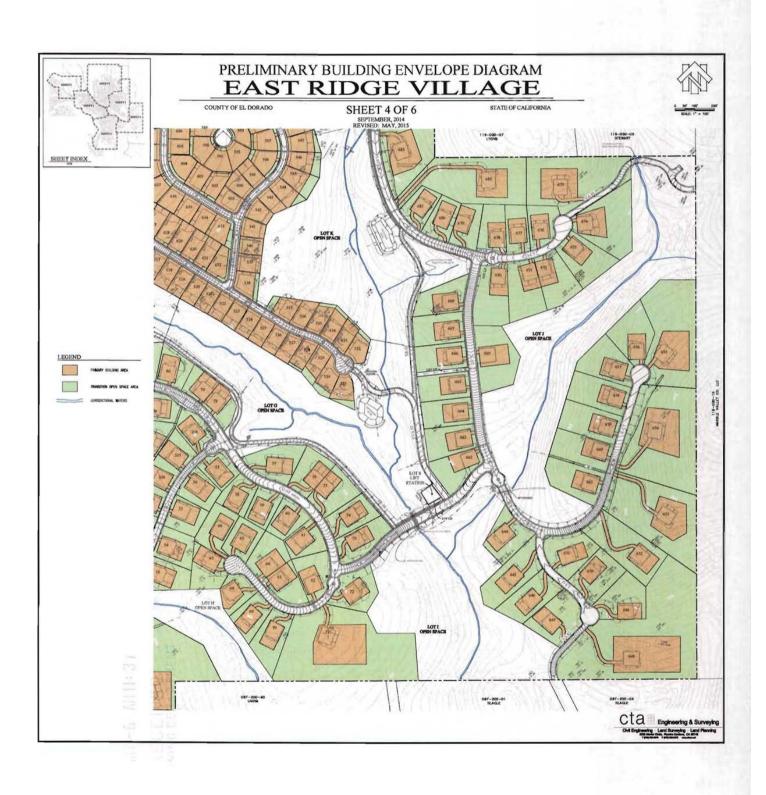


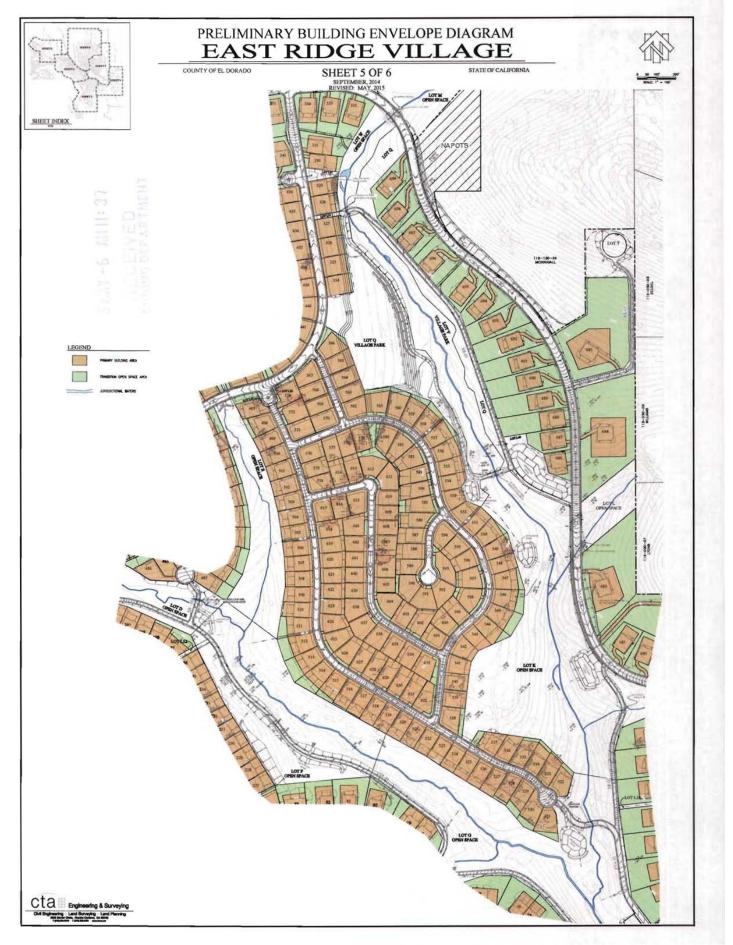
15-0660 D 22 of 288

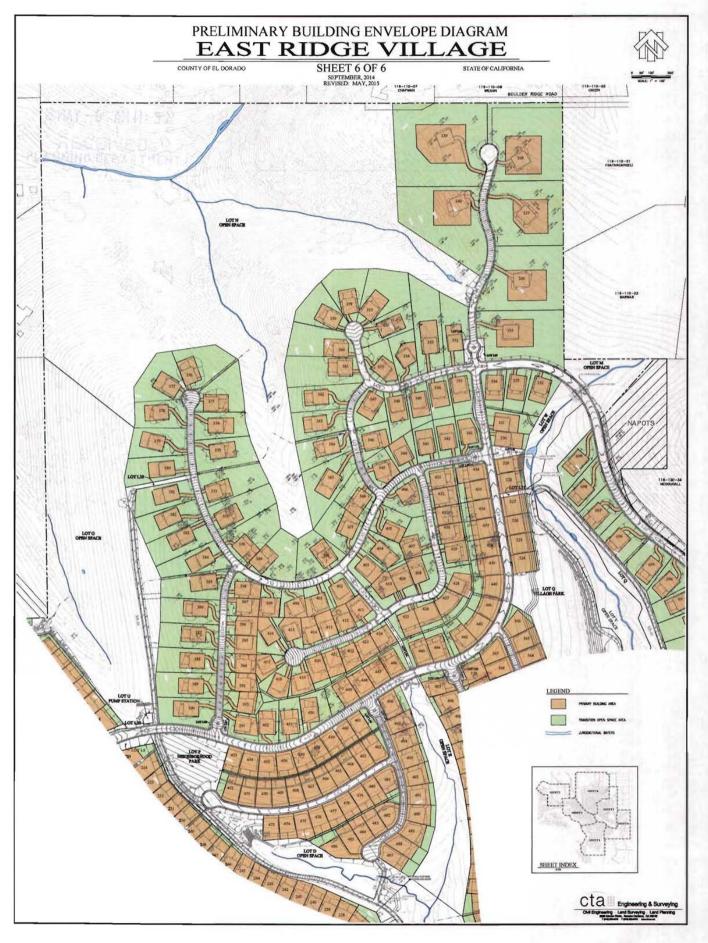


15-0660 D 23 of 288

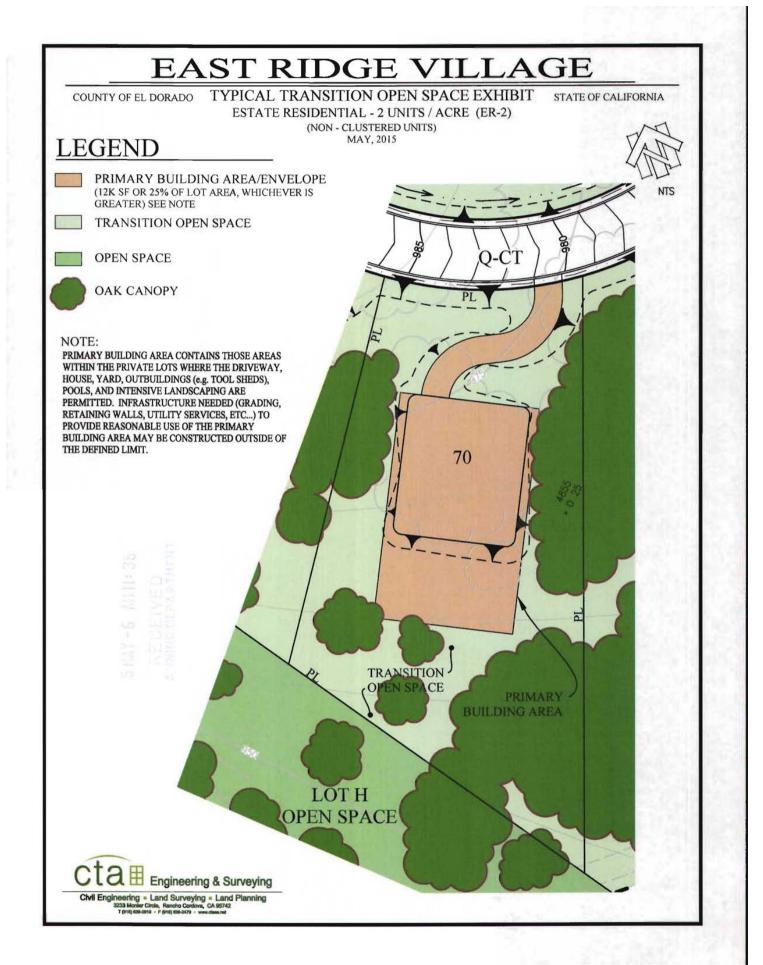




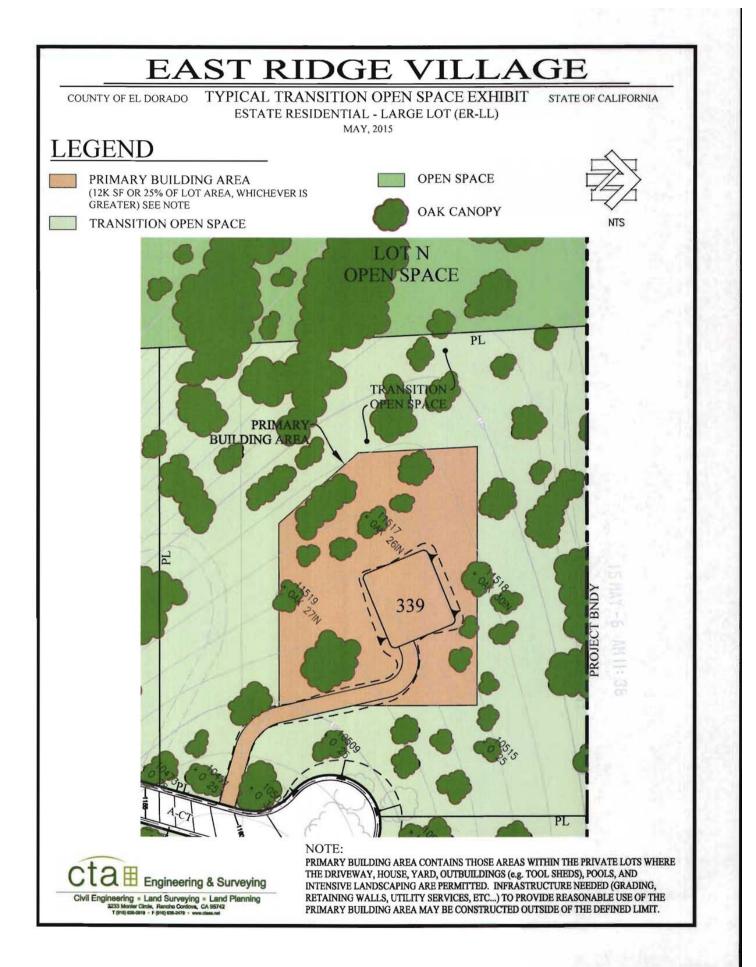


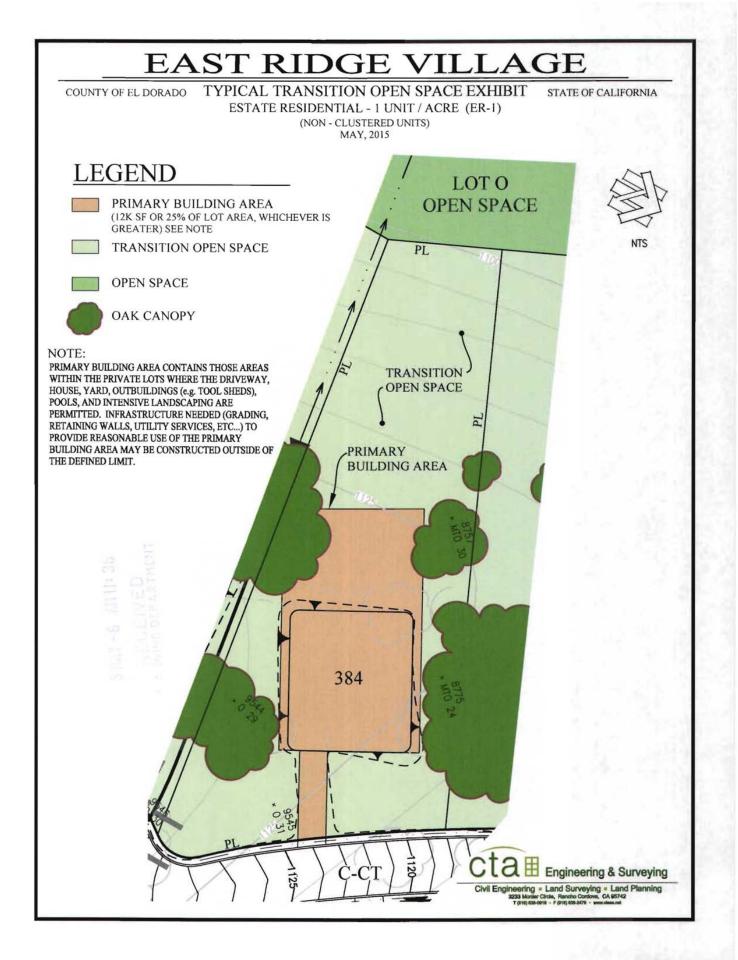


15-0660 D 27 of 288



15-0660 D 28 of 288





TYPICAL AND MODIFIED BUILDING SETBACK FOR EAST RIDGE

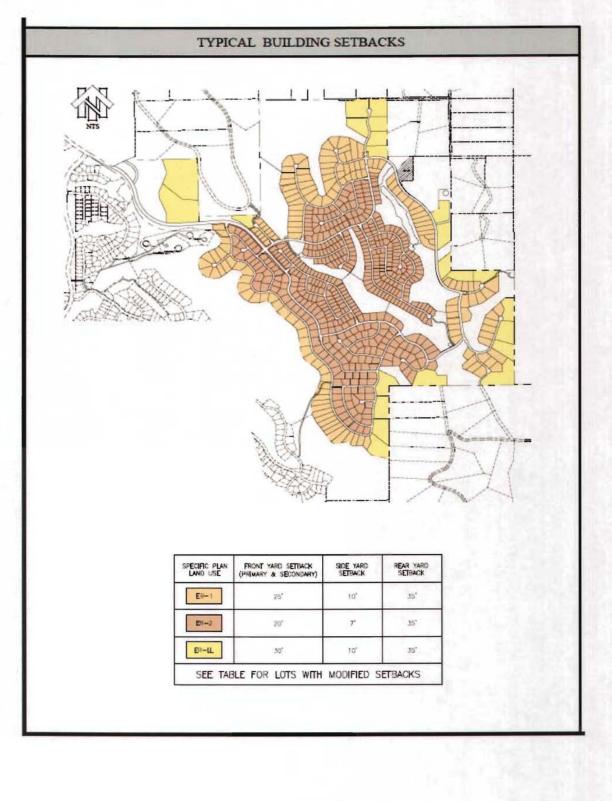


EXHIBIT N

TYPICAL AND MODIFIED BUILDING SETBACK FOR EAST RIDGE

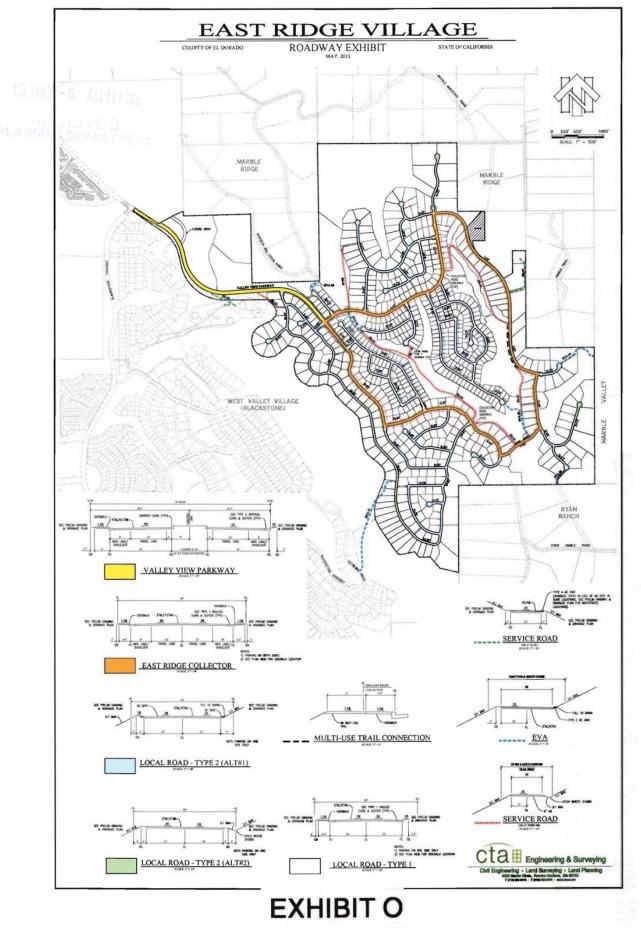
LOT NO	SPECIFIC PLAN LAND USE	FRONT YARD / PRIMARY FRONT YARD	SIDE YARD	SECONDARY FRONT YARD	REAR YARD
1	ER-1	20'	-	4.0.0	
2	ER-1	20'	-	-	20'
3-6	ER-1	20'	-	-	-
7	ER-1	20'	5" (SW)	-	<u></u>
8 & 9	ER-1	20'	5'		
10 de 11	ER-1	20'		100	+
12	ER-1	20'	5" (SW)		-
13-26	ER-1	20'	- <u></u>	20'	-
27	ER-1	20'	5' (S)	-	
28-32	ER-1	20'	-		1 - C
33 & 34	ER-1	20'	5° (S)	-	-
35-47	ER-1	20'	-	-	-
48	ER-1	20'	5' (W)	- 135	-
64	ER-2	-	5' (SE)	-	-
68	ER-2	-	-	-	15'
100	ER-2	-	5' (N)	-	-
101	ER-2	-	5" (S)		-
102	ER-2	-	5' (NW)		-
103	ER-2	-	-	-	30'
31 & 132	ER-2		-		20'
156	ER-2	_	=	-	25'
168-170	ER-2			-	25'
176-178	ER-2			-	20'
194	ER-2	-	V	-	20'
225	ER-2	_	5' (NE)	<u>, 1</u>	_
226	ER-2	-	7 — 3	·	20'
227-255	ER-2	20'	5'	10'	15'
255-261	ER-1	20'	2-22	2	-
263-267	ER-1	20'	1. 	-	11 -
268-323	ER-2	20'	5'	10'	15'
329	ER-2	-	5'(S)	-	14
330	ER-2	-	5' (N)	-	
345	ER-1	-		_	30'
357-359	ER-1	_	5'	- 22.	- 12
360-368	ER-1	20'		20'	_
369	ER-1	20'	5' (NW)	-	
370-375	ER-1	20'	-	-	-
376	DR-1	20'	5' (W)		
386-390	ER-1	23'			
591-39/	 Ex-2	-	3 _ 1	-	25'
199 & 401	ER-2	_		-	15'
405	ER-2		5' (SW)	_	25'

TYPICAL AND MODIFIED BUILDING SETBACK FOR EAST RIDGE

LOT NO	SPECIFIC PLAN LAND USE	FRONT YARD / PRIMARY FRONT YARD	SIDE YARD	SECONDARY FRONT YARD	REAR YARD
407	ER-2	-	-		15'
408	ER-2	_	5' (W)	-	1816-1
410	ER-2	-	5' (E)		-
411	ER-2	_	-	15'	-
15 & 416	ER-2		141	1.2 - 2.3	25'
417	ER-2	_	5'		15'
418	ER-2	-	5'	-	-
419	ER-2	R - 8			25'
443	ER-2	-	5" (NE)		-
444	ER-2		5' (W)		9696740
449	ER-2	-	5' (NE)	-	- 10
450	ER-2	-	5' (W)	-	
453-643	ER-2	20'	5'	10'	15'
649	ER-1	-	5' (S)	1	
662	ER-1	-	(=)	15'	19 - J
670	ER-1	15'			
678	ER-1	15'	-		100
689-699	ER-1	20'			-

MODIFIED SETBACK NOTES:

- 1. "-" INDICATES NO MODIFIED SETBACK PROPOSED. TYPICAL SETBACK SHALL APPLY.
- 2. (SW) INDICATES MODIFIED SETBACK ON ONE SIDE ONLY W/ CARDINAL DIRECTION TO MODIFIED SETBACK.
- 3. ADDITIONAL VARIANCES SUBSTANTIALLY CONSISTENT WITH THE TYPES OF MODIFIED BUILDING SETBACKS NOTED MAY BE APPROVED PER THE SPECIFIC PLAN, PG. 123, "INTERPRETATIONS AND MINOR AMENDMENTS".



15-0660 D 34 of 288

Valley View Specific Plan East Ridge Village Amendment A

Wildland Fire Safe Plan

Prepared by:

CDS Fire Prevention Planning William F. Draper Registered Professional Forester #898 4645 Meadowlark Way Placerville, CA 95667

August 24, 2014

EXHIBIT P

1

Valley View Specific Pian

East Ridge Village

Amendment A

Approved by:

Michael Lillenthal, DC

Michael Lillenthal, DC Fire Marshal El Dorado Hills Fire Department

8-27-14 Date

Vain Fall

8-36-14

Date

Darin McFarlin, FC Fire Prevention California Department of Forestry and Fire Prevention

Prepared by:

Im A aper William F. Draper

William F. Drapt RPF #898

8-27-14 Date

2

Amendment A East Ridge Village Valley View Specific Plan

The responsibility for implementation of the original Wildfire Safety Plan and Amendment A lies with the developer and corporate home builder, lot owner and a Home Owner Association (HOA).

All provisions in the original Wildfire Safety Plan dated August 1998 shall remain in effect and subject to this Amendment. The following are the amendments associated with the East Ridge project.

- 1. Clarification of the emergency evacuation access (eva)
- 2. Gate requirements
- 3. The fuel treatment on lots one acre and larger
- 4. Fuel treatment along trails and open space left undeveloped
- 5. The fire safe staging requirements are being modified
- 6. Road system
- 7. Fire Safe update

1. Clarification of the emergency evacuation access (eva)

The primary access to the East Ridge Village will be from the extension of the existing Valley View Parkway.

As stated in the original Wildfire Safety Plan dated August 1998 ("Plan") on page 9 an exception to dead end road standards was requested and received approval. The proposed mitigation would allow for a Fire Safe/Staging Area on site if this facility were to be constructed and it would allow for a project to build up to the last 24 lots at which time an emergency evacuation access (eva) exit must be provided to Marble Valley. In addition, a "stub" will be provided to the east and south property lines so that emergency evacuation access may, in the future, tie through to Marble Valley and/or the Ryan Ranch Road system.

This Amendment A to the Plan clarifies the various options available for the East Ridge Village access as follows:

Option 1 – Comply with the existing Wildfire Safety Plan.

<u>Option 2</u> – Comply with the existing Plan with the construction of the major collector looped road and providing stubs to the property lines for the EVA to the future Marble Valley and EVA to Ryan Ranch Road. This will then allow for the full construction of all the lots including the last 24 lots.

<u>Option 3</u> – The East Ridge Village has recently acquired an access and EVA easement across the existing open space area within the Blackstone Project, previously known as West Valley Village within the Plan. The construction of this eva **ungated** roads leading to the EVA and with the construction of Valley View Parkway would provide the necessary access to develop the entire project without the construction of the

Fire Safe/Staging Area as originally approved in the Plan.

A gate shall be installed at the existing Blackstone road connection meeting the El Dorado Hills Fire Department (EDHFD) requirements. In addition, a "stub" will be provided to the east and south property lines so that emergency access may, in the future, tie through to Marble Valley and/or the Ryan Ranch Road system.

<u>Option 4</u> – Construct an EVA and gate per the EDHFD requirements connecting to the existing Ryan Ranch Road system at the East Ridge Village southern property boundary. With the construction of the Valley View Parkway and construction of a portion or all of the major collector looped road that will connect the eva, this will provide the necessary access to develop the entire project in phases without the construction of the Fire Safe/Staging Area as originally approved in the Plan. In addition, a stub will be provided to the east property line so that an emergency access may, in the future, tie through to the Marble Valley. The Blackstone EVA shall be constructed concurrently or prior to the final phase of the development.

<u>Option 5</u> – A combination of any of the above options can be used and shall be reviewed by the California Department of Forestry and Fire Protection (CAL FIRE) and the EDHFD to ensure that two means of egress are maintained.

Regardless of which option or options are ultimately implemented, during the final phase of development of the East Ridge project, the construction of a stub to the eastern property line to the future Marble Valley project will be provided.

The above options 1-5 would provide for the necessary secondary emergency ingress and egress for the East Ridge Village. If other options not identified on Options 1-5 do arise, they will be reviewed and considered for approval by CAL FIRE and EDHFD.

Concurrently or prior to the first phase of development, the extension of Valley View Parkway shall be constructed. Depending on the location and number of lots proposed in the early phases of development. It is possible that prior to triggering any of the options outlined above, some lots in the early phases could be developed with the review and approvals by the CAL FIRE and EDHFD.

2. Gate Requirements

There are 3 emergency evacuation access (eva) routes being contemplated.

- Blackstone
- Ryan Ranch
- Marble Valley

The emergency evacuation access routes shall have gates with openers that will automatically open when driven up to from the inside of the development. The opener shall also be telephone activated and have a knox key switch. In the case of a power failure, the gates shall lock open.

The interior access roadways may be gated to the housing villages. The timing of the placement of these gates will be determined by the construction of the eva's and approved by the fire department. At no time shall a gate be placed so that there is not a second access out of the East Ridge Village. The gates at these locations shall comply with the El Dorado Hills Fire Department Gate Standard.

The telephone number for the gate activation shall be provided to the fire agencies and law enforcement.

3. Fuel treat on lots 1 acre and larger

Appendix A of the original plan shall be modified as follows: Firescaping standards in Zone II shall be 70' and not 80'. This provides for the 100' clearance required by law (PRC 4291).

4. Fuel treatment on trails and in open space left undeveloped

Any trail or utility service roads within the open space and all open space adjacent to the lots and roadways shall have a fuel hazard reduction zone (FHRZ). The FHRZ adjacent to any trail and utility service road shall be 10' on both sides of the trail or road. It shall also be 10' adjacent to all roads. Maintained landscaping along the roadways may be included in the FHRZ. The FHRZ adjacent to the lots shall be 30' from the rear of each lot or to the subdivision property line, whichever is less. All lots adjacent to the open space shall have non-combustible fencing. A FHRZ around the perimeter of the open space shall be 50'.

All fuel treatments shall be done annually prior to the start of the declared fire season.

Trail and utility service road access shall have a swing type gate with a knox lock. It shall have a pedestrian passage on either side of the gate where appropriate. Trails are to be 12' wide, except where the trail is located adjacent to the back of a walk of a roadway, where it can be 6' wide. Access points to the trails and utility service roads shall be posted "No Smoking". All trees in the open space will need to be reviewed for appropriate trimming or clearing. All dead trees will be removed. All limbs on the pines within 8' of the ground shall be removed. Oak limbs within 8' of the ground should be removed. A FHRZ may be used around oaks as an alternative to pruning when the vigor of the tree is in question. All dead oak limbs within 8' of the ground shall be removed. Oak thickets may be left for wildlife habitat if they are isolated with a 20' fuelbreak that is maintained. This perimeter fuelbreak may be disced or weedeated annually.

It is specifically noted that any elderberry bush is to be protected. Pesticides usage is prohibited within 100' of these bushes or shall comply with the Open Space Management Plan.

5. The fire Safe staging requirements are being modified

On page 9 of the original Plan the project had proposed a mitigation for the exception on the dead end road standards for the Fire Safe/Staging Area collection areas, one to be temporary and one permanent. The current proposed East Ridge Village would propose not two locations but one location. A proposed Park Site located in the larger of the two Multi Use Open Space (MOU) areas would be the only location for the Fire Safe Staging Area. This one location for the planned Fire Safe/Staging Area can be either temporary or permanent but would be required to meet the following criteria:

- 1. 4 acres of flat or gentle terrain, irrigated and with a paved road access
- 2. Heliport
- 3. Hard surface parking for residents and emergency equipment
- 4. Equipped with a restroom

Other facility requirements are being eliminated such as beds and showers.

6. Road System

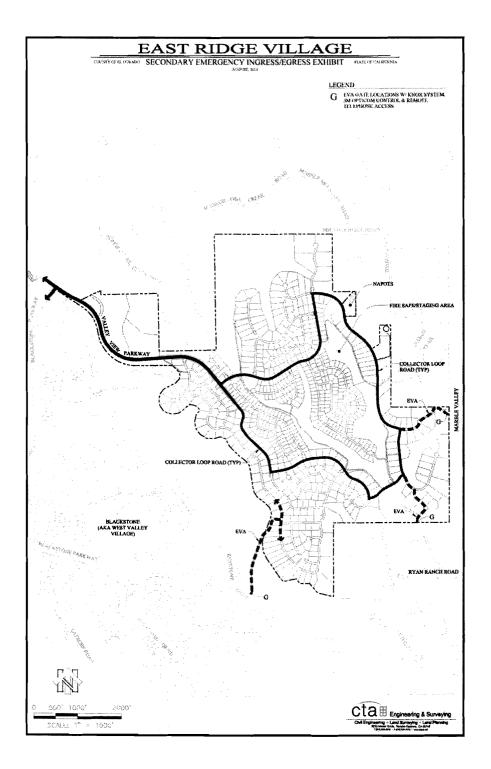
Roadways shall comply with the Valley View Specific Plan or as modified and approved by the EDHFD. The proposed road sections will be reviewed at the time of the tentative map processing.

The corporate home builder will need to file a "Construction Parking Plan" with El Dorado Hills Fire Department. This needs to address the fire departments need for access at all times during any phase of construction.

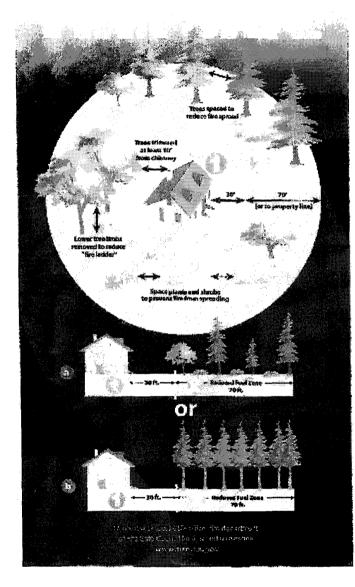
7. Fire Safe update

The East Ridge Village is within a moderate Fire Hazard Severity Zone in the SRA. All homes shall be required to have NFPA 13D fire sprinkler systems. All lots 1 acre or larger will be subject to the 30' setback requirement. If setbacks are to be reduced on the sides or rear, 7A Building Construction standards shall apply. Clearance requirements as specified in PRC 4291 shall be required (See CAL FIRE Guideline).

The EDHFD Unimproved Property Hazard Abatement (Vacant Lot Ordinance) shall apply to all vacant lots adjacent to a developed lot (See Abatement Standard).



CAL FIRE GUIDELINE 100' DEFENSIBLE SPACE



Why 100 Fest?

Followicy is son almost steps one. Connectively increases the address of yold how everything a winders:

 Λ is similar to see the two set of two second your home is negative. It has a the post is to protoct your home while providing a setemate to firefighters.

- ANT AND AND A

 Clearing an axes of 50 feet immedialely summanding your home is critical. This area requires the gravitest reduction in Lammable vegetation.

Salar an interest

 The fast achaction zone in the astraining 70 feet (or to properly line) will depend on the stagmass of your property and like version.

Spacing between plants in proves the change of Mapping a wildline before it deskroys your borne. You have two options in this area:

Create horizontal and vertical spacing botwasi plants. The amount of space will depend on have sloop the sloop is and the size of the plants.

Carge trees du suit have to be cut and removed as long as all of the plents beneath them are comoved. This eliminates a vertical "line ladder."

When clearing vegetition, use care when operating equipment such as learnmoners. One small speak may start a fire, a string binner is much safer.

Remove all build — up of needlas and leaves from your root and gattars. Keep tree larios interned at least 10 leat front any chinareys and remove dean linnes that hang over your how or garage. The law also requires a sector over your chinary outbel of not more than 46 inch mests.

I Brace reigiszteren attech möri al das grans, hurch, and hurst eineren i pieren Brech in Die Same, Seme ihn depactment jurst derivers nam bese möhlert welfammette. Same einer songen angele genrößt als die einer sond. Als opris reiteristes may negele genrößt als die einer sond. Als opris reiteristes may negele genrößt als die einer sond. Als opris reiteristes may negele genrößt als die songen, das die genröchten under zugele genreite als die songen die opris die songe oprischen Stere om Henderne statischen eine songen, das die genreichten genreich zugele die bestated diese nie obtend hogens gran genreich zugelehen die die song on als die schlichten die zwei Genet symm (such Oli Billion ist mane dies).

EL DORADO HILLS FIRE DEPARTMENT

UNIMPROVED PROPERTY HAZARD ABATEMENT STANDARD

DEFINITION

Weeds: All weeds growing upon streets, sidewalks, or private property, including any of the following:

- u. Woods which bear soods of a downy or wingy nature.
- b. Sagebrush, chapatral, and any other brush or wood which antains such large growth as to become, when dry, a fire measure to adjacent improved property.
- c. Woods which are otherwise poxious or dangerous.
- Poison out or poison ivy when the conditions are such as to constitute a measure to public health.
- e. Dry grass, stubble, brush, litter, or other flammable materials which endanger the public safety by creating a fire hazard.

CLEARANCE REQUIREMENTS

The intent of this program is to establish a defensible space around all homes, buildings, and other structures that abut to unimproved property.

All combustible vegetation that is located within the designated defensible space shall be removed or cut to a maximum height of two inches and shall include the removal of tree limbs to a height of six feet above ground level.

Clearance to structures (including combustible fonces):

a. All areas of district Minimum of one hundred (100) feet, or such greater distance as the Fire Marshal deems necessary due to unique geographic, topographic or vegetative anditions existing upon a particular pareol.

ACCEPTABLE METHODS OF ABATEMENT

- Discing: The discs shall be set at an angle sufficient to cut the sod loose and adequately bury the growth of weeds, grass, or noxious vegetation existing at the time. Discing shall include rotatilling or cultivating. Discing shall be done each time the growth exceeds 6 inches in height.
- Scraping: Area shall be scraped clear, and all debris shall be removed from the required clear area.

Ŧ

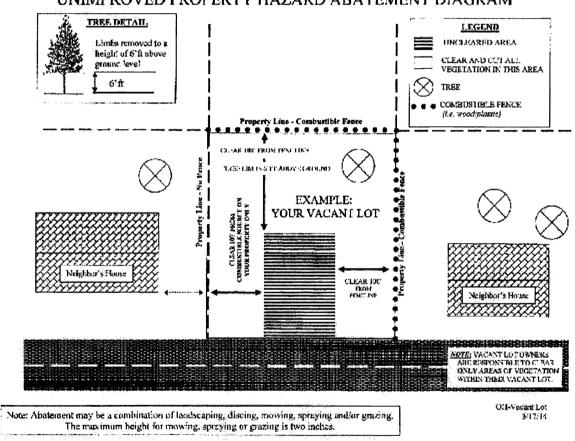
- Mowing: Height of vegetation shall not exceed two inches at completion. Mowing shall be done each time growth exceeds six inches in height. Mowing shall include hand-operated weedeaters, flail, and rotary mowers.
- Spraying: Spraying of herbicides and pre-consegents shall not be considered an acceptable method of weed abstement. If sprays or pre-energents are utilized prior to growth of vegetation, preventing growth of vegetation, then this will be an acceptable method of abatement. Any time growth of vegetation exceeds 6 inches height, it shall be removed by another acceptable method of abatement.

DEBRIS REMOVAL

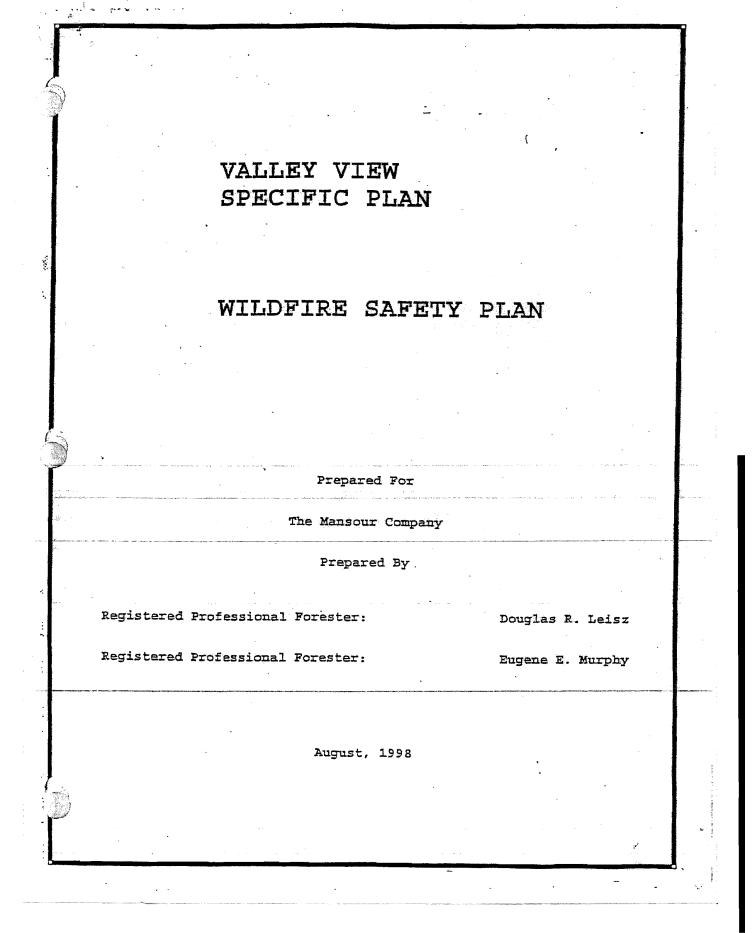
All brush or woody vegetation debris shall be chipped or removed from the property. Any non-vegetative debris (i.e., construction) shall be removed from the property.

EXEMPTIONS

Any open space areas which are subject to an existing Wildfire Sufery Plan should be exempt from these standards and shall abide by the terms of the applicable Wildfire Safety Plan.



EL DORADO HILLS FIRE DEPARTMENT UNIMPROVED PROPERTY HAZARD ABATEMENT DIAGRAM



15-0660 D 47 of 288

VALLEY VIEW SPECIFIC PLAN

STATE RESPONSIBILITY AREA WILDFIRE SAFETY PLAN

Dated

ł

August, 1998

SIGNATURE PAGE
Plan Prepared and Recommended for Approval by:
Douglas R Leisz, Registered Professional Forester-Lic 249
Date: 1/24 25, 1998
Signature: Agerta Porte
Eugene E. Murphy, Registered Professional Forester Lic-1164
Date: (lug 25/998 ()
Signature: The S. Wayney
Approved: California Department of Forestry and Fire Protection
El Dorado - Amador Ranger Unit
Date: <u>Aug 29/99</u> , A
Signature: 10 ullion A thirth
Title: William Smith, Fire Captain Specialist
Approved: El Dorado Hills Fire Department
Date: 5×7 1998
Of the second se
Fignatura Fred Russell, Battalion Chief
ii

	•	• • •
	CONTENTS	
Q		
1		• •
; -	III Background	
•	1. Climate1	
•	2. Fire History2	
	3. Project Area	
	IV Project Description4	
erender af	V Vegetation (Fuels)4	
	VI Problem Statements	
	VII Fire Behavior Analysis6	
:	VIII Goals6	
.	IX Wildfire Mitigation Measures	1
6	A. Fuel Treatment7	
,	1. Roadside	, ter e ta sus un madamente .
	2. Home Areas	ante desante un constituidan da constitución de constitución cons
	3. Open Space Areas	an and a second s
•	B. Road System8	
:	C. Home Construction Requirements10	
2	D. Other Fire Safe Practices10	· · ·
geometre.	X Responsibilities For Implementation11	
ł	Appendix	
	A. Firescaping Zone I specifications	•
	B. Grass fuel reduction standards13	
į	C. Glossary14	•
	D. Unimproved property hazard reduction resolution	:
	E. Maps	
		-
•		

I' PURPOSE AND SCOPE

Western Sierra Nevada communities are increasingly concerned about wildfire safety. Recent drought years coupled with dense, flammable vegetation and annual periods of severe fire weather have insured the potential for periodic wildfires.

the potential for periodic wildfires. The purpose of this plan is to assess the wildfire hazards and risks associated with the land use designations of the Valley View Specific Plan and its environs, and to identify measures to reduce these hazards and risks. Incorporation of these fire hazard reduction measures into the design and maintenance of the proposed future Villages should reduce the size and intensity of wildfires and help prevent catastrophic fire losses. State and County regulations provide the basic guidelines and requirements for a safe, defensible space around dwellings and major infrastructure components necessary to serve the project. This plan builds on these basic rules and provides additional fire hazard reduction measures customized to the topography and vegetation of the Specific Plan area.

The scope of the Specific Plan Wildfire Management Plan recognizes the extraordinary natural features of the area and designs wildfire safety measures which are meant to compliment and become part of the community design. The Plan contains measures for providing and maintaining defensible space along roads, around homes and within the open space areas. In the future, as Villages and construction phases are defined, Wildfire Safety Plans should be prepared for each Village.

II WILDFIRE PLAN LIMITATIONS

This Wildfire Safety Plan for the Valley View Specific Plan does not guarantee that wildfire will not threaten, damage or destroy natural resources or future homes or endanger residents. However, the full implementation of the mitigation measures will greatly reduce the exposure of homes to potential loss from wildfire and provide Defensible Space for firefighters and residents. Wildfire safety requires the installation and maintenance of <u>all</u> the Wildfire Safety Plan measures.

III BACKGROUND

Wildfires respond to their environment of climate, topography, and fuel (the wildland vegetation and structures). Wildfire behavior is subject to complex variables that are not fully understood. The management and control of wildfire is not an exact science, and more needs to be discovered about the behavior of wildland fires and their management. Under extreme burning conditions, a wildfire can be so powerful and unpredictable that fire protection agencies can only wait until fire conditions moderate before suppression can be successful.

The Wildfire Situation on the Western Slopes of El Dorado County

1. Climate

The western slopes of El Dorado County have a Mediterranean climate that features hot, dry, summers and cool moist winters. Precipitation comes generally from the Pacific Ocean storms that usually begin in October and end in May. The long hot, dry, summers produce ideal conditions for wildfires. Annual plants die and dry while perennial plants lose much of their moisture content and become highly flammable. Fires burning under these conditions threaten lives, property, and natural resources, especially toward the end of the dry season. Two additional climatic conditions aggravate this already serious wildfire problem. Periodically, every year, the Pacific high pressure system moves eastward over California and brings very hot, dry weather with low humidity as warm air aloft subsides and dries the vegetation even more. This condition is known as a "heat wave" and can occur at any time during the late spring, summer and fall. During this condition wildfires start easily and are difficult to extinguish. The other extreme wildfire conditions usually occur in the late summer or fall when north winds blow down the Sacramento Valley or east winds subside from the Great Basin. Under these conditions a wildfire can quickly escape control and create great damage before the wind stops blowing. It is this latter climatic condition which made the 1991 Oakland Hills fire so difficult to control and produced a an explosive rate of fire spread, a "firestorm".

2. Fire History From The Gold Rush Until 1950

For half a century after the Gold Rush, settlers, miners, stockmen, loggers, and other users of California's wildlands burned California foothill lands indiscriminately. These wildfires seriously damaged forests and rangelands and contributed to flooding in the valleys. Until the early 1900's the prevailing attitude toward wildfires in most of the state was to protect life and property and let the wildlands take care of themselves. Thus, wildfires probably continued to occur in El Dorado County on a regular basis for many years. After 1905, with the creation of the United States Forest Service and the California Division of Forestry (early 1920's) indiscriminate burning was gradually reduced and controlled.

3. Fire History Since 1950

As population increased in California, the threat to structures from wildfires has sharply increased. A catastrophic loss of homes due to wildfires occurred in Berkeley in 1923 when a strong north wind carried fire from Wildcat Canyon, across the Berkeley Hills and into the city, destroying 584 structures. Since then, disastrous losses of structures to wildfires have occurred with increasing frequency throughout much of California, sometimes in unlikely and unexpected locations. In the same general location of the 1923 Berkeley Fire, the disastrous 1991 Oakland Hills Fire burned more than 3,000 structures. A partial list of some destructive wildfires in recent years is shown in Table 1.

These fires alone destroyed almost 7,000 homes. Hundreds more were lost in many other wildfires. In recent years, homes were lost where few thought there was danger from wildfire. One of the best examples of this situation was the Morse Fire that destroyed 31 homes in May 1987 near Pebble Beach CA, an area shrouded in fog much of the year. The problems in most of these fires are similar to those experienced in El Dorado County today: flashy fuels (vegetation), rugged topography intermixed with homes with wood roofs. In all wildfires with heavy loss of structures, the main culprits were wind, wood roofs, and flammable vegetation too close to homes.

4. Project Area

(1764

.

The grass fuels in the project area are plants which dry and become quite flammable in early summer. This combined with the Mediterranean climate and topographic features provides favorable conditions for very high fire spread rates once the ground fuels are cured and there is an ignition source. The 1950's fire confirm the high rates of spread which can occur even with moderate winds. Without fire safe measures a small fire in or adjacent to the project area could rapidly spread and threaten homes. Flaming brands from house roofs, in turn, could ignite other roofs in the classic manner of the disastrous fires listed in Table 1.

Table 1. Major Destructive Wildfires in California since 1950

I	Year	Name of Fire	County of Origin Dwel	lings Destroyed	
	1956	Newton	Los Angeles	50	
	1961	Harlow	Mariposa	106	
	1961	Bel Air	Los Angeles	484	
	1964	Hanley	Napa	101	
	1964	Coyote	Santa Barbara	94	•
	-1967	Paseo Grande	Riverside	and a second	
	1970	Laguna	San Diego	382	
	1970	Wright	Los Angeles	103	
•	1977	Sycamore	Santa Barbara	256	
	1978	Creighton	Sonoma	64	
	1978	Kannan	Los Angeles	224	
	1980	Panorama	San Bernardino	325	
	1981	Atlas Peak	Napa	69	
	1987	Morse	Monterey	31	
	1988	Forty-Niner	Nevada	148	
	1990	Paint	Santa Barbara	599	
	-1991	Oakland, Berkeley	Alameda	3810	

Major Destructive Wildfires in El Dorado County

IV PROJECT DESCRIPTION

The Valley View Specific Plan covers 2037 acres in Western El Dorado County, East of Latrobe Road, approximately 1/2 mile South of Highway 50. Overall project area topography is moderate ranging from the flat rolling grasslands at the western boundary to gently sloped ridges surrounding Plunkett Creek at the eastern boundary. The central northern and southern areas are characterized by moderately steep slopes of oak woodland and grasslands. The project site is varied and includes a prominent north-south ridge line, two valleys and wooded canyons. Elevations range from 530 feet along the Latrobe Road to 1100 feet on the northeastern corner of the project. The dominant soil is Auburn very rocky silty loam with small areas of Argonaut very rocky loam. Three villages are planned:

1. White Rock Village of 110 acres with 312 units and a 52 acre community park and school site.

- 2. West Valley Village of 647 acres with 1806 units, Village Center and 22 acres for three parks and a school site.
- 3. East Ridge Village of 638 acres with 722 custom family homes and a 3 acre park.

The area is protected by the California Department of Forestry and Fire Protection (wildfire) and the El Dorado Hills Fire Department (structures).

V VEGETATION (FUELS)

For wildfire planning purposes all vegetation is considered fuel for wildfires.

The vegetation types within the Specific Plan project area for wildfire analyses are annual grass lands and oak woodlands. The oak woodlands overstory contains: Blue Oak, Live Oak, Valley Oak, California Buckeye and Grey Pine. There are narrow bands of riparian vegetation along the drainages. The ground cover is annual grasses and weeds with small amounts of shrub species. The area has been grazed for many decades stemming the encroachment of brush and keeping the herbaceous fuels to a low level. With the cessation of grazing, over time, brush may become established. A fuel ladder does not exists over most of the project. The exception is a 15 to 20 acre Live Oak thicket in the East Village south of the west branch of Plunkett Creek.

	<u>Plant Type</u> Non-native Annual Grassland	Acres 1271	
· ·	Oak Woodland	439	
	Oak Savanna	290	
	Riparian		n na standa na standa Na standa standa na st
-	Wetlands	15	x

The California Department of Forestry and Fire Protection (CDF&FP) rate the general area as Moderate in their Fire Hazard Severity. classification system. There are three ratings; Moderate, High and Very High. The consultants evaluation confirms the Moderate classification.

VI PROBLEM STATEMENTS

ð

A. The continuity of the grass fuels both on and adjacent to the property will allow fires to develop quickly.

Fire history has demonstrated that grass and other light fuels are a threat to other vegetation as well as people. There is a strong tendency for the public, and even some firefighters, to discount the serious nature of fires in the grass lands of California. For instance, a grass stand of 1 ton per acre (typical of the Valley View grasses) has approximately 8000 Btu's per pound or 16 million Btu's per acre. A study conducted on 100 fires where 31 firefighters lost their lives, revealed many of the fires burned in light fuels such as grass. Fire in the grass fuels is the most serious wildfire problem for this project.

B. Portions of the Project area have moderately steep side slopes.

The rate of spread of wildfires increases exponentially with increase in slope.

C. The risks of fire starts will increase with development. Activities surrounding the project area e.g. traffic on the Latrobe road, industrial uses at the water treatment facilities and activities associated with neighboring residents present the greatest risk of fire ignitions.

D. Provisions must be made to maintain all Fuel Treatments The wildfire protection values of fuel modification areas are rapidly lost if they are not maintained.

E. Typical home design and siting often does not recognize adequate wildfire mitigation features.

A review of many wildfires has conclusively shown that most home losses occur when: (1) there is inadequate clearing of flammable vegetation around the house, (2) roofs are not fire resistant, (3) homes are sited in hazardous locations, (4) firebrand ignition points and heat traps are not adequately protected and (5) there is lack of water for fire suppression.

F. Building envelopes with substantial fuel loads combined with dangerous topographic features e.g. steep topography,

draws, place future homes at high risk. Failure to create and maintain a defensible space around homes is the major contributor to loss of homes by wildfire.

G. A road system with two entrances is required by law to avoid dead end roads, long exit routes, and safely evacuate homeowners while concurrently providing ingress for emergency equipment in a wildfire emergency.

State and County regulations for developments exceeding certain specified lengths/lot size must provide two entrances/exits. Valley View will require an emergency exit for East Ridge Village. Dead end cul-de-sacs must also meet State and County standards.

VII FIRE BEHAVIOR ANALYSIS

Proper planning requires an estimate of how wildfire would behave within the Project area. This was accomplished through use of a standard computer program called BEHAVE which projects fire spread in different vegetation types.

The vegetation was classified in the Fire Behavior Fuel Model 1, Grass. Fire spread models using the BEHAVE program demonstrated that, prior to development and vegetation treatment, wildfires could spread rapidly under the worst burning conditions. For example, fire in the grass fuels (Model 1) with a 6 mph midflame wind could spread at the rate of 159 chains/hr (almost 2 miles per hour) with a flame length of 6 feet. Fire could spread, in the Open space Area from West Valley Village to East Ridge Village in less than 5 minutes. The consultants incorporated the model outputs in the design of the Wildfire Safety Plan for the project.

* <u>Aids to Determine Fuel Models for Estimating Fire Behavior</u> -Intermountain Forest and Range Experiment Station - General Technical Report INT 122.

VIII GOALS

- A. Reduce the high hazard vegetation (fuels) while protecting the visual, riparian, wildlife and soil values.
- B. Reduce the size and intensity of wildfires that may start either within or outside the development.
- C. Ensure defensible space is provided around all structures.
- D. Design fuel treatments so that native oaks are protected from wildfire damage.
- E. Ensure fuel treatment measure are maintained.
- F. Identify Fire Safe structural features.
- G. Help homeowners protect their homes from wildfire.
 H. Promote land management practices that will maintain a healthy stand of native vegetation, consider wildlife habitat, protect the basic soil and water resource and
 - encourage utilization of the natural resources.

IX WILDFIRE MITIGATION MEASURES

Fire hazard mitigation measures are designed to accomplish the Goals by providing and maintaining Defensible Space. Project fire hazard severity is reduced through these mitigation measures. The Fire Hazard Reduction measures must be implemented as Villages and phases are activated.

In all landscaped areas (Parkways, Medians, Parks, surrounding homes) avoid planting pyrophytes (easily ignited plants) that are high in oils or resins such as pines, junipers, eucalyptus, cypress, cedar etc. Plant species that are fire, drought and freeze resistant, emphasizing plants native to the area. Arrangement, spacing and plant height are very important factors in wildfire spread and safety.

6

. Fuel Treatment

í

1. Roadside Fuel Modification

Landscaping that is planned for the various roads should utilize fire resistant shrubs and emphasize native trees. If parkways or medians are not irrigated, cured herbaceous vegetation must be treated annually.

- a.) "<u>A" Entrance Parkways</u> Landscaped, no special wildfire fuel treatment.
- b.) "<u>B</u>" Major Collector/with Residential Uses on Both Sides Landscaped, no special wildfire fuel treatment.
- c.) "<u>C" Major Collector/with Landscaping Buffer</u> -Landscaped, no special wildfire fuel treatment.
- d.) <u>*D* Split Travelway Collector, *E* East Ridge</u> <u>Collector, Minor Collector, East Ridge Local Roads</u> and <u>Standard Local Roads</u>
 - Remove all vegetation from road ditches and shoulders and 4 foot up the cut bank. Mow grass For 5 feet outward from edge of Pedestrian Walkways to a 2 inch stubble or chemically treat annually by June 1.
- e.) Latrobe County Road Maintain the strip (adjacent to and parallel to the road) of fuel modification by chemical treatment, blading to mineral soil or mowing annually by June 1. This treatment is not required in sections of the Latrobe Road which receive bermlandscaping or sound barrier treatment.

(See Map A in Appendix for locations of above roads.) 2. Home Areas

 a.) Firescaping Zones are required for all Lots. These zones extend outward from the structures in all directions for 30 or 80 feet or to the property line as specified below in a. 1. and 2. (See Appendix A for specifications.)

Lots with designated building envelope provide restrictions for the lot remainder (transition zone) where natural vegetation is emphasized. Transition zone areas will require modest vegetation firescaping consisting largely of limb pruning of trees and annual grass mowing.

RESIDENTIAL LAND USE DESIGNATIONS

1. West Valley Village and White Rock Village

(a.) SFR, MFR, CR, ER-2; Zone I Firescaping standards apply. If lots are graded, no Zone I Firescaping is required unless area beyond building is not irrigated, then Zone I standards apply.

2. East Ridge Village

(a.) ER-LL, ER-1, ER-2; Zone I or Zone II Firescaping standards apply. The lots within the Live Oak thicket area will require Firescaping Zone II, 80 feet, or to the lot boundary if less than 80 feet from the structure. (See map in

7

Appendix for schematic location of the Live Oak thicket area.)

3. Open Space Areas

- a.) Five grass fuel treatment strips, 12 feet wide, are identified in the Open Space areas. Three of these may be accomplished by using utility easements lines. The two remaining will be finalized as Village plans are proposed.
- b.) East Ridge Village Vegetation (fuels) will be treated in a 16 to 20 foot wide area outside and adjacent to lot boundaries bordering the western edge of the Village.
 - In addition a 8 to 10 foot wide vegetation (fuels) area will be treated inside the rear lot line where lots border the project property lines.
- c.) West Valley Village a 8 to 10 foot wide vegetation (fuels) area will be treated outside and adjacent the lot perimeters bordering on the Open Space areas.

(See map in Appendix for schematic locations and Appendix B. for treatment specifications for a, b and c above.)

- Multi Use Open Space, School Sites, Village Center and Mixed Uses
 - a.) Fuel treatment, if any, to be determined when final Village development plans are prepared. If areas are fully landscaped no special fuel treatment is required.

5. Bicycle Paths

 a.) Vegetation (fuels) will be treated for 5 feet on each side of the path as per specifications displayed in Appendix B.

B. Road System

Access is one of the most important aspects of land developmentplanning from the fire protection viewpoint. It involves a great deal of engineering and expense and is difficult to improve or alter after development is complete. Inadequate access may become critical during a fire both from the standpoint of fire fighting and exit safety of residents. Adequate ingress and egress must be provided to allow safe and rapid passage of both fire equipment and private vehicles passing in opposite directions.

 State of California "SRA Fire Safe Regulations", Public Resource Code 4290, Article 2, Emergency Access, Sections 1273.00 through 1273.11 or El Dorado County Design and Improvement Manual Section 3. A. 3.12, which ever is more restrictive, must be met.

State of California Dead-End road standards (1273.09) are:

"--parcels zoned for less than one acre - 800 feet parcels zoned for 1 acre to 4.99 acres - 1320 feet--" El Dorado County Design and Improvement Manual standards for dead-end roads are:

"A dead-end street connecting to a County or State. (maintained street may exceed 500 feet in length, but no more than 2640 feet, and only when geographic features restrict a street extension and the street will not serve more than twenty-four (24) lots existing or potential."

2. Fire access lane(s) must be provided through open cul-desacs, lot easements or other means for emergency wildfire access to Open Space areas and adjacent wildlands. Access intervals should not exceed 1/2 mile. Lanes should be signed, provide for heavy equipment unloading and gated if necessary. As Village lot plans are finalized the access lanes must be provided.

3. The East Ridge Village must have a second emergency ingress/egress.

Presently, emergency access is planned to exit the project at the eastern edge of East Ridge Village through the approved Marble Valley Development to Highway 50 at the Bass Lake Interchange.

The East Ridge Village will likely develop in several phases; the emergency exit through to Marble Valley is a logical part of the final phases of the Village and must await the building of Marble Valley Phase II. If the emergency access is not available at the time the East Ridge Village is developed an Exception (1270.07 SRA Fire Safe Regulations) is proposed.

4. Exception To Dead End Road Standards Requested (1273.09) a.) Favorable conditions for mitigation.

- The East Ridge Village is served by a split travelway collector with a median separation and two 24 foot lanes.
- (2) Fuels in and below the Village are grass on gentle to moderate topography.
- (3) Fuel reduction measures are applied to all
- lots, adjacent to roads, and to Open Space Areas. (4) Wildfire intensity in the grass fuels will be of
- moderate duration and the main access road will likely be continuously available for travel.

b.) Mitigation.

ž

 The Exception proposes two Fire Safe/Staging collection areas for residents and fire equipment, one temporary and one permanent. As the Village phases are planned Fire Safe/Staging areas would be required that meet the following criteria: (1) 4 to 6 acres of flat or gentle terrain, irrigated and with paved road access, (2) helispot, (3) hard surface parking for residents and emergency equipment, (4) equipped with electricity, telephone, water, shelter facilities (toilets, showers, first aide supplies and at least 6 beds). Size will depend upon the number of residents to be served during an emergency. The Fire Safe/Staging area (s) will be maintained until the required emergency exit is provided.

- Twenty four lots of East Ridge Village will be 2. withheld from development until an emergency exit is provided.
- 3. A "stub" intersection will be provided to the south and east property line so that emergency access may, in the future, tie through to Marble Valley and/or the Ryan Ranch Road system.
- C. Home Construction Fire Safe Requirements
 - Homes can be located and designed to be both architecturally pleasing and reasonably fire safe. 1. All structure must have Class A roofing and boxed eaves.
 - Class A rated treated wooden shakes are not permitted.
 - 2. If homes are built on side slopes with decks cantilevered out over the natural slope the vertical sides one story or less will be enclosed.
 - (Screen the open portion beneath the deck or structure with lattice work and wire mesh or encase with fire resistant materials.)
- D. Other Fire Safe Practices

şi

- 1. The project must meet all the Public Resource Code 4290 {the 1991 SRA Fire Safe Regulations-Article 2. Access, Article 3. Signing, Article 4. Water, Article 5, Fuels} as well as the fire laws, rules, regulations and codes of the Fire Districts, California Department of Forestry and Fire Protection and El Dorado County. The implementation of this Plan should satisfy the SRA Fire Safe Regulations. 2. A legal entity must be created with authority for
 - maintaining of road side fuel treatments, and home owners Firescaping Zone. Covenants, Conditions and Restrictions must be developed to ensure the enforcement of the structural and Defensible Space Fire Safe standards for individual lots.
- 3. Every 5 years the Open space areas not otherwise treated will be reviewed by the maintenance entity and fire agencies to determine if additional hazard reduction work is necessary due to vegetation changes or other factors.
- 4. A supplemental Wildfire Safety Plan must be prepared for each Village identifying fuel treatment for individual lots, access points and traffic circulation Supplement plans are not required for the mass pad grading areas.
- 5. El Dorado Hills Fire Department Unimproved Property Hazard Reduction, Resolution 98-03, requiring abatement of vegetation which is a fire menace to adjacent improved property will be implemented in all Villages. Details of requirements are provided in Appendix D.

	path 2. Form trea 3. Prepa Rest: 4. "Stul space 5. Fire 3. Lot Own 1. Class 2. Fire 3. House C. Mainten 1. Enfo 2. Mainten 3. Enfo 4. Five	r/Hacking ial constr s and with ation of 1 tment area are Fire S rictions i b roads" of ce areas a e Safe/Sta er s A roofs, scaping Zo e signing ance Entit rcement of tenance of e Areas. rcement of year revi	ruction of hin Open S legal enti as. Safe Coven including connection and adjace aging area enclosed one and fu Y Fire Saf fuel trea Lot Fire	fuel tre pace area ty for ma ants, Con Class A r s and eas nt proper (s) and e eaves, c el treatm e CC&R,s. tment adj scaping Z n Space f	s. intenance ditions a oofs, end ements fo ties. mergency antileven ents with acent to one treat ire hazar	and closures et or access t exit(s). red decks. hin the Lot roads and i	c. o Open	
<u>)</u> .	a	ې مې مېرىكى يې د مېرىكى يې يې مېرىكى يې يې	در در در در در میکرد. در در در در در در میکرد میکرد.	n Na na secondar and a second second	-mour in it - web sectards to est the		all and a second s	the contraction of the contracti
	ม _{สาข} ะคะเหตุญาณี การะ เราะหลื	an a	an lang an on second and second and	n Na Angeleon ang an Na Marang ang K	nar _{an a} t - war gologit - yit tir			an or segment of the marks of
				• • • • • • • • • • • • • • • • • • • •				1
								, energy (1997)

Appendix A.

FIRESCAPING STANDARDS FOR VALLEY VIEW

Firescaping is an approach to landscaping to help protect homes from wildland fires. The goal is to create a landscape that will slow the advance of a wildfire and create a Defensible Space that provides the key point for fire fighting agencies to defend the home. This approach calls for a system of landscape zones surrounding the home. Each zone may contain a balance of native and exotic plants that are fire and drought resistant, will control erosion, and are visually pleasing.

ZONE I (30 feet)

This zone extends to not less than 30 feet from the house in all directions, or to the property line, has the traditional look of irrigated shrubs, flower gardens, trees, and lawns. All dead trees, brush, concentrations of dead ground fuels (tree limbs, logs etc. exceeding 1 inch in diameter) are removed.

Native oaks are permitted in this zone, but must not be within 10 feet of the roof or chimney. All trees are pruned up to 8 to 10 feet above the ground, but no more than 1/3 of the crown is removed.

The plants in this zone are generally less than 18 inches in height, must be slow to ignite from wind blown sparks and flames. Such plants produce only small amounts of litter and retain high levels of moisture in their foliage year around.

Grass growth within this zone must be irrigated or if left to cure must be mowed to a 2 inch stubble, disked, chemically treated or removed. Such treatment must be accomplished by June 1, annually. This zone has built in fire breaks created by driveways, sidewalksetc.

Zone II (80 feet)

This zone adds 50 feet to Zone I and extends to a minimum of 80 feet from the house in all directions and is a wide band of low growing succulents and ground covers designed to reduce the intensity, flame length and rate of spread before a wildfire reaches zone I. Native trees are preserved but are pruned of dead material for 8 to 10 feet, grasses are mowed, disked or chemically treated, shrubs are not to exceed 24 inches in height and placed to create a pleasing look yet slow a fires progress. All dead trees, brush, concentrations of dead ground fuels (tree limbs, logs etc.) exceeding 2 inches in diameter are removed. Irrigation may be necessary to maintain a quality appearance and to retain the retardant ability of the plants. Treatment of herbaceous material must be complete by June 1, annually.

In both zones multi stem Live Oaks must have all dead stems removed and green stems that arch over and are growing downwards to the ground cut off at 8 to 10 feet above the ground.

Regular maintenance is essential in all zones. Litter must be removed, trees pruned and sprouts controlled on a regular basis.

APPENDIX B.

Fuel Reduction Standards for Grass Fuels

	==		
	1.	Annually by June 1, mow grass to a 2 inch stubble treat.	e or chemically
	2.	Prune all green trees in this zone for 8 to 10 f ground but not more than 1/3 of the tree crown.	feet above the
		a. For multi stem Live Oaks; remove all dead st green stems that arch and grow downwards to to 10 feet above the ground.	tems and cut the ground at 8
	3.	Remove all dead trees.	and the second
	4.	Remove any brush.	· · · · · ·
	5.	Remove all ground fuels over 1 inch in diameter etc.).	(limbs, logs
	6.	Do not plant non native trees in this zone.	•
è		•	- x va
	· · · · · · · · · · · · · · · · · · ·		een

13

÷. .

15-0660 D 62 of 288

• •

.

7 2 ...

Appendix C.

Glossary of Fire Management Terms

Defensible Space - The area within the perimeter of an individual parcel, subdivision, or community where basic fire-safe measures are full implemented, thereby providing firefighters the capability of defending the area from an approaching wildfire or of preventing structure fires from escaping the area into adjacent wildlands.

Extreme Fire Behavior - "Extreme" implies a level of fire behavior characteristics that ordinarily precludes methods of direct control action. One or more of the following is usually involved: high rate of spread, prolific crowning and/or spotting, presence of fire whirls, strong convection column. Predictability is difficult because such fires often exercise some degree of influence on their environment and behave erratically, sometimes dangerously.

Fine Fuel - Fast-drying dead fuels, generally characterized by a comparatively high surface area-to-volume ratio, which are less than a quarter inch in diameter. These fuels (grass, leaves, needles, etc.) ignite readily and are consumed rapidly by fire when dry.

Fire Behavior - Manner in which a fire reacts to fuel, weather, and topography; common terms used to describe fire behavior include smoldering, creeping, running, spotting, torching, and crowning.

Firebrand - A piece of flaming or glowing wood, leaf, branch, or other combustible matter that has been caught up in the convection column of a wildfire,, carried upward and forward in the column, and then dropped to the earth's surface far ahead of the main fire front with the potential of igniting a new fire.

Fire Hazard - A fuel complex, defined by volume, type condition, arrangement, and location, that determines the degree of ease of ignition and of resistance to control.

Fire Hazardous Areas - Those wildland areas where the combination of vegetation, topography, weather, and the threat of fire to life and property create difficult and dangerous problems.

Firesafe - The condition of a flammable area (individual parcel, subdivision, or community) or object (home or other structure) that had been rendered reasonably safe from being damaged by wildfire through the implementation of such fire protection measures as correct structure location and construction (design and materials), emergency water reserves, and vegetation modification.

6

14

danger in any area. (2) Any causative agent.

Fire Risk - (1) The chance of fire starting, as affected by the nature and incidence of causative agents; an element of the fire

Appendix C. (continued)

Fireline - Generally, any cleared or treated strip used to control a fire's spread; that portion of a control line from which flammable materials have been removed to mineral soil.

Flammability - The relative ease with which a substance ignites and sustains combustion.

Flame Length - The distance between the flame tip and the midpoint of the flame depth at the base of the flame (generally the ground surface); an indicator of fire intensity.

Fuel - Combustible material. In the case of wildfires, fuel is the combination of flammable vegetation (both dead and living), structures, and other flammable material located in the wildlands.

1

Fuelbreak - Generally wide (60-1000 feet) strips of land on which native vegetation has been permanently modified so that wildfires burning into them can be more readily controlled. Most fuelbreaks contain topography that can be quickly widened with hand tools or by burning out ahead of encroaching wildfire.

Fuel Continuity - Degree or extent of continuous or uninterrupted distribution of fuel particles (surface or aerial) in a fuelbed thus affecting a fire's ability to sustain combustion and spread.

Fuel Loading - Ovendry weight of fuel per unit area (usually expressed in tons/acre). Loading may be referenced by fuel size or drying timelag categories.

Fuel Management - Act or practice of controlling flammability and reducing resistance to control of wildland fuels through mechanical, chemical, biological, or manual means, or by fire, in support of land management objectives.

Fuel Treatment - Any manipulation or removal of fuels to reduce the likelihood of ignition and/or to lessen potential damage and resistance to control (e.g., logging, chipping, crushing, piling and burning).

Fuel Type - An identifiable association of fuel elements of distinctive species, form, size, arrangement, or other characteristics that will cause a predictable rate of spread or resistance to control under specified weather conditions.

Heavy Fuels - Fuels of large diameter (usually three inches or more; e.g., snags, logs, large branchwood) that ignite and burn more slowly than fine fuels.

Appendix C. (continued)

Helispot - Temporary landing location for helicopters, normally constructed on or near the fireline for access of personnel and supplies, and generally without auxiliary facilities and often without road access.

Ladder Fuels - Fuels which provide vertical continuity between strata, thereby allowing fire to carry from surface fuels into the crowns of trees or shrubs with relative ease. They help initiate and assure the continuation of crown fires in the tops of trees or shrubs.

àol

Resistance to Control - Relative difficulty of constructing and holding a control line, as affected by fire behavior and resistance of fuels, topography, and soil to line construction.

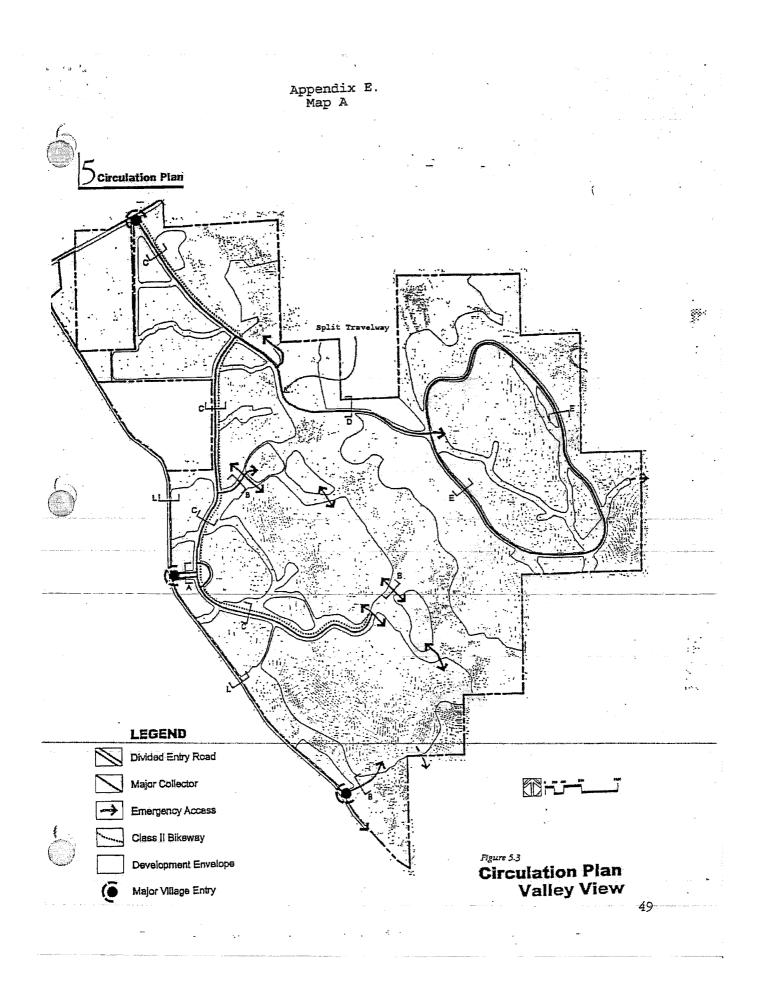
Spot Fire - Fire ignited outside the perimeter of the main fire by flying sparks or embers.

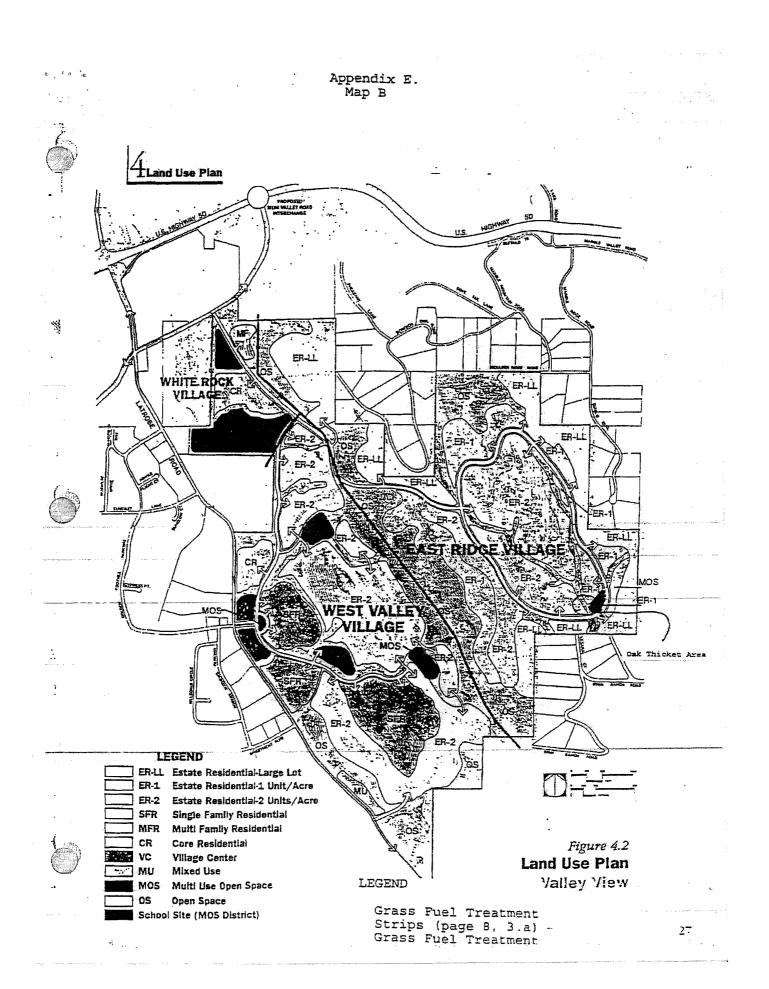
Urban/Wildland Interface - Line, area, or zone where structures and other human development meets or intermingles with undeveloped wildland or vegetative fuels.

Wildfire - An uncontrolled fire burning on wildland that is not meeting management objectives and thus requires suppression.

Wildland - A land area, covered by grass, brush, or timber, that is essentially undeveloped except for roads, railroads, powerlines, and similar infrastructures. Homes and other structures are scattered. Includes cattle ranches and forests managed for timber production, and other uses of natural resources.

15-0660 D 65 of 288





Appendix D.

UNIMPROVED PROPERTY HAZARD REDUCTION REQUIREMENT

DEFINITION

-Weeds: All weeds growing upon streets, sidewalks, or private property, including any of the following:

- a. Weeds which bear seeds of a downy or wingy nature.
- b. Sagebrush, chaparral, and any other brush or weed which analiss such large growth as to become, when dry, a fire menace to adjacent improved property.
- c. Weeds that are otherwise noxious or dangerous.
- d. Poison oak or poison ivy when the conditions are such as to constitute a menace to public health.
- e. Dry grass, stubble, brush, litter, or other flammable materials which endanger the public safety by creating a fire hazard.

CLEARANCE REQUIREMENTS

The intent of this program is to establish a defensible space of 30 feet around all homes, buildings, and combustible fences that abut to unimproved property.

As illustrated on the opposite side, all combustible vegetation that is located within that 30 foot area shall be removed or cut to a maximum height of two inches and shall include the removal of tree limbs to a height of six feet above ground level.

ACCEPTABLE METHODS OF ABATEMENT

Discing: The discs shall be set at an angle sufficient to cut the sod loose and adequately bury the growth of weeds, grass, or noxious vegetation existing at the time. Discing shall include rototilling or cultivating. Discing shall be done each time the growth exceeds 6 inches in height.

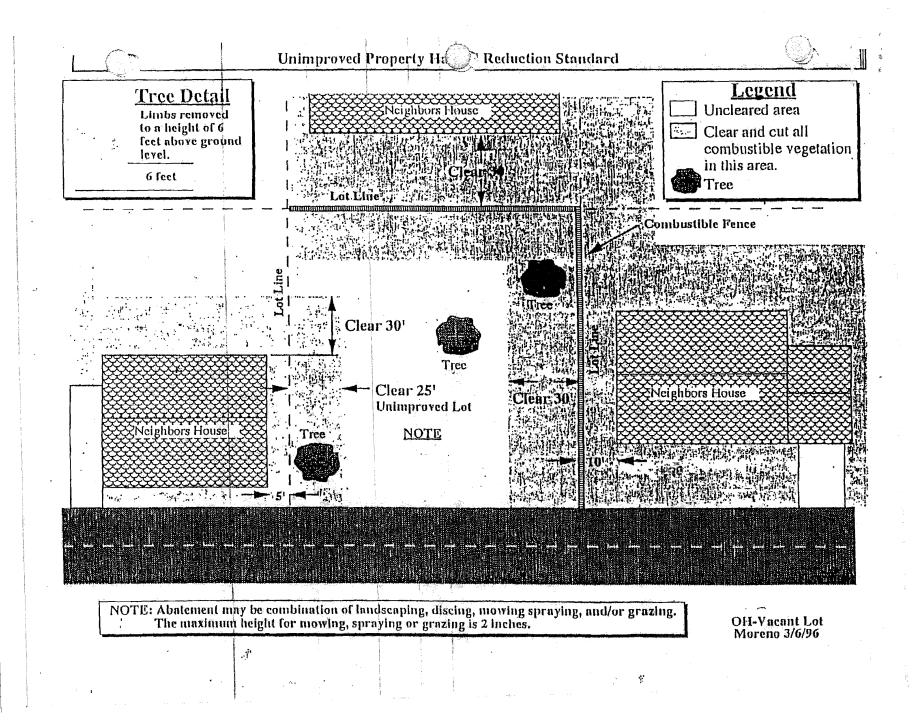
Scraping: Area shall be scraped clear, and all debris removed from the required 30 foot clear area.

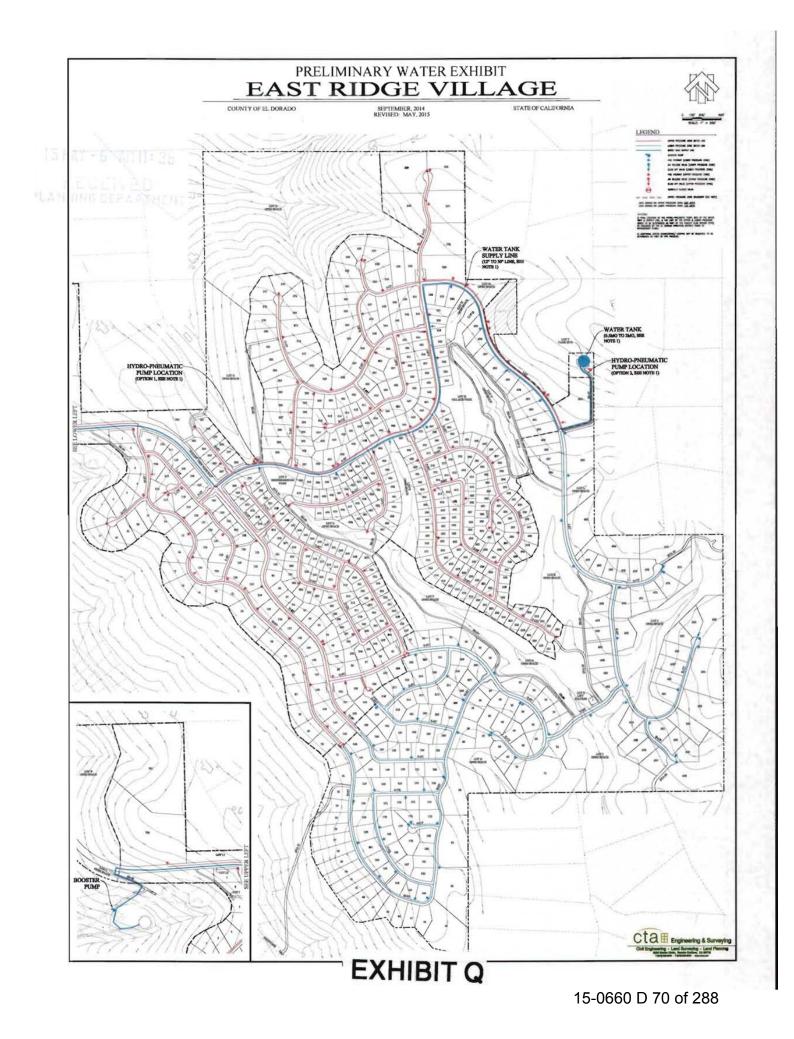
Mowing: Height of vegetation shall not exceed two inches at completion. Mowing shall be done each time growth exceeds six inches in height. Mowing shall include handoperated weedeaters, flail, and rotary mowers.

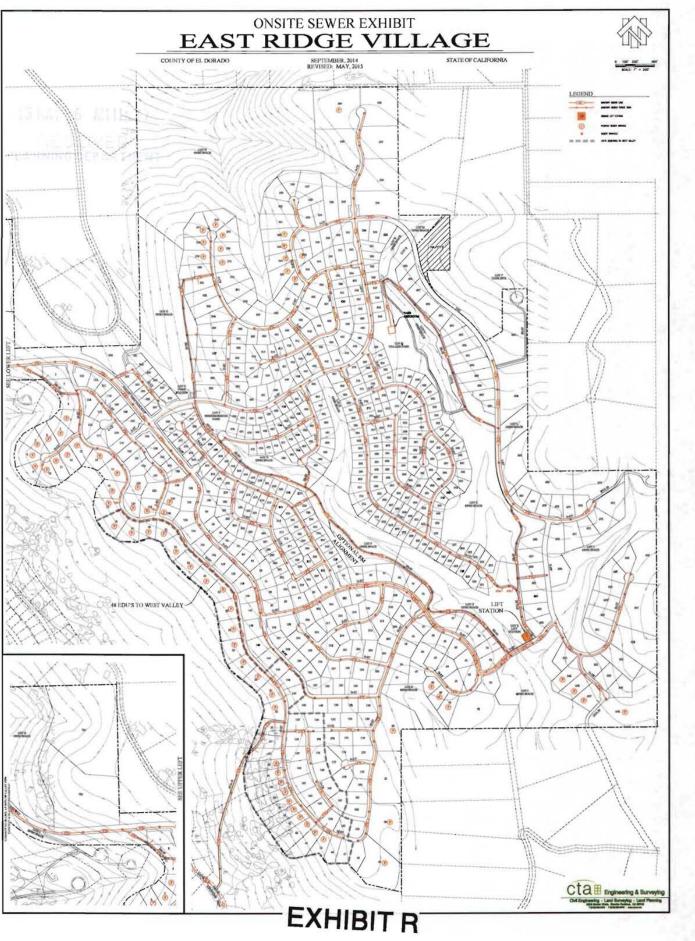
Spraying: Spraying of herbicides and pre-emergents shall not be considered an acceptable method of weed abatement. If used prior to growth of vegetation, preventing growth of vegetation, then this will be considered an acceptable method of abatement.

DEBRIS REMOVAL

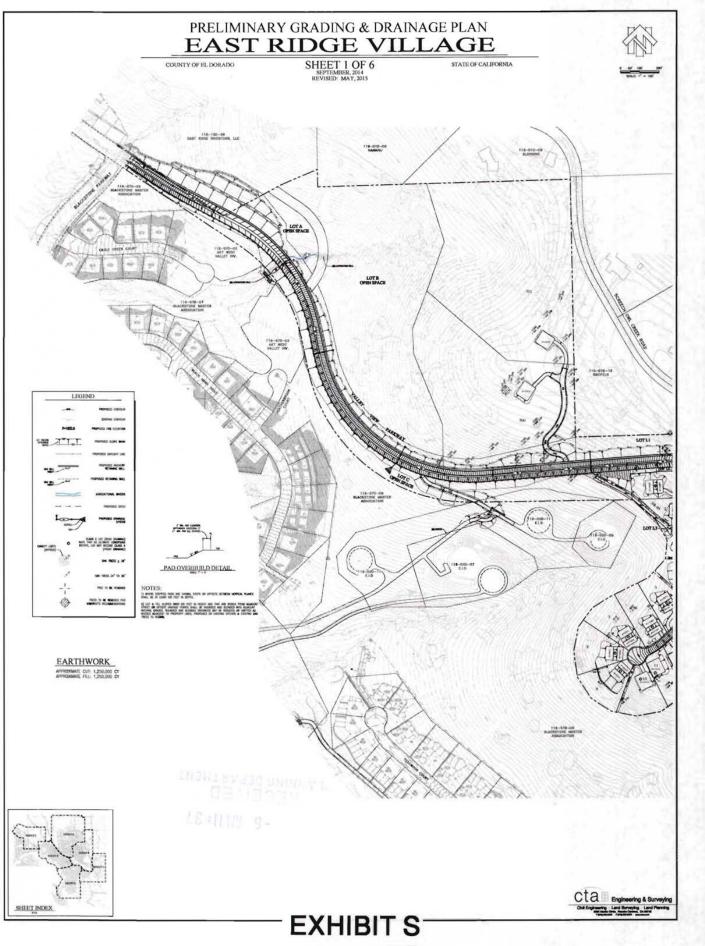
All brush or woody vegetation debris shall be chipped or removed from the property. Any non-vegetative debris (i.e. construction) shall be removed from the property



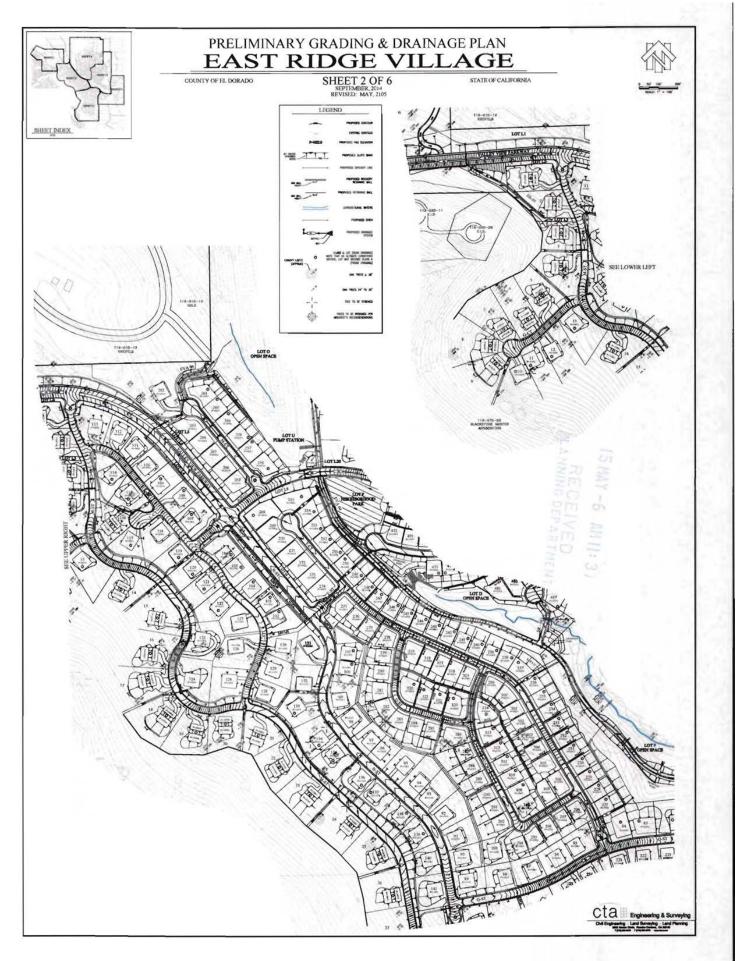




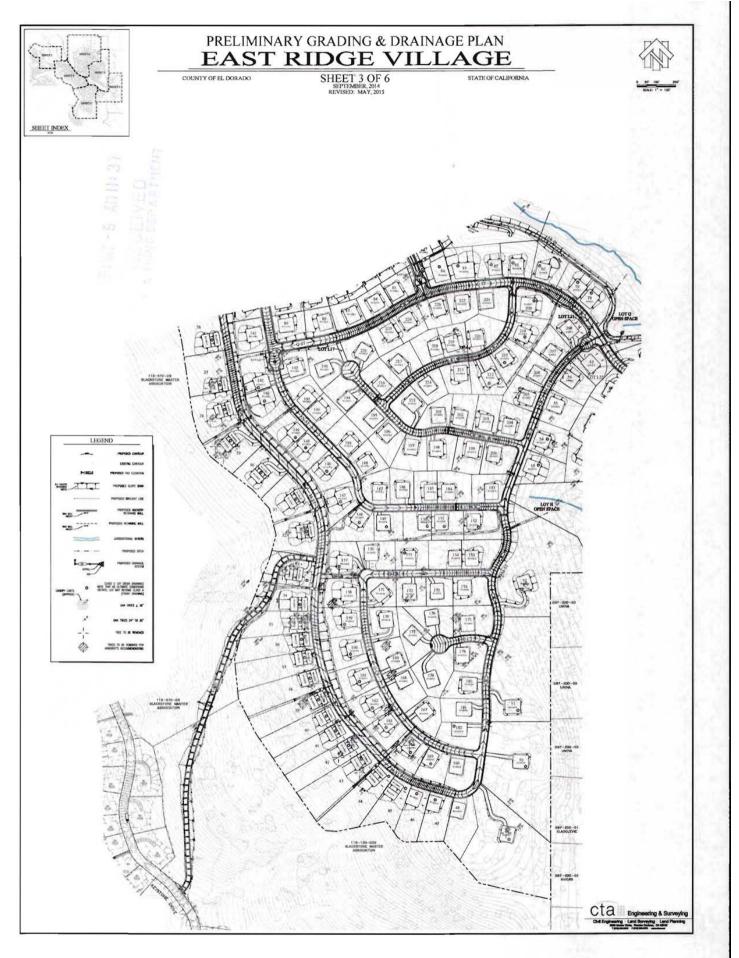
15-0660 D 71 of 288

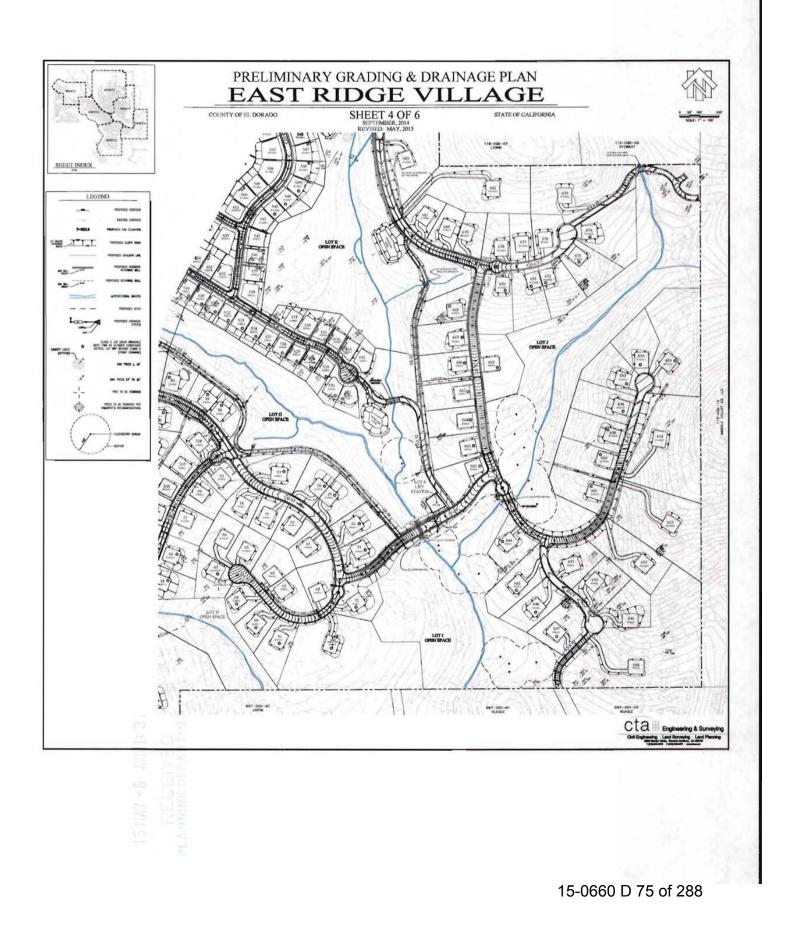


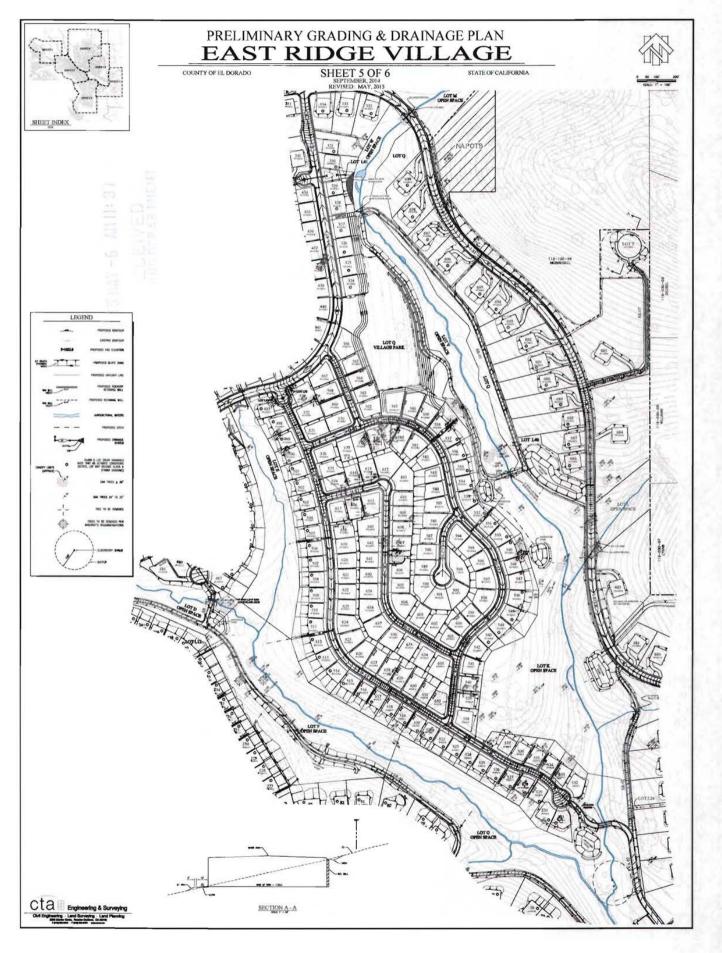
15-0660 D 72 of 288



15-0660 D 73 of 288







15-0660 D 76 of 288

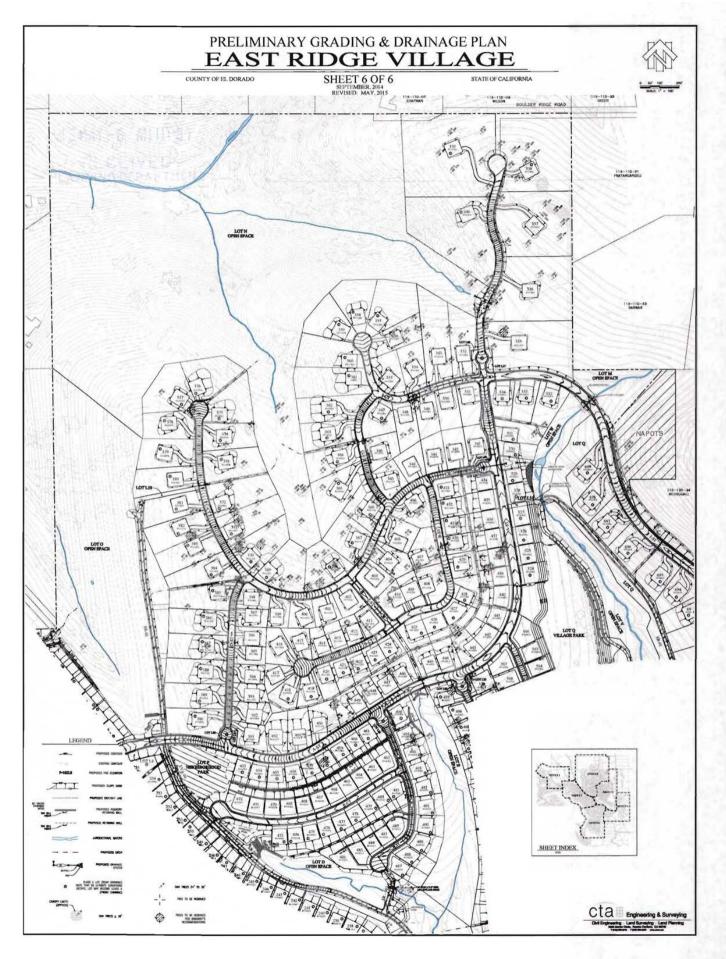
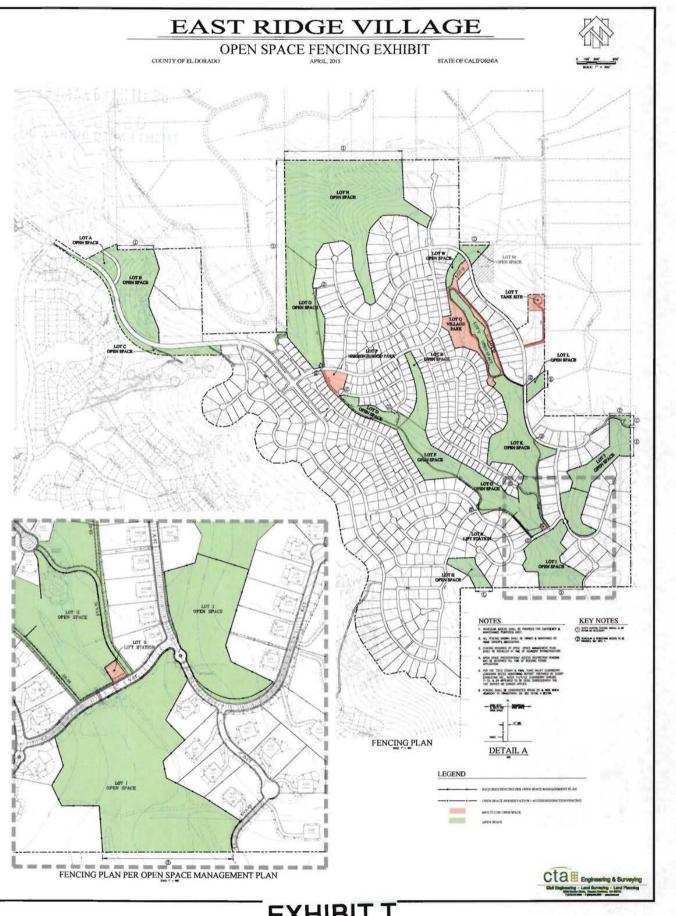




EXHIBIT T



The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

	•			M	ONITORING	_	VERIFICATIO	N OF APPLICATION TO EAST RIDGE
	IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	A. LAND USE FACTORS							
EXHIBIT	Impact LU-1: Project Impacts on El Dorado Hills Open Space and Rural Character. Although the entire project site is designated for urban uses in the recently updated <u>El Dorado County General</u> <u>Plan</u> , approval of the project would nevertheless facilitate an irreversible loss of approximately 1,478 acres of existing open space onsite and would contribute significantly to the continued urbanization of El Dorado Hills and western El Dorado County. These project land use changes would result in a substantial and irreversible change in the rural character of the project vicinity.	Mitigation Measure LU-1. Because new open space cannot feasibly be created to replace the open space that would be developed, the open space loss and associated loss of rural character impacts of the project could not be reduced to a less than significant level. Application of the visual impact mitigation measures identified in the Visual Factors section of the EIR (section IV.B) would reduce the visual aspects of project-related open space and rural character losses, but not to a less-than- significant level. SIGNIFICANT AND UNAVOIDABLE	EDC	SSR; CPI	PTM; PFM; PPO	EDCPD	Yes. Satisfied	The specific plan identified East Ridge OS area with 127.6 acres with Multiuse Open Space (MOS) of 10 acres. The proposed project has an OS area of +/- 193 acres with MOS of 12 acres.
Ξ.	Impact LU-2: Compatibility Impacts Related to the El Dorado Hills Wastewater Treatment Plant. The proposed Specific Plan calls for construction of: (1) a 52-acre community park north of the existing El Dorado Hills Wastewater Treatment Plant, (2) Core Residential uses permitting six dwelling units per acre south of the plant, and (3) Estate Residential uses permitting two dwelling units per acre east of the plant, with the latter two uses separated from the plant by a major collector road. There is a potential for odor intrusion from the treatment plant to be a nuisance to the future occupants of these adjacent recreational and residential areas, although this potential could be reduced with the anticipated installation of odor control measures	Mitigation Measure LU-2. Implement <i>Mitigation</i> <i>Measure AQ-4</i> , as described in the Air Quality section of the EIR (section IV.I), which provides for an adequate buffer between the treatment plant and the proposed housing, and proper noticing of potential future project occupants.	Appl.	SSR	PTM	EDCPD	Yes. Satisfied.	Noticing of the WW treatment to future residents of the East Ridge Village project will be provided as a disclosure. The 300-foot buffer has been satisfied with the WVV project as described in MM AQ-4.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
to be funded through the proposed Assessment District 12.								
Impact LU-3: Land Use Compatibility Impacts on Adjacent Mobile Homes. The specific plan proposes a school site, a <i>Core Residential</i> area (six dwelling units per acre), a 52-acre community park, and an approximately 80-foot strip of permanent open space adjacent to the existing mobile home park east of the project site. The proposed open space and <i>Core</i> <i>Residential</i> uses would be compatible with the mobile homes. However, depending upon the design of the school and community park, there would be a potential for land use conflict with the mobile home park related to noise intrusion from the school, and noise and nighttime lighting associated with the community park playing fields (i.e., soccer and baseball fields)	Mitigation Measure LU-3. The applicant shall work with the El Dorado Hills Community Services District to develop a community park plan that either (1) locates playing fields at least 300 feet away from the closest mobile home <u>or</u> (2) limits use of closer playing fields to daytime hours only, in order to avoid nighttime noise and lighting impacts. The future developer of the school site shall work with the Buckeye Union School District to develop a school plan that either (1) avoids potential noise impacts on the mobile homes by locating any playing fields that may be proposed as part of the site plan at least 300 feet away from the closest mobile home, <u>or</u> (2) limits use of closer playing fields to daytime hours only, in order to avoid nighttime noise and lighting impacts.	Аррі	SSR	РТМ	EDCPD	No. Satisfied.	East Ridge does not include the 52-acre MOS, which is designated and located within the White Rock Village.	
B. VISUAL FACTORS			<u>i</u> 1					
Impact V-1: Change in Natural Landscape and Rural Visual Character. The project would convert the existing open, rural, oak-studded site to a developed community with large lot and ranchette residential, suburban residential, institutional (schools), and commercial structures, roadways, water tanks, and introduced landscaping. Development permitted under the Specific Plan would substantially and negatively detract from existing surrounding views of the site and from the distinct natural	Mitigation Measure V-1: Enhance Specific Plan Design Controls. Incorporation of the additional design standards and guidelines listed in section IV.B.4 of the EIR would reduce the overall impact of the project on the natural landscape and rural character, although not to a less-than-significant level. Any substantial change in the site's existing visual character from open grazing land to suburban land uses, with the conventional development layouts provided for under the proposed Specific Plan, could be expected to substantially change the	EDC	SSR	PFM <u>PTM</u>	EDCPD	Yes. Satisfied.	This mitigation measure has been met with application of Conditions 6, 28, and 33 of the Specific Plan. Language has been added to the Specific Plans Chapters 8 and 9. An Oak Tree Protection Plan has been prepared and submitted with the Tentative Map. The development envelope plans have been prepared and	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.	
	_

			M		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
and rural character of the area.	 distinct natural rangeland features of the site, reduce the visual integrity of its hillsides and ridgelines, and thus have a substantial negative aesthetic effect. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that compliance with item (a) (Landscape and Vegetation Management Plan) of this mitigation measure would be achieved through Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1 to be submitted with tentative map application" and specifies the following revision to the Specific Plan: p.77 Under Development Requirements Within Oak Woodlands add: 5. All trees above 24" in diameter at breast height shall be shown on the plan. If any trees 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process. 						submitted. The primary site location study was based upon the clustering, surveyed trees, site layout, utility constraints and grading.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and <u>underline</u> text.

			м	ONITORING	VERIFICATION OF APPLICATION TO EAS RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	Under Oak Tree Conservation Program, add:						
	A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with tentative map application.)						
	Condition #6 of the Valley View Specific Plan Conditions of Approval also indicated that items (b) and (c) of this mitigation measure, regarding vegetative screening and architectural standards and landscaping controls, are addressed in the revised Chapters 8 and 9 of the Specific Plan.						
	In addition, Condition #33 adds language to page 90 of the Specific Plan that insures conformance with the intent of Mitigation Measure V-1:						
	p.90 Under Building Location - Primary Ridgeline, change as follows:						
	(5) A primary building area location study should be undertaken as a part of the tentative map review. The site location study would evaluate slope, vegetation, view exposure from below, adjacent residential massing and access together						

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

identifying the optimal building location and envelope, the primary building area

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.		-				1	
			M	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	shall be designated on the building envelope diagram.						
	(6) The view from U.S. 50 and Latrobe Road shall be preserved by restricting building height and location along the East Ridge primary ridgeline such that no architectural feature shall exceed the height of the rideline or contiguous tree canopy. When tree canopy or trees are not present within 100 feet of the building site, building height shall not project above the ridgeline. "Ridgeline" shall be defined as the top, or peak of the ridge. Where tree canopy exists, the ridgeline includes the tree canopy." SIGNIFICANT AND UNAVOIDABLE						
Impact V-2: Impact on Views from Highway 50 Eastbound. Similar to Impact V-3, substantial portions of the proposed Specific Plan development areas would be briefly visible from the eastbound Highway 50, including foreground portions of White Rock Village and more distant portions of West Valley Village (nearly all of this area) and East Ridge Village (the west-facing upper hillsides and ridgeline development areas).	Mitigation Measure V-2. In order to reduce the visual impacts of the project from this highway vantage point, the applicant shall implement the mitigation measures listed for this impact in section IV.B.4 of the EIR, including enhanced Specific Plan design controls and relocation of the most visible hillside units. (Note: Condition #1 of the Valley View Specific Plan Conditions of Approval (approved by the EI Dorado County Board of Supervisors on December 8, 1998) modified this mitigation measure by replacing the provision regarding relocation of visible hillside ER-LL units (item (b)) with the	EDC	SSR	PTM; PFM	EDCPD IMPLEMENTED THROUGH SPECIFIC PLAN	No. Satisfied.	This mitigation measure was satisfied by the Specific Plan Condition 1 and applies more specifically to the White Rock Village Hillside ER-LL land use area.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and <u>underline</u> text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			N	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	following:							
	The Land Use Plan shall be amended to reflect a partial reduction of the ER-LL designation in exchange for more open space as shown on Exhibit A of the staff report dated November 19, 1998, on file in the Planning Department. Additional lot design and architectural criteria shall be added to the Specific Plan text as follows: p.91 After end of Building Location - Primary Ridgeline, add new section and additional design criteria as follows. Also add Exhibit B as an additional figure to illustrate concept. White Rock Hillside Additional Design Criteria The following design criteria applies exclusively to development of the ER-LL lots located on the immediate knoll at the northwestern section of							
	White Rock Village, just southeast of the Multiple Family Residential (MF) designated area. 1. The lot configuration shall take a radial form with the center being the top of the							
	ridge. 2. Homes shall be located at the uppermost							

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative

Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.			M	IONITORING		VERIFICATION OF APPLICATION TO EAST		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	elevation of the lot, forming a "clustered" pattern of architectural massing							
	 To minimize unsightly massing in relation to slope, no building pads shall be located on slopes exceeding 25%. 							
	 Homes located on slopes between 15% and 25% shall "step up" the slope and provide a one story downhill massing element at least 12 feet in depth. 							
	 No more than 25% or 12,000 square feet of the lot shall be improved or graded. 							
	 Lot line fencing shall be limited to within 75 feet of buildings. 							
	 Architectural styles for homes in this area shall be of a Ranch, Prairie or other style that is characterized by horizontal lines, flat roof pitches and moderate to dark earth tone colors. 							
	 Exterior walls shall be darker in tone utilizing earth tones such as brown, tan, green or warm gray. Flat white shall not be used except for trim. Natural appearing roof materials, such as 							

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.										
			MONITORING				VERIFICATION OF APPLICATION TO EAST RIDGE			
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl.	Type of	Timing	Monitoring and	MM Applies to East Ridge? (Yes				

Entity¹

fire retardant shakes, flat tiles, slate, barrel tiles, should be utilized to create a diverse, rich visual character, Roof colors should be darker than wall colors. 10. Grading shall be feathered out around all edges of the cluster so that after revegetation has been completed, no

scarring is evident. Condition #6 of the Valley View Specific Plan Conditions of Approval also indicated that item (a) of this mitigation measure, regarding enhancement of Specific Plan design controls, is addressed in the revised Chapters 8 and 9 of the Specific Plan. SIGNIFICANT AND UNAVOIDABLE

Mitigation Measure V-3. Same as Mitigation

(Note: Condition #6 of the Valley View Specific Plan

Conditions of Approval (approved by the El Dorado

County Board of Supervisors on December 8, 1998)

the revised Chapters 8 and 9 of the Specific Plan.)

SIGNIFICANT AND UNAVOIDABLE

indicated that this mitigation measure is addressed in

Measure V-2 above.

Monitoring

Action

SSR

EDC

PTM:

PFM

Requirements³

Verification

Entity⁴

EDCPD

IMPLEMENTED

SPECIFIC PLAN

THROUGH

or No);

Satisfied/

Partly Satisfied

Yes. Satisfied

Note

This mitigation measure has

with the approved Specific

Plan Chapters 8 and 9.

been satisfied with Condition 6

changes in the existing open space character of	
1 Appl. = Applicant: EDC = El Dorado County	

Impact V-3: Impact on Views from El Dorado

Highway 50. Views of the project site from the

project buildout. A limited number of residential

lots atop the intermediate knoll at the northern

Hills Community Vantage Points North of

existing El Dorado Hills community north of

Highway 50 would change substantially with

edge of East Ridge Village (two such lots are

assumed in the simulation) would be highly

visible from this vantage point. Much of the development proposed for lower elevation West Valley Village and White Rock Village development areas would also be visible. These

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department: EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
these visual units would negatively affect existing views of the site.								
Impact V-4: Impact on Views from Latrobe Road. The view of the project site from Latrobe Road near Golden Foothill Parkway would also change dramatically with buildout of the project. Existing open views of the broad, oak-scattered Valley View rangeland scattered with oaks would be replaced with foreground views of West Valley Village development. The commercial buildings, residential buildings, walls, and roadside landscaping visible along the east edge of Latrobe Road would act as a barrier to views of the onsite hillsides and ridgeline (see Figure 8 in section IV.B.4 of the EIR). The uniform pattern of introduced, densely-planted peripheral trees at the Village Center entrance would bear little resemblance to existing native vegetation characteristics of the area. These changes would substantially and negatively affect existing views of the site.	Mitigation Measure V-4. In order to reduce the visual impacts of the project from Latrobe Road vantage points, the applicant shall be responsible for implementing the mitigation measures identified under Mitigation Measures V-1 and V-2, above, as well as the additional streetscape design control measures listed for this impact in section IV.B.4 of the EIR. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the EI Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed in Chapter 5 of the Specific Plan.)	EDC	SSR	PTM; PFM	EDCPD IMPLEMENTED THROUGH SPECIFIC PLAN	Yes. Satisfied.	This mitigation measure has been satisfied with Condition 6 with the approved Specific Plan Chapters 8 and 9.	
Impact V-5: Visual Impact of Wastewater Treatment Plant. The El Dorado Hills Wastewater Treatment Plant is located adjacent to the western boundary of the project site. The proposed Specific Plan community park, and areas designated <i>Estate Residential</i> and <i>Core</i> <i>Residential</i> , could have potentially unattractive views of the treatment plant facilities.	Mitigation Measure V-5. Implementation of Mitigation Measure LU-3 in the Land Use section of the EIR (section IV.A), including landscaped buffers and proper noticing of potential future project occupants, would reduce this visual impact. In particular, provision of landscape screening in the recommended 300-foot buffer area would be expected to reduce views of the treatment plant from the community park and Core Residential area.	EDC	SSR, CPI	PTM; PFM; PPO	EDCPD IMPLEMENTED WITH APPROVAL OF TM99-1359-R (WEST VALLEY TENTATIVE MAP) AND TMO6-1409	No. Satisfied	This mitigation measure has been satisfied with the approval of West Valley Village Tentative Map (TM99-1359-R) AND West Valley Village Y and Z (TM06- 1409).	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

Impacts.			Μ	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	For the substantially higher elevation of the <i>Estate</i> <i>Residential</i> area in relation to the plant, require onsite vegetative screening for lots on the northern edge of that neighborhood to effectively block views of the plant.				(UNITS Y AND Z)			
Impact V-6: Light and Glare Impacts. The project would introduce exterior nighttime lighting to the site, as well as structures that may contain glare-producing materials. Such lighting could change nighttime views of the site from surrounding vantage points, and could illuminate the nighttime sky. These changes could adversely affect views from the existing El Dorado Hills community north of Highway 50, views from Highway 50 itself, and views from surrounding rural residential properties to the north, south, and east. The Specific Plan includes some guidelines to limit these impacts.	Mitigation Measure V-6. The applicant shall incorporate the measures listed for this impact in section IV.B.4 of the EIR into the Specific Plan and the project CC&Rs, in order to reduce light and glare from the project. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed in Chapter 9 of the Specific Plan.)	EDC	SSR, CPI	PPO	EDCPD IMPLEMENTED THROUGH SPECIFIC PLAN	Yes. Satisfied	This mitigation measure has been satisfied with Condition 6 with the approved Specific Plan Chapters 8 and 9.	
Impact V-7: Village Center Signage Visual Impacts. The Specific Plan does not contain guidelines for commercial area signage. Use of intensive neon, internally-lit, plastic, blinking, brightly-colored, and/or oversize signs could adversely affect the visual character of the area, and views from surrounding vantage points, including Highway 50.	Mitigation Measure V-7. In order to avoid adverse signage-related visual impacts, the applicant shall be responsible for revising the Specific Plan to include the signage controls listed for this impact in section IV.B.4 of the EIR, in order to prohibit unattractive, conspicuous signs. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that compliance with this mitigation measure would be achieved through condition #35,	EDC	SSR, CPI	PPO	EDCPD IMPLEMENTED THROUGH SPECIFIC PLAN	Yes. Satisfied.	This mitigation measure has been satisfied with Condition 6 and 35 with the approved Specific Plan Chapters 8 and 9.	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

IDENTIFIED IMPACT		1	14	ONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	which specifies the following revision to the Specific Plan:						
	p.94 Add prior to Fencing: Sign Guidelines:						
	 Freestanding Commercial and Office Identification Signage: Free standing pole signs are prohibited. At each street entrance to the Village Center, one detached sign on each side of the street shall be permitted. The information displayed on the signs shall be limited to the name and symbol or logo of the center. No advertising should be permitted on these signs. Such signs shall be low-profile signs less than 6 feet in height with maximum message areas of approximately 100 square feet. Such signs shall be located in the landscape setback at least 10 feet from the street right-of-way line and comply with site distance requirements. Wood and other natural earth materials such as concrete, aggregate, stone, brick, 						

. - 4 - 1 ---- 747 ---- 47 . 1...1 . . . 1 . . . 41. ~ ____ _____

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = EI Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			M	IONITORING		VERIFICATION OF APPLICATION TO E		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	these signs. Predominantly plastic signs							
	shall not be permitted. Signs shall be							
	integrated with landscaping.							
	Detached Business Identification Signs							
	One detached sign shall be permitted on							
	each development site for the purpose of							
	identifying the occupant of occupants of							
	the site. The information displayed on							
	these signs shall be limited to the name							
	and symbol of the business or businesses							
	occupying the site or the name and							
	symbol of the business or businesses							
	occupying the site and the street and							
	street number. No advertising shall be							
	permitted on these signs.							
	 Signs shall be less than 4 feet in height 							
	with a maximum message area of 32							
	square feet. When multiple businesses							
	are proposed to occupy a single site, signs							
	may be 6 feet in height with a maximum							
	message area of 40 square feet.							
	Wood and other natural earth materials							
	such as concrete, aggregate, stone, brick,							
	slumpstone, or other acceptable building				1			
	materials for these signs. The choice of materials should match major building							
	materials. Signs shall have back lighting	1						

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.		1					
			Μ	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	or be externally illuminated. District identification signs shall not be combined with business identification signs.						
	Mounted Business Identification Signs						
	 One mounted sign shall be permitted on each structure or, in the case of multiple businesses in a single structure, the wall frontage for that business, for the purpose of identifying the occupant. The information displayed on this sign shall be limited to the name and symbol of the occupant and address. Mounted signs attached to vertical surfaces of a building or building-associated wall shall be allowed, with the provision that such signs appear as an integral part of the overall architectural and site design concept. Sign materials shall complement those of the structure to which they are attached. The attached sign area shall not exceed three percent (3%) of the total area of the walls on any face of the building to which they are attached. 						
C. TRANSPORTATION							
Impact T-1: Existing-Plus-Project Impact on Latrobe Road/Golden Foothill Parkway South Intersection. This T-intersection currently operates at LOS A. The addition of a two-lane project access road as a fourth leg of the	Mitigation Measure T-1. Widen Latrobe Road to provide two southbound and one northbound left- turn lanes. At the project entrance/exit, provide two lanes in each direction, including a separate right- turn lane. The intersection shall also be signalized.	EDC .	отс	ΡΡΟ	EDCDOT COMPLETED CIP 72335	Yes. Satisfied.	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts. VERIFICATION OF APPLICATION TO EAST MONITORING RIDGE **MM** Applies to East **RELATED MITIGATION MEASURES (MM)** Monitoring **IDENTIFIED IMPACT** Type of Ridge? (Yes (OR CHANGE TO THE SPECIFIC PLAN) Impl. Timing and Monitoring or Nol: Note Entity Requirements³ Verification Satisfied/ Action Entitv⁴ Partly Satisfied intersection, and the corresponding traffic These improvements would alleviate the congestion Planning and Management addition on the east side of Latrobe Road, would at this intersection and allow the intersection to Inc., November 2014) and cause conditions in the PM peak hour to operate at acceptable levels of service with the work was completed with the CIP 72335 and 72403. Also, deteriorate to LOS F. project. was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit. Mitigation Measure T-2. Mitigate the project impact Impact T-2: Existing-Plus-Project Impact on FDC OTC PPO EDCDOT Yes, Satisfied This mitigation measure has Latrobe Road/White Rock Road Intersection. to this signalized intersection by making changes to been satisfied with the This intersection currently operates at LOS B in COMPLETED the lane configuration. On Latrobe Road, provide approved Supplemental Traffic the AM peak hour and LOS C in the PM peak two through lanes in each direction from White Rock CIP 72402 Impact Analysis: East Ridae hour. Conditions would deteriorate to LOS F Road to south of Golden Foothills Parkway in order Village (T.Kear Transportation during the PM peak hour with the project. to mitigate all project impacts. In addition, provide a Planning and Management second southbound left turn lane on the Latrobe Inc., November 2014) and Road approach to this intersection. Provide a leftwork was completed with the turn lane for eastbound White Rock Road. These CIP 72401 and 72402. Also, improvements would allow the intersection to was verified by County staff operate at acceptable levels of service with the per our MM meeting held on project. 12/30/14. Project to pay TIM fees at the time of Building Permit. Impact T-3: Existing-Plus-Project Impact on El Mitigation Measure T-3. The County has EDC OTC PPO EDCDOT Yes, Satisfied This mitigation measure has Dorado Hills Boulevard/Highway 50 Westbound COMPLETED programmed a comprehensive improvement to the been satisfied with the Ramps Intersection. This intersection currently US 50/El Dorado Hills Boulevard interchange as part CIP 71322 approved Supplemental Traffic operates at LOS C during the AM peak hour and of its current El Dorado Hills/Salmon Falls Roadway Impact Analysis: East Ridge LOS B during the PM peak hour. Addition of Improvement Fund (RIF). The improvement is Village (T.Kear Transportation project traffic would cause deterioration to LOS F currently fully funded (it is included in the County's Planning and Management during the AM peak hour. current Five-year Capital Improvement Program). Inc., November 2014) and Construction is expected to begin in 2001. A new work was completed with the

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

impacts.			M	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	ramp will be added to provide for westbound traffic, and additional capacity will be added to the existing ramp. The combination of improvements will produce LOS C operations at this intersection in the AM peak hour and LOS B in the PM peak hour, which will satisfy County LOS policy. This RIF-funded improvement will more than mitigate the project impacts. The project is subject to County RIF requirements. All future project development will be required to make RIF payments.						CIP 71322. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.	
Impact T-4: Existing-Plus-Project Impact on Latrobe Road/Highway 50 Eastbound Ramps Intersection. This intersection currently operates at LOS E during the AM peak hour and LOS F during the PM peak hour. Addition of project traffic would exacerbate the existing LOS F conditions during the PM peak hour and would also cause deterioration to LOS F during the AM peak hour.	Mitigation Measure T-4. As indicated above under Mitigation Measure T-3, the County has programmed and funded a comprehensive improvement to the US 50/EI Dorado Hills Boulevard interchange through the County's RIF program. The improvement will add a new widened off-ramp for eastbound traffic oriented toward destinations to the south; it will also widen the existing off-ramp and dedicate it to eastbound traffic oriented to the north. The combination of improvements will produce LOS C operations at this intersection, which will satisfy County LOS policy. This funded improvement will more than mitigate the project impacts. The project is subject to County RIF requirements. All future project development increments will be required to make RIF payments. It is possible, however, that portions of the Valley View project would be completed before <u>construction</u> of this improvement (scheduled to begin by 2001) is completed.	EDC	отс	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved <i>Supplemental Traffi</i> <i>Impact Analysis: East Ridge</i> <i>Village</i> (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 71322. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental imnacte

			M			VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Latrobe Road/Suncast Lane Intersection. This intersection is currently stop-sign controlled and operates at LOS A. Addition of project traffic would reduce the number of available gaps in traffic along Latrobe Road, resulting in LOS F conditions during the PM peak hour when vehicles would have a difficult time turning left from Suncast Lane onto Latrobe Road or from Latrobe Road onto Suncast Lane.	mitigation measure for this condition would be to install a traffic signal, but the standard Caltrans Peak Hour warrant for installation of a traffic signal is not met by the volumes projected at this intersection for the "Existing-Plus-Project" scenario. However, the signal WOULD be warranted under the "Cumulative- Plus-Project" scenario. Thus, the required mitigation at this location for the "Existing-Plus-Project" scenario shall be to monitor the location on a periodic basis, in conjunction with the issuance of building permits. If standard County signal "warrants" is satisfied by some combination of future traffic, then installation of a signal shall be required to mitigate this impact, and the project shall be assessed for a proportional share of the cost of the signal.				COMPLETED		been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 72403. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-6: Existing-Plus-Project Impact on Latrobe Road South of White Rock Road. The segment analysis indicates that the Service Level on this portion of Latrobe Road would decrease from LOS D to F on a daily basis.	Mitigation Measure T-6: Widen Latrobe Road to four lanes (plus turning lanes as noted in the previous mitigation measures) from White Rock Road to a point 300-500 feet south of White Rock Road. South of this point, the road could revert back to a two-lane cross-section. The RIF currently includes, and is periodically revised to fully fund, this County roadway improvement. The project is subject to County RIF requirements. All future project development will be required to make RIF payments.	EDC	ΟΤC	PPO	EDCDOT COMPLETED CIP 72335	Yes. Satisfied	This mitigation measure has been satisfied with the approved Traffic Study and work was completed with the CIP 72335, 72401, and 72402. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-7: Existing-Plus-Project Impact on US 50 West of El Dorado Hills Boulevard/Latrobe Road: US 50 west of El Dorado Hills Boulevard currently operates at LOS D. The "Existing-Plus-	Mitigation Measure T-7: Mitigation of this impact is largely an issue of project phasing. An impact identified later in this section for the "Cumulative- Plus-Project" scenario (<i>Impact T-16</i>) requires that the	EDC	SMS	РТМ	EDCDOT CONSTRUCTIO N TO SIX LANES	Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Project" scenario would produce an LOS F on this portion of the freeway. As noted above, this condition represents a hypothetical "Existing- Plus-Project" scenario, developed to isolate potential project-related mitigation needs. In actuality, as other land uses are developed over the extended time period that the Valley View project is actually developed, it is expected that more traffic would be oriented to local land uses rather than toward Sacramento. Thus, it is not likely that the conditions forecast here will actually lead to an LOS F condition solely due to the impacts of the Valley View project.	developer conduct interim traffic studies for submittal to the EI Dorado County DOT together with each application for tentative map approval of future phases of the project. This interim study requirement is consistent with General Plan policy and will assure that County standards are maintained at each future project phase as well as for the total project. The County's State System Capacity and Interchange Transportation Impact Fee (State TIM) has been established to provide fair share developer contributions to partially finance improvements to County segments of the state highway system. The state TIM currently includes, and is periodically revised, to partially fund the widening of Highway 50 to six lanes by 2010 and eight lanes by 2015. The project is subject to County TIM requirements. All future project development will be required to make TIM payments.				COMPLETED		Village (T.Kear Transportation Planning and Management Inc., November 2014) required under MM T-16. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-8: Cumulative-Plus-Project Impacts on White Rock Road/North Project Access Intersection. An unacceptable year 2015 level of service (LOS F) is projected at the White Rock Road/North Project Access intersection.	Mitigation Measure T-8. Signalize the intersection and provide a right-turn lane for the eastbound approach and a left-turn lane for the westbound approach. If an entrance to Town Center East is provided opposite this project entrance, also provide an eastbound left turn lane. The exit from the project shall have two lanes, one for left turns and one for the remaining movements. (See Figure D-20 in section IV.D.5 of the EIR.) This improvement would alleviate congestion at the intersection and allow it to operate at LOS B.	EDC	отс	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed at this intersection. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = EI Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental imnacts

impacts.		1				VEDIEICATIO	
			м	ONITORING			N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Impact T-9: Cumulative-Plus-Project Impact on Latrobe Road/Golden Foothills Parkway South/Project Access Intersection: The addition of project traffic to projected year 2015 cumulative intersection volumes would result in unacceptable levels of service on the Latrobe Road/Golden Foothills Parkway South/Project Access intersection. Without the project, this intersection would operate at LOS A in the AM peak hour and LOS B during the PM peak hour. With the project and its associated traffic, this intersection would degrade to LOS F during both peak hours.	Mitigation Measure T-9: As with the "Existing-Plus- Project" scenario, provide a new traffic signal at this intersection. The "Cumulative-Plus-Project" scenario requires that the project entrance have two inbound and two outbound lanes. One of the outbound lanes will need to be striped as an exclusive right-turn-only lane. The mitigation will also require the widening of Latrobe Road to provide for two southbound left- turn lanes and one northbound left turn lane. In addition, widen the northbound departure on Latrobe Road to provide an exclusive right-turn and two through lanes northbound; one of these lanes will be the natural continuation of the exclusive right-turn lane from the project. This two-lane section will then continue north as far as White Rock Boulevard, as described in <i>Mitigation Measure T-13</i> below. This improvement would alleviate the congestion at the intersection and allow it to operate at LOS C.	EDC	OTC	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 72335 and 72403. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-10: Cumulative-Plus-Project Impact on White Rock Road/Latrobe Road Intersection. This intersection is projected to operate at LOS F under the "Cumulative-Plus-Project" scenario in both peak hours. The project would add traffic to an intersection already projected to operate at LOS F.	Mitigation Measure T-10. This intersection is projected to operate at LOS F in the peak hours for the <u>base</u> (cumulative-without-project) scenario. To mitigate the project impacts: widen Latrobe Road to provide two northbound and southbound through lanes, one northbound and southbound left turn lane, and one northbound and southbound right turn lane; widen White Rock Road east of Latrobe Road to become a four-lane divided roadway as discussed under Mitigation Measure T-14.	EDC	οτς	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 72401 and 72402. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts

impacts.							
			м	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
							fees at the time of Building Permit.
Impact T-11: Cumulative-Plus-Project Impact on Latrobe Road/Golden Foothills Parkway North Intersection. The added project volumes would cause this signalized intersection to operate at LOS F in both peak hours, compared to LOS D in the AM peak hour and LOS B in the PM peak hour without the project.	Mitigation Measure T-11: Provide two through lanes in each direction on Latrobe Road at this intersection. This mitigation measure would improve operations to LOS B in both peak hours	EDC	ΟΤΟ	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved <i>Supplemental Traffic</i> <i>Impact Analysis: East Ridge</i> <i>Village</i> (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-12: Cumulative-Plus-Project Impact on Latrobe Road/Suncast Lane Intersection. The addition of project traffic to projected year 2015 cumulative intersection volumes would result in unacceptable levels of service on the Latrobe Road/Suncast Lane intersection. Without the project, this stop-sign controlled intersection would operate at LOS A in the AM peak hour and LOS B during the PM peak hour. Addition of project traffic would reduce the number of available gaps in traffic along Latrobe Road, resulting in LOS F conditions during the PM peak hour when vehicles would have a difficult time turning left from Suncast Lane onto Latrobe Road or from Latrobe Road onto Suncast Lane.	Mitigation Measure T-12. Signalize the intersection; widen Latrobe Road to provide two through lanes in each direction, a northbound left-turn lane and a southbound right-turn on Latrobe Road (see Figure D-20 in section IV.D.5 of the EIR). This improvement will result in LOS A-B operation at this intersection under cumulative-plus-project conditions.	EDC	отс	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved <i>Supplemental Traffic</i> <i>Impact Analysis: East Ridge</i> <i>Village</i> (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 72335 and 72403. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-13: Cumulative-Plus-Project Impact on	Mitigation Measure T-13: Widen Latrobe Road to	EDC	отс	PPO	EDCDOT	Yes. Satisfied	This mitigation measure has

 1 Appl. = Applicant; EDC = El Dorado Courty
 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative

 Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified	environmental
impacts.	

			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Latrobe Road Between White Rock Road and Carson Creek. The segment analysis indicates that the LOS on this portion of Latrobe Road south of White Rock Road would decrease from LOS D to F on an average daily basis.	four lanes (plus turning lanes as noted in the previous mitigation measures) between White Rock Road and the intersection with the new project entrance/Golden Foothills Parkway South. South of the Golden Foothills Parkway intersection, the road could revert to a two-lane cross-section. This widening would provide a consistent four-lane roadway width through each of the signalized intersections in this segment. The RIF currently includes, and is periodically revised to fully fund, this County roadway improvement. The project is subject to County RIF requirements. All future project development will be required to make RIF payments.				COMPLETED		been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) and work was completed with the CIP 72335 and 72403. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit.
Impact T-14: Cumulative-Plus-Project Impact on White Rock Road East of Latrobe Road. White Rock Road east of Latrobe Road is currently a two-lane undivided rural roadway. This roadway is projected to operate at LOS F in the "Cumulative-Without-Project" scenario as well as the "Cumulative-With-Project" scenario. The "Cumulative-With-Project" scenario would add traffic and thus increase delay on this segment that is already projected to operate at LOS F.	Mitigation Measure T-14: Mitigate this condition by widening the roadway to become a four-lane divided roadway with median. Such a widening would make the roadway consistent with the already approved plans for White Rock Road west of Latrobe Road. The RIF currently includes, and is periodically revised to fully fund, this County roadway improvement. The project is subject to County RIF requirements. All future project development will be required to make RIF payments.	EDC	отс	PPO PPO STR	EDCDOT	Yes. Satisfied Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) under T16 and does not require WRR widening at this time. Partial work has been completed by the CIP from various projects. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay TIM fees at the time of Building Permit. This mitigation measure has

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
US 50. The US 50 freeway would operate at LOS F for both the "Cumulative" and the "Cumulative- Plus-Project" scenarios. The project would exacerbate a projected base case LOS F condition.	scenario is based on the assumption that US 50 would be widened to become a six-lane freeway prior to the year 2015. As the projections indicate, the capacity of the freeway at six lanes would be exceeded by the year 2015. This would be a base case condition not attributable to the project. However, the project would exacerbate this base case condition. The project shall contribute its fair share to the cost of widening US 50 to eight lanes as is proposed by the 20-year CIP. The state TIM currently includes, and is periodically revised, to partially fund the widening of Highway 50 to six lanes by 2010 and eight lanes by 2015. The project is subject to County state TIM requirements and El Dorado Hills RIF requirements. All future project development will be required to make state TIM payments. Once this widening is implemented, the freeway would operate at an acceptable LOS E west of El Dorado Hills Boulevard for the "Cumulative-Plus- Project" scenario. Because future funding for the widening is not currently assured (i.e., not currently in place), this impact.						been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014) under T16. Also, was verified by County staff per our MM meeting held on 12/30/14. Project to pay Hwy 50 TIM fees at the time of Building Permit.
Impact T-16: County Roadway Improvement Phasing Needs. If the offsite roadway system improvements identified in this EIR as necessary to meet General Plan specified LOS standards are not completed as each development increment occurs, the project could result in an interim LOS deficiency.	Mitigation Measure T-16: Ongoing traffic study and mitigation monitoring measures shall be implemented by project developers and the County. The County's General Plan includes policies calling for such ongoing traffic study and monitoring. As detailed in section IV.D.6 of the	EDC Appl.	SMS PTM	STR	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the approved Supplemental Traffic Impact Analysis: East Ridge Village (T.Kear Transportation Planning and Management Inc., November 2014). Also,

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	EIR, these policies shall be implemented with the project through the following two mechanisms: •T-16a: Interim Traffic Studies, and						was verified by County staff per our MM meeting held on 12/30/14. Project to pay Hwy 50 TIM fees and TIM fess at the time of Building Permit.	
	•T-16b: The DOT Annual Monitoring Program.							
Impact T-17: Pedestrian and Bicycle Impacts. The project does not include provisions for implementation of the Latrobe Trail (identified in the County's <u>Bikeway Master Plan</u> and <u>Hiking and</u> <u>Equestrian Trails Master Plan</u>) along the frontage of the project site.	Mitigation Measure T-17. Revise the Specific Plan to include a bicycle and pedestrian trail along the portion of Latrobe Road adjacent to the project site consistent with El Dorado County and El Dorado Hills Community Service District standards. (<i>Note:</i> <i>Condition #2 of the Valley View Specific Plan</i> <i>Conditions of Approval (approved by the El Dorado</i> <i>County Board of Supervisors on December 8, 1998)</i> modified this mitigation measures by specifying that the trail should be a " <u>Class I</u> bicycle and pedestrian trail" (emphasis added).)	EDC	PC	РТМ	EDCPD, EDCDOT IMPLEMENTED WITHIN THE SPECIFIC PLAN AND BY CONDITION OF APPROVAL NO. 61 (TM99- 1359)	No. Satisfied.	This MM was satisfied by the Specific Plan Condition 2 which added to the Specific Plan a Class I bicycle and Pedestrian trail along Latrobe Road adjacent to the project site. Applied COA for the West Valley Village TM 99-1359 and West Valley Villages Lot W (TM12-1506), Lot V (TM12- 1507), and Lot X (TM12-1508) which requires the construction and subject to an agreement with the County. Also, was verified by County staff per our MM meeting held on 12/30/14.	
Impact T-18: Potentially Inadequate Emergency Access/EgressEast Ridge Village. The access configuration for the East Ridge Village, as currently proposed, may not provide adequate emergency access/egress.	Mitigation Measure T-18. To maintain access to the greatest extent possible, provide cross-overs between the two separate travelways at periodic intervals. The frequency of cross-overs will depend on topography, but typically should be provided	Appl.	PC	PTM	EDCPD, EDCDOT	Yes. Satisfied	This mitigation measure was satisfied by as part of the submittal of the TM. The preliminary plan and profiles for Valley View (VV) Parkway	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)		м	ONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
		impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	every 1,800 to 2,000 feet.						have been submitted that provide the appropriate cross overs for two separated trave ways. VV Parkway is the only street proposed with two separate travel ways. Also, th Wild Fire Safe Plan has been approved by the local Fire Agencies.
D. PUBLIC FACILITIES AND SERVICES							
mpact PF-1: Lack of Reliable Long-Term Water supply. The <u>El Dorado County 1997 Public Water</u> Availability Evaluation estimates that the total optential annual water demand for all projects and parcels in EID will be 55,982 acre-feet, which learly exceeds the current annual reliable water upply of 44,100 acre-feet. The development capacity stipulated in the draft <u>Valley View</u> <u>specific Plan</u> translates into approximately 2,901 EDUS (2,002 acre-feet). EID's current records indicate that parcels within the project site are currently assigned 906 EDUs additional capacity. Juder District Policy, the project cannot receive more than 906 EDUs of water service unless idditional EDU entitlements are granted. Therefore, a reliable future water supply for the buildout of the Valley View project has not been acquired or developed by EID.	Mitigation Measure PF-1. Require that (a) no final subdivision map, final parcel map, or building permit shall be issued for the project until water meters or equivalent water guarantees for the proposed urban development levels are obtained from EID or other water purveyors, consistent with <u>EI Dorado County</u> <u>General Plan</u> Objective 5.1.2 and Policies 5.1.2.1, 5.2.1.2, 5.2.1.3, and 5.2.1.4; (b) the project shall incorporate water conservation measures specified in <i>Mitigation Measure PF-3</i> below; and (c) no grading permit shall be issued for the project, or any portion thereof, unless and until the applicant has reached final agreement with EID regarding a fully vested right to water service to the portion of the project site affected by the grading permit. (<i>Note: Condition #S of the Valley View Specific Plan Conditions of Approval (approved by the EI Dorado County Board of Supervisors on December 8, 1998) modified this mitigation measure by stating that "all tentative</i>	EDC	отс	PBP; PGP; PFM	EDCPD	Yes. Satisfied	This mitigation measure was satisfied by the Specific Plan Condition 5 which states: "A tentative maps shall be conditioned to require a wat meter award letter for all residential lots." A COA will f added to the TM for the project. Compliance with thi condition shall be verified wi filing of the final map.

The environmental mitigation measures light in column two heless have been incompared into the Valley View Creatilia Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval; PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	<u>maps</u> shall be conditioned to require a water meter award letter for all residential lots" (emphasis added).)						
Impact PF-2: Project Dependency on Potable Water Supply for Irrigation/Landscaping Purposes. The project's dependency on EID's limited potable water supply for irrigation purposes is considered a potentially significant impact, given EID's goal of using reclaimed water to reduce potable water needs.	Mitigation Measure PF-2: In order to ensure adequate use of reclaimed water as a means of reducing its dependence on EID potable water supply, measures (a) through (d) listed in section IV.E.1(d)4 of the EIR shall be completed as a condition of any future project rezoning or subdivision approval (based on <u>General Plan</u> Policy 5.2.1.4).	EDC	отс	PTM <u>PFM</u>	EDCPD	Yes. Satisfied	This mitigation measure was satisfied by the Specific Plan Condition 5 which states: "All tentative maps shall be conditioned to require a water meter award letter for all residential lots." A COA will be added to the TM for the project. Compliance with this condition shall be verified with filing of the final map. In addition, the EID FIL states that no recycled water is available for the project. Therefore, measures a) thru d) are not applicable.
Impact PF-3: Drought Contingency and Water Conservation Planning. Water supply for the project would be susceptible to the effects of prolonged droughts. EID obtains a large portion of its water from the U.S. Bureau of Reclamation which, in times of drought, imposes rationing and cutbacks. The project does not propose a drought contingency plan or a specified water conservation program.	Mitigation Measure PF-3. The applicant shall implement water conservation measures to reduce the amount of water used by the project and reduce the potential effects of extended drought conditions.	Appi.	SSR	PFM <u>;</u> <u>PBP</u>	EDCPD	Yes. Partly Satisfied.	Verification of mitigation measure shall take place at building permit.
Impact PF-4: Project Wastewater Flows. At full buildout, the project would generate wastewater flows of approximately 0.7 mgd (average dry	Mitigation Measure PF-4. Require that no final subdivision map, final parcel map, or building permit shall be issued for the project until EID has	EDC	отс	PFM ; PBP	EDCDOT	Yes. Satisfied	This mitigation measure shall be satisfied through application of a condition of

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)		м	IONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
weather flow) and 2.8 mgd (total peak wet weather flow). There is an insufficient allocation of existing wastewater treatment capacity to accommodate these ultimate wastewater flows.	demonstrated (in a manner acceptable to the El Dorado County Department of Transportation) that adequate wastewater service is available to serve the development in question.						approval to the TM for the project which states: "All tentative maps shall be conditioned to require a water meter award letter for all residential lots. " A meter letter will be required prior Final Map filing. In addition, the EID FIL states that there is adequate wastewater capacity to service the project.
Impact PF-5: Emergency Access Impacts. Unless adequate emergency access is provided, police protection could be compromised within the project.	Mitigation Measure PF-S: The applicant shall implement the following measures: (a) provide for emergency access adequate to meet adopted County response time standards; (b) incorporate County standards for emergency access in project plans, and submit the appropriate maps for approval by the County Sheriff's Department; and (c) secure any emergency access gates in a fashion that would allow emergency entry with a minimum of time and effort. Incorporate these measures in each project increment (individual development plan approval) to Sheriff's Department.	Appl.	SSR	PTM	EDCSD	Yes. Satisfied	This mitigation measure was satisfied with the preparation of the Wild Fire Safe Plan and the Sheriff's Department was sent the Tentative Map packet and plans and provided comments. The Sheriff's Departments only concern is the number of officers needed for their Department. Those comments are independent of the TM requirements. Staffing was addressed on the VVSP EIR pages E-58 and E-59 and was considered to have no significant impact and addressed in the EIR.
Impact PF-6: Fire Protection and EMS Service Demand and Phasing Impacts. The EDHFD would require additional staffing and equipment, and	Mitigation Measure PF-6: The applicant-prepared Public Facilities Financing Plan (PFFP) shall specify phasing of fire protection services and facilities, for	EDC	SSR	PFM	EDHFD	Yes. Satisfied	This mitigation measure has been satisfied with EDHFD's comments in the PFFP. Also, a

The environmental midiration measures listed in column free below have been incompared into the Valley View On sitis Dian in ander the uttacts Identified environmented

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval; PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			N	IONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
probably a new fire station, to provide fire protection and emergency medical response to the project adequate to meet adopted County and EDHFD goals and standards.	review and approval by the EDHFD. Also, the applicant shall be required to comply with applicable development fees and with the site and building design requirements identified under Mitigation PF- 6(b) (see EIR text) to reduce fire hazards.						Wildfire Safe Plan was approved for the Specific Plan and for this East Ridge Village Project.
Impact PF-7: Emergency Access Impacts. Unless two permanent access roads are provided onsite during all phases of construction and thereafter, fire protection and emergency medical service response could be compromised within the project.	Mitigation Measure PF-7: Require the applicant to develop and submit a <i>Fire Safety Plan</i> for review and approval by the El Dorado County Department of Transportation, the El Dorado Hills Fire District, and the California Department of Forestry. The <i>Fire</i> <i>Safety Plan</i> shall provide for adequate emergency access by providing a minimum of two permanent access roads during and after all phases of development, or an alternative access provision acceptable to the reviewing agencies. The plan shall incorporate standards contained in the State Fire Safe Regulations and the current <u>El Dorado County</u> <u>Department of Transportation Design Standards</u> <u>Manual</u> in all circulation plans.	EDC	SSR	PFM <u>PTM</u>	EDHFD, EDCDOT	Yes. Satisfied	This mitigation measure is satisfied with the approval of the Wildfire Safe Plan for this East Ridge Village Project by EHDFD and application of department conditions of approval. Transportation Division has reviewed the proposed circulation and recommended conditions of approval for the project.
Impact PF-8: Trail Impacts. Page 56 of the draft Valley View Specific Plan (September 1997) states that "Bicycle and pedestrian paths will be developed within the collector street system of [West Valley] and White Rock Villages leading to the entrances at White Rock Road and the Village Center. These routes will also link neighborhoods to the two schools which are planned within each village. Bicycle paths will be installed both in the right-of-way as Class 2 facilities and, where feasible, within adjacent open space and greenbelt areas." The project	Mitigation Measure PF-8. Revise the Specific Plan to include a bicycle and pedestrian trail along the portion of Latrobe Road adjacent to the project site consistent with El Dorado County and El Dorado Hills CSD standards.	EDC	PC	PTM	EDCPD, EDCDOT IMPLEMENTED WITHIN THE SPECIFIC PLAN AND BY CONDITION OF APPROVAL NO. 61 (TM99- 1359)	No. Satisfied	This mitigation measure was satisfied by the Specific Plan Condition 2 which was added to the Specific Plan a Class I bicycle and Pedestrian trail along Latrobe Road adjacent to the project site. This improvement shall be Implemented by the WVV TM and agreement with the County. Also, was verified by County staff per our MM

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	ONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
does not include provisions for implementation of the Latrobe Trail along the frontage of the project site. Given the need for widening of Latrobe Road due to the project and cumulative development in the area, and the increase in the demand for trails that would be expected to result from the project, the lack of project participation in the implementation of the Latrobe Trail is considered a significant impact							meeting held on 12/30/14.
Impact PF-9: Project Impacts on BUSD Elementary and Middle School Facilities. Unless adequate funding were available to finance school preparation and facility construction, the BUSD elementary and middle school capacity needed over the project buildout period (nine to 11 years) to ultimately accommodate the 1,295 elementary school students and 387 middle school students generated by the project could not be provided	 Mitigation Measure PF-9. The applicant shall implement each of the following mitigation measures: (a) Consistent with General Plan Policy 5.8.1.1, enter into a written agreement with the BUSD to mitigate the project impacts on school facilities or the demand therefor. (b) Include measures in the <i>PFFP</i> that will ensure to El Dorado County's and the BUSD's satisfaction, that adequate funding will be available for school facilities when needed. (c) Determine and identify in the <i>PFFP</i> when elementary school facilities will be needed onsite and when additional middle school space will be needed offsite to serve proposed development. Require that locations of necessary schools be formalized concurrent with future tentative map approvals. Access, configuration, size, useable 	Appl.	отс	РТМ	EDCPD COMPLETED	Yes. Satisfied	This mitigation measure was satisfied by the agreement with the BUSD. The PFFP included language in the plan for the school facilities. Project will be the appropriate school fees at the time the Building Permit issuance per the agreement.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measure impacts.	es listed in column two below have been inc	orporate	d into the Va	lley View Specif	ic Plan in orde	er to mitigate	identified environmental
•			N	IONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	space and basic infrastructure needs (including timing and delivery of utilities) should also be determined at this time.						
	(d) Prior to issuance of building permits for units in the various phases of the project, secure written verification from the BUSD guaranteeing that adequate elementary and middle school space will be provided in schools on- or off-site.						
Impact PF-10: Project Impacts on EDUHSD High School Capacity. It is not anticipated that the adopted school impact fee would be sufficient to cover the cost of providing adequate facilities to serve the 578 project-generated high school students.	Mitigation Measure PF-10. The applicant shall implement each of the following four mitigation measures: (a) Consistent with County General Plan Policy 5.8.1.1, enter into a written agreement with the EDUHSD to mitigate the impact of the project on school facilities.	Appl.	ОТС	РТМ	EDCPD COMPLETED	Yes. Satisfied	This mitigation measure was satisfied since the state law for schools has been determined. Required school fees will be obtained at the time the Building Permit issuance per the agreement.
	(b) Include measures in the project <i>PFFP</i> to ensure to El Dorado County's and the EDUHSD's satisfaction, that the project will provide its fair-share of funding for additional high school capacity <u>when needed</u> .						
	(c) Determine and identify in the <i>PFFP</i> when high school capacity will be needed to serve the various phases of proposed development.						
	(d) Prior to issuance of building permits for units in the various phases of the project, secure written						

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.				IONITORING		VERIFICATION OF APPLICATION TO EAST		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	RIDGE	
	verification from the EDUHSD guaranteeing that adequate high school space will be provided for project-generated high school students.							
Impact PF-11: Elementary School Site Impacts. The two elementary school sites proposed under the Specific Plan do not appear to meet State school facility site selection standards and/or BUSD standards.	Mitigation Measure PF-11. The applicant shall implement the following measures: (a) relocate the White Rock Village elementary school site to a location away from the onsite earthquake fault, and reconfigure the site as necessary to satisfy BUSD criteria regarding a square or rectangular shape; (b) reconfigure the West Valley Village elementary school site as necessary to satisfy BUSD criteria regarding a square or rectangular shape; (c) provide information for each site adequate for the lead agency to make determinations regarding site- related hazardous materials and hazardous wastes pursuant to PRC 21151.8; and (d) identify facilities within one-fourth of a mile of the proposed school sites that might reasonably be anticipated to emit hazardous emissions or handle hazardous or acutely hazardous materials, substances or waste and determine health risks as required under PRC 21151.8. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measures was addressed in the Development Agreement.)	Appl.	отс	PTM	EDCPD	No. Satisfied	This mitigation measure has been satisfied with Condition 6 of the approved Specific Plan and was addressed in the Development Agreement. In addition, the Valley View Elementary School has been constructed.	
E. BIOLOGICAL RESOURCES								
Impact BR-1: Increased Presence of Invasive Non-Native Plant Species. The presence of	Mitigation Measure BR-1: The applicant shall revise the Specific Plan to: (a) state that native plant	Appl.	отс	PTM	EDCPD	Yes. Satisfied	This mitigation measure has been satisfied with Condition 6	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	IONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
human development and related land disturbances associated with the project would lead to the increased presence of weedy, opportunistic, and invasive non-native plant species. These introduced species would tend to rapidly colonize disturbed areas, further reducing the number and diversity of naturally occurring local plant species. According to page 92 of the <u>Valley View Specific Plan</u> , non-native trees and shrubs would replace native vegetation along the project roads to create " a tidy manicured appearance year round with minimal maintenance and low water consumption." The majority of plant species recommended in the landscaping section of the <u>Valley View Specific</u> <u>Plan</u> are either non-native or do not occur in the natural habitats found in the Valley View area	species will be encouraged for landscaping to the extent possible, and will be required where landscaping borders oak woodlands and oak savannah communities, and in riparian and wetland buffer zones; (b) prevent the introduction of invasive non-native vegetation, implement vegetation and erosion control measures in a timely manner following construction; (c) incorporate measures to control invasive non-native species into the Specific Plan's landscape, restoration and habitat management plans; and (d) use caution when selecting any non-native plants for landscaping purposes on the site to ensure that no potentially invasive plant species are selected. The current Specific Plan Landscape Plan objectives of " minimal maintenance and low water consumption " are worthwhile and could be achieved using native plants. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through use of Transitional Open Space, Chapter 8 of the Specific Plan.)				IMPLEMENTED WITHIN SPECIFIC PLAN		of the Specific Plan confirming that this MM is addressed through use of Transitional Open Space and Chapter 8 (Environmental Protection) of the Specific Plan.
Impact BR-2: Loss of Non-Native Annual Grassland Habitat. The loss of approximately 907 acres of non-native grassland onsite would decrease foraging habitat for a variety of birds, mammals, and reptiles	Mitigation Measure BR-2: The applicant shall implement the following measures to avoid or minimize impacts of non-native annual grassland losses on both common and sensitive plant and wildlife species: (a) preserve grassland habitat in contiguous areas where possible to minimize fragmentation and maximize retention of habitat functions and values; and (b) use temporary fencing	Appl.	отс	РТМ	EDCPD IMPLEMENTED WITHIN SPECIFIC PLAN	Yes. Satisfied	This mitigation measure has been satisfied with Condition 6 of the Specific Plan confirming that this MM is addressed through use of Transitional Open Space and Chapter 8 (Environmental Protection) of the Specific Plan.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)		м	ONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	and/or protective signage to prevent construction impacts and unauthorized access to grasslands and associated wildlife corridors not planned for development. (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through use of Transitional Open Space, Chapter 8 of the Specific Plan.)						
Impact BR-3: Loss of Oak Woodland/Oak Savannah Habitats. The project-related loss of substantial oak woodland and oak savannah habitat (317 and 164 acres respectively) would be a significant loss of oak trees, and a significant habitat loss to many bird and mammal species. Several songbirds utilize the oaks for foraging, nesting and cover, while raptors use these trees as crucial roosting and nesting habitat. Portions of these existing oak communities would be fragmented by development-related removal of oak trees from currently uninterrupted stands. Any tree loss, whether individually standing or as part of woodland, would impact these bird species. The loss of nests would impact reproductive success, while the loss of roosts and cover would displace individuals and decrease survivorship	Mitigation Measure BR-3: The applicant shall implement the following: (a) conduct pre- construction surveys for raptor and songbird nests, and bat roosts; (b) limit development within the canopy of existing oak trees in the oak woodland, oak savannah, and non-native grassland whenever possible to retain the maximum feasible number of oak trees; (c) concentrate development and open space in contiguous areas to minimize fragmentation and maximize habitat value; (d) where oak woodland and oak savannah impacts are unavoidable, replant oaks at a rate of 5-to-1 (as specified by CDFG) as detailed in the <i>Tree Replacement Plan</i> specified under <i>Mitigation Measure BR-4</i> below; and (e) implement the <i>Tree Replacement Plan</i> prior to any construction activities that would adversely affect oaks (see EIR text for details).	Appl.	отс	РТМ; <u>РGP</u>	EDCPD	Yes. Partly satisfied.	This mitigation measure has been satisfied with Condition 6 of the Specific Plan confirming that this MM is addressed through combination of Chapter 9 of the Specific Plan and Condition 28 which requires demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1. All trees above 24" in diameter at breast height shall be shown on the plan. In any trees 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

PFM = Prior to Final Map

⁴ EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

			N	IONITORING	VERIFICATION OF APPLICATION TO EA RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	 indicated that this mitigation measure is addressed through a combination of Chapter 9 of the Specific Plan and Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4 and 7.4.5.1 to be submitted with tentative map application" and specifies the following revision to the Specific Plan: p.77 Under Development Requirements Within Oak Woodlands add: 5. All trees above 24" in diameter at breast height shall be shown on the plan. If any trees 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process. Under Oak Tree Conservation Program, add: A Primary Building Area or building envelope shall be delineated on the tentative map concurrent with tentative map application.) 						Building area or building envelope shall be delinea on the TM concurrent wii TM application. The Oak Protection, Re-vegetatior Monitoring Plan has beer prepared and submitted Registered Professional Forester/Arborist in coordination with the dee process. All 24" in larger were surveyed on the site could be impacted by development. In addition 36" and larger were surve for the health assessmen Primary building areas we developed in with the Registered Professional Forester/Arborist assessr to find all possible metho avoid the removal of hea trees. Prior to issuance of gradii permit, a pre-constructio survey shall be submitted evaluating potential press of raptor and songbird ne

The anvironmental mitigation measures listed in column two below have been incornerated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Impact BR-4: Reduction of the Habitat Quality of Oak Woodland During Construction. Damage to oak trees and other mature trees preserved within the oak woodland and oak savannah communities may occur the <u>Valley View Specific</u> <u>Plan</u> area. Construction impacts could include (a) damage to the root systems by earth-moving equipment, (b) storage of construction materials and/or dumping within the dripline of the trees, (c) trimming of tree branches, (d) the siting of infrastructure improvements, homes, and commercial structures too close to the dripline of the trees, and (e) trimming of tree branches.	Mitigation BR-4: The applicant shall implement the following: (a) protect the existing oak trees within the oak woodland, oak savannah, and non-native grassland during construction; and (b) implement the Tree Replacement Plan prior to any construction activities that would adversely affect oaks. (See EIR text for specifics.) (Note: Condition #6 of the Valley View Specific Plan Conditions of Approval (approved by the EI Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through a combination of Chapter 9 of the Specific Plan and Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1 to be submitted with tentative map application" and specifies the following revision to the Specific Plan: p.77 Under Development Requirements Within Oak Woodlands add: 5. All trees above 24" in diameter at breast height shall be shown on the plan. If any trees 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is	Appl.	PC, CPI	PTM; DPC	EDCPD	Yes. Partly Satisfied.	This mitigation measure has been satisfied with Condition 6 of the Specific Plan confirming that this MM is addressed through combination of Chapter 9 of the Specific Plan and Condition 28 which requires demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1. All trees above 24" in diameter at breast height shall be shown on the plan. In any trees 36" in diameter at breast height and above are slated for removal, the program shall demostrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process. In addition a Primary Building area or building envelope shall be delineated on the TM concurrent with the TM application. The Oak Tree Protection, Re-vegetation and Monitoring Plan has been prepared and submitted by a Registered Professional Forester/Arborist in

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

impacts			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	unhealthy, or that all possible methods of avoidance have been attempted in the design process. Under Oak Tree Conservation Program, add: A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with tentative map application.)						coordination with the design process. All 24" in larger trees were surveyed on the site that could be impacted by development. In addition all 36" and larger were surveyed for the health assessment. Primary building areas were developed in with the Registered Professional Forester/Arborist assessment to find all possible methods to avoid the removal of healthy trees. It should be noted that the EIR assumed 481 acres of oak tree canopy would be impacted in the specific plan area. As determined, only 200 acres would be impacted.
Impact BR-5: Loss of Riparian Areas. Approximately 1.6 acres of Carson Creek and Plunkett Creek riparian area would be developed with bridge structures. The resulting potentials for destruction or alteration of existing riparian areas could potentially impact the health and survival of birds, reptiles, amphibians, and invertebrates in the riparian areas, especially on Plunkett Creek. The creation of ad-hoc trails through riparian areas may also be detrimental. Many invertebrates, especially insects, utilize the trees and shrubs within riparian areas, attracting	Mitigation Measure BR-5: The applicant shall implement the following measures to mitigate impacts on riparian area: (a) construct creek crossings in locations which minimize riparian vegetation disturbance, (b) provide buffers, (c) limit activities in buffer zones, and (d) protect riparian habitat. At a minimum, mitigation should conform to El Dorado County General Plan Policy 7.3.3.2, which requires avoidance of any net loss of riparian vegetation associated with wetlands. (See EIR text for details.) In addition, implement Mitigation Measure BR-6 (see	Аррі.	SSR	PTM	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the USACOE Wetland Permit.

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map 4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental imnacte

impacts.			M	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
birds and bats. Reptiles and amphibians may utilize riparian areas for foraging, reproduction, cover, and estivation during the dry season.	below).						
Impact BR-6: Proposed Landscape Plan Impacts on Riparian Areas. The proposed Valley View landscape plan includes the use of non-native species in drainage areas where enhanced naturalized plantings are desirable. Local wildlife is adapted to use native riparian vegetation, and may be unable to utilize exotic species. The use of non-native species in a riparian area is inconsistent with <u>El Dorado County General Plan</u> Objective 7.3.4, which calls for the protection and utilization of natural drainage patterns such that natural watercourses should be integrated into new development so that they enhance the aesthetic and natural character of the site without disturbance. Non-native plantings would result in the disturbance and alteration of the natural riparian plant and wildlife community.	Mitigation Measure BR-6: The applicant shall implement the following: plant locally occurring native species (willows, alders, oaks) in riparian areas and adjacent buffer zones rather than non-native trees and shrubs. At a minimum, mitigation should conform to <u>El Dorado County General Plan</u> Policy 7.3.3.2, which requires avoidance of any net loss of riparian vegetation associated with wetlands.	Appl.	SSR	PTM	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the USACOE Wetland Permit.
Impact BR-7: Reduction of Habitat Quality of Riparian Areas During Construction. The two riparian communities that exist onsite (Great Valley Mixed Riparian and Cottonwood Willow Riparian) may be affected during project construction. Impacts on riparian woodland during construction may include damage to root systems by earth-moving equipment, storage of construction materials, dumping within the dripline of the trees, siting of infrastructure improvements within the dripline of the trees, as	Mitigation Measure BR-7: The applicant shall implement the following measures: (a) protect riparian habitats with temporary fencing during construction; (b) permanently fence riparian corridors and a buffer zone extending 50 feet out from the riparian canopy; (c) not disturb riparian zone vegetation during construction; (d) prevent erosion, sedimentation, and urban runoff into the riparian corridors; and (e) consult with CDFG regarding the possible need for a Streambed Alteration Agreement. At a minimum, mitigation	Аррі.	SSR, CPI	PTM; DPC	EDCPD	Yes. Partly satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the Wetland Permit. However, for future construction if a 1600 California Department of Fish and Wildlife (CDFW) permit is necessary and application with

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
well as trimming of tree branches, and degradation of water quality	should conform to <u>El Dorado County General Plan</u> Policy 7.3.3.2, which requires avoidance of any net loss of riparian vegetation associated with wetlands.						the CDFW will be submitted for impacts to any riparian impacts.
	(See EIR text for details.) In addition, implement Mitigation Measure BR-6.						
Impact BR-8: Loss of Wetlands. The jurisdictional wetlands determination conducted on the site by the USACE in 1997 identified 14.47 acres of jurisdictional wetlands within the project area. The applicant's biologists indicate that the project would impact approximately 1.93 acres of jurisdictional wetlands. The destruction or alteration of existing wetland areas would significantly impact the health and survival of birds, reptiles, amphibians, and invertebrates. Perennial and intermittent streams, seeps, and other seasonal wetlands (14.39 acres), and vernal pools (0.08 acre) are necessary for survival of these specialized species, and the loss of that habitat would eliminate these species on the project site. Reptiles and amphibians require a variety of wetland types for foraging, reproduction, cover, and estivation during the dry season. Several songbirds utilize these areas for cover, nesting and foraging. Destruction of these wetland areas would mean the direct elimination of these species on the project site and thus would contradict the "no net loss"	Mitigation Measure BR-8: The applicant shall implement the following measures: (a) redesign the project to avoid filling wetlands, <u>or</u> (b) prepare a Wetlands Mitigation Plan and replace wetland habitat in-kind and on-site at a minimum 1:1 replacement ratio in conformance with County Policy 7.3.3.2 of no net wetland loss and based on consultation with the Army Corps of Engineers and Regional Water Quality Control Board. The County should review and approve a mitigation plan approved by the USACE and Regional Water Quality Control Board. Vernal pools, however, because of their special soil requirements, are often better mitigated by utilizing a local, but offsite mitigation bank specifically developed to provide vernal pool habitat (<i>Mitigation Measure BR-10</i> which follows). Preparation of the Wetland Mitigation Plan and implementation of this plan shall be carried out by a qualified wetland vegetation specialist in a timely manner. Address indirect post-construction impacts on wetlands by clearly written CC&Rs provided to homeowners. (See EIR text for details.)	Аррі.	SSR	РТМ; <u>РЕМ</u>	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the USACOE Wetland Permit.
policy of the USACE. Impact BR-9: Reduction of Habitat Quality of Wetlands During Construction. Damage to	Mitigation Measure BR-9: The applicant shall be responsible for mitigating impacts on wetlands	Appl.	CPI	<u>PGP:</u> DPC:	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental imnacte

			м	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
wetlands onsite may occur during the construction of the proposed development, even though many wetlands are out of the planned development areas. Impacts may include damage to the existing wetland vegetation by earth-moving equipment, storage of construction materials and dumping within wetlands, and inadvertent placement of fill material in wetlands.	during construction by implementing protective buffer zone construction fencing of sensitive habitat. Provide a 50-foot buffer zone as recommended in the <u>El Dorado County General Plan EIR</u> , measured from the edge of the jurisdictional wetland. Keep all construction vehicles and supplies out of these fenced areas						issuance of a grading permit and construction of the major crossings and approval and implementation of the Wetland Permit. In addition, a 50 foot buffer has been shown on the grading plans for the edge of the existing wetlands.
Impact BR-10: Loss of Vernal Pool Habitat. Project-related destruction of 0.08 acre of existing vernal pool areas in the western portion of the project site could significantly affect the health and survival of certain invertebrates endemic to this habitat. Both the vernal pool fairy shrimp and the vernal pool tadpole shrimp are federal protected species and the presumption of their presence requires Section 7 (Endangered Species Act) consultation. Vernal pools are necessary for survival of these specialized species, and the loss of that habitat will eliminate these species on the project site. Several songbirds also utilize these areas for cover, nesting, and foraging.	Mitigation Measure BR-10: The applicant shall implement the following: (a) obtain a Section 404 permit from the USACE for vernal pool wetland losses, (b) conduct Section 7 consultation for listed vernal pool crustacean species losses, and (c) purchase credit in a certified vernal pool mitigation bank at a ratio consistent with measures and conditions determined during the Section 7 consultation. At a minimum, the mitigation bank credit purchase should be consistent with the County's wetland no-net-loss policy (Policy 7.3.3.2), and avoid a reduction in the number, or restriction in the range of, endangered, rare or threatened species associated with these vernal pools.	Appl.	отс	PTM PGP	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the USACOE Wetland Permit.
Impact BR-11: Impacts on Vernal Pool Crustaceans. Rain-filled depressions and vernal pools potentially inhabited by the vernal pool fairy shrimp (federal threatened species) and vernal pool tadpole shrimp (federal endangered species) would be lost due to the proposed development.	Mitigation Measure BR-11: The applicant is assuming presence of vernal pool crustaceans on site and shall (a) initiate Section 7 consultation with USFWS for listed vernal pool crustacean species losses, and (b) purchase credit in a certified vernal pool mitigation bank at a ratio consistent with measures and conditions determined during Section	Appl.	отс	PTM P <u>GP</u>	EDCPD	Yes. Satisfied.	This mitigation measure has been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the USACOE Wetland Permit.

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado **County Building**

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

specific temperature and humidity ranges in their roots to survive winter hibernation and daily torpor. Many tree rootsing species in California are CDFG Species of Special Concern or federal Species of Concern. The project would result in be assumed to a proceeding human safety); and (c) to the extent composible (c) to the extent possible (c) to the extent opsible (c) to the extent approximately Mary 1 through August 31, and before hibernation begins, approximately October. The County should review and approve mitigation measures developed in consultation with and approved by the CDFG.PGPsatisfied.be added as a note to the construction avaings ann a biologist shall be hired p to do a pre-construction survey to address this mitigation measure.Impact BR-13: Impacts on Raptors: Large trees and areas of oak savannah and oak woodland ta may provide nesting habitat for several species of Special Concern) would be lost to the proposed development. Active raptor nests and, in consultation with CDFG, establish appropriate buffers. The applicant shall lune; and (b) describe the locations of any active measure ablication solution in the CDFG establish appropriate buffers. The applicant shall lune; and (b) describe the locations of any active araptor nests and, in consultation with CDFG, establish appropriate buffers. The applicant shall also be responsible for ensuring that disturbance to ative raptor nests due to construction activity isAppl.OTCPTM PGPPEDP PGPVes. Partly satisfied. <t< th=""><th></th><th></th><th></th><th>M</th><th>IONITORING</th><th></th><th>VERIFICATIO</th><th>N OF APPLICATION TO EAST RIDGE</th></t<>				M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
regist purchase should be consistent with the County's wetland no-net-loss policy (Policy 7.3.3.2), and avoid a reduction in the number, or restriction in the range of, endangered, rare or threatened species associated with these vernal pools. Impact BR-12: Impacts on Bats. Bats require specific temperature and humidity ranges in their roots to survive winter hibernation and ally torpor. Many tree rootsing species in California are CDFG Species of Special Concern or feeding torposed development, which provide potential roots the bas of oaks savanah and oak woodiand that may provide nesting habitat for several species of facts (range tree range) for using the discribence to Impact BR-13: Impacts on Raptors: Large trees and areas of oak savanah and oak woodiand that may provide nesting habitat for several species of special Concern, the roject tor development, which provide potential roots the bast notes to the construction survey effort to determine active nest toclations the toclations development toclations of any active roots to development. Active raptor nests and in consultation with DFG, satisfied. The applicant shall hin a sublish appropriate buffers. The applicant shall hind a could reprove mining thand disturbance to active raptor nests and in consultation with DFG, satisfied biologist to implement the following: a) to be reponsible for ensuring that disturbance to a stoled part the toclations between March and a porticed by state and federal laws. The project could involve construction activity is is a bioled part to consultation wi	IDENTIFIED IMPACT	(OR CHANGE TO THE SPECIFIC PLAN)		Monitoring		and Verification	to East Ridge? (Yes or No); Satisfied/ Partly	Note
specific temperature and humidity ranges in their roots to survive winter hibernation and daily torpor. Many tree rootsing species in California are CDFG Species of Special Concern or federal Species of Concern. The project would result in bossible (b) within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to open space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent to apen space areas, leave snags and holid within or adjacent the rearemoval outside of the bat maternity period, which extends from approved by the CDFG.PGPSatisfied.be added as a note to the construction assure.Impact BR-13: Impacts on Raptors: Large trees and areas of oak savannah and oak woodiand proposed development. Active raptor nests are protected by state and federal laws. The project could involve construction survey effort to determine active nest and, in consultation with CDFG, establish appropriate buffers. The applicant shall also be responsible for ensuring that disturbance to also be responsible for ensuring that disturbance to <td></td> <td>credit purchase should be consistent with the County's wetland no-net-loss policy (Policy 7.3.3.2), and avoid a reduction in the number, or restriction in the range of, endangered, rare or threatened species</td> <td></td> <td></td> <td></td> <td></td> <td></td> <td></td>		credit purchase should be consistent with the County's wetland no-net-loss policy (Policy 7.3.3.2), and avoid a reduction in the number, or restriction in the range of, endangered, rare or threatened species						
and areas of oak savannah and oak woodland that may provide nesting habitat for several species of raptors (many of which are CDFG Species of Special Concern) would be lost to the proposed development. Active raptor nests are protected by state and federal laws. The project could involve construction activities near active raptor nests, or the removal of trees in which	specific temperature and humidity ranges in their roosts to survive winter hibernation and daily torpor. Many tree roosting species in California are CDFG Species of Special Concern or federal Species of Concern. The project would result in the loss of oak and pine snags and hollow trees to development, which provide potential roost	implement the following: (a) avoid potential roost trees (e.g. those supporting cavities) to the extent possible; (b) within or adjacent to open space areas, leave snags in place wherever feasible (without compromising human safety); and (c) to the extent possible, conduct planned tree removal outside of the bat maternity period, which extends from approximately May 1 through August 31, and before hibernation begins, approximately October. The County should review and approve mitigation measures developed in consultation with and	Appl.	SSR		EDCPD		survey to address this
violate state and federal laws).	and areas of oak savannah and oak woodland that may provide nesting habitat for several species of raptors (many of which are CDFG Species of Special Concern) would be lost to the proposed development. Active raptor nests are protected by state and federal laws. The project could involve construction activities near active raptor nests, or the removal of trees in which active raptor nests are located (which could	Mitigation Measure BR-13: The applicant shall hire a qualified biologist to implement the following: (a) conduct a pre-construction survey effort to determine active nest locations between March and June; and (b) describe the locations of any active raptor nests and, in consultation with CDFG, establish appropriate buffers. The applicant shall also be responsible for ensuring that disturbance to	Аррі.	отс		EDCPD	· ·	survey to address this

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Longhorn Beetle. Elderberry shrubs and trees potentially inhabited by the federal threatened valley elderberry longhorn beetle (VELB) would be lost due to the proposed development. USFWS policy regarding the VELB is to consider all habitat (i.e. elderberry shrubs) within the geographic range of the beetle as potentially- occupied habitat	elderberry shrubs directly affected by construction as "directly impacted" and all shrubs that are within 100 feet of disturbance activities as "indirectly impacted". All affected shrubs require compensation as is outlined in the USFWS guidelines, <i>Mitigation</i> <i>Guidelines for the Valley Elderberry Longhorn Beetle</i> (dated September 19, 1996). The applicant shall consult with the USFWS during the Section 7 process to determine mitigation requirements. Some or all of the VELB mitigation may (also) need to proceed under Section 10 of the Endangered Species Act.			PGP			been satisfied with the issuance of a grading permit and construction of the major crossings and approval and implementation of the Wetland Permit. All VELBS have been protected and are located in the open space per the requirements of the permit. Mitigation credits have been purchased as part of the approved permit.
Impact BR-15: Increased Human Presence Impacts. The increase in human presence onsite could result in a potentially significant impact on the adjacent open space/habitat areas. The increased human access and use of the open spaces could disrupt these remaining habitat areas. Additions such as roads and trails, even if unpaved or used by only a few individuals, can fragment existing habitat. Human refuse, such as garden clippings, car fluids, chemicals, machinery, and incidental trash, could contribute to the degradation of habitat quality. Domestic pets, especially cats, could become feral and do significant damage to native populations of birds, small mammals, and reptiles. Many open spaces bordering on residential areas could suffer significant wildlife casualties, especially to ersound next the suffice due to feral end	Mitigation Measure BR-15: Human access and usage of the project site needs to be limited both during and after construction. The applicant shall implement the following: (a) design an integrative plan to limit use and educate the new community about open space preservation; (b) restrict access in the open space areas, especially in regard to the creation of trails and roads which fragment existing habitat, even if they are unpaved; (c) discourage mountain biking and off-road vehicles and limit access for hikers; (d) prohibit human refuse within the open space; and (e) post signs at appropriate access locations at the development/natural habitat boundary to inform residents of the impacts to wildlife communities resulting from feral animals, to encourage them to notify County Animal Control of sightings, and to inform them of county leash laws.	Аррі.	SSR, CPI	PFM; DPC	EDCPD	Yes. Satisfied.	All applicable restrictions shall be noted in the CCRs for the project.
ground-nesting birds, due to feral cats. Impact BR-16: Project Vicinity Cumulative	Mitigation Measure BR-16: To the extent that	Appl.	SSR	PTM	EDCPD	No. Satisfied.	The project has incorporated

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Impacts. There are currently three development projects in the Valley View vicinity totaling approximately 5,552 acres that have been approved and are either under construction or have been completed and occupied. An additional 14 projects in the vicinity totaling 7,067 acres have been approved, but remain unbuilt. Two projects totaling 3,340 acres have been proposed but have not been approved. If all 19 projects totaling nearly 16,000 acres are completed, the likely result will not only be the direct loss of existing wildlife habitat, but also additional degradation of remaining habitats through fragmentation of wildlife corridors, increased intrusion by humans and pets, introduction of exotic plants and animals, and increased noise, water, and air pollution.	projects in the Valley View vicinity provide mitigation measures similar to those proposed for the Valley View project in this EIR, such as maintaining wildlife corridors, avoiding sensitive areas, such as wetlands, woodlands, and special status species habitats, and limiting impacts primarily to low habitat value non- native grassland, the cumulative biological impacts will be reduced. Taken together, however, the cumulative impacts of these 19 projects would remain <i>significant and unavoidable</i>			<u>N/A</u>			wild life corridors, preserved wetland and oak woodlands.
F. GEOLOGY AND SOILS		2	£	-276		. · · ·	
Impact SG-1: Landslide/Soil Creep Hazards. Existing landslides and soil creep in the central portion of the White Rock Village, the central and southern portions of the West Valley Village, and the wooded areas of the East Ridge Village, have the potential to pose hazards to future project occupants.	Mitigation Measure SG-1: Require the project applicant to conduct a detailed onsite geologic and geotechnical investigation prior to development. This investigation should identify landslide activity and map in detail the extent of landsliding. Repair of identified landslides should be guided by each landslide's specific conditions and by the constraints imposed by its proposed future use, and be acceptable to the El Dorado County Building Department and Department of Transportation (for	Appi.	SSR	РТМ	EDCDOT, EDCBD	Yes. Satisfied.	This mitigation measure has been satisfied with the completion of the geotechnical report.
Impact SG-2: Differential Compaction/Seismic	project roads). Mitigation Measure SG-2: Require the project	Appl.	SSR	PTM	EDCDOT,	Yes. Satisfied.	This mitigation measure has

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts

			м	ONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Settlement Hazards. Differential compaction and seismic settlement in drainage areas and along the Bear Mountains fault have the potential to pose hazards to future project occupants.	applicant to perform detailed geotechnical subsurface exploration in areas of the site that have unsuitable soil conditions for structural support. Require that soil samples be taken and analyzed to determine their engineering characteristics. Require geotechnical earthwork or foundation design that will compensate for low density material, acceptable to the El Dorado County Building Department and Department of Transportation (for project roads) and in conformance with the <u>County of El Dorado Design</u> <u>and Improvement Standards Manual</u> and Uniform Building Code.				EDCBD		been satisfied with the completion of the geotechnical report.
Impact SG-3: Grading Impacts. Grading for project development may increase onsite sedimentation and erosion, which could create hazards for future project occupants.	Mitigation Measure SG-3: Minimize topographic modifications of the site to reduce sedimentation and erosion potential. Require drainage facilities to be lined as necessary to prevent erosion of the site soils. Prior to tentative map approval, require the project applicant to perform a detailed geotechnical investigation to confirm site characteristics and to identify site soils that may be subject to erosion when excavated and exposed to weathering. Require erosion control measures implemented during and after construction to conform with National Pollution Discharge Elimination System (NPDES) storm drain standards and El Dorado County standards (including El Dorado County Department of Transportation erosion control specifications). Where possible, design collection systems to divert natural drainage away from parking facilities, roadway surfaces and buildings, and to collect water concentrated by impervious surfaces and convey it	Appl.	SSR	РТМ; <u>РЕМ</u>	EDCDOT, EDCBD	Yes. Partly satisfied.	This mitigation measure has been partially satisfied with the completion of the geotechnical report that has been submitted with the TM packet. The remainder of the mitigation measure deals with NPDES and SWPP requirements, which shall be applied to the project.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	away from the site in accordance with the above- mentioned standards.						
Impact SG-4: Hazards from Cut-and-Fill Slopes. Construction activities that cause ground disturbance could produce a moderate to high potential for unstable cut-and-fill slopes.	Mitigation Measure SG-4: Require that cut slopes parallel or subparallel to the geologic structure be eliminated where possible or reinforced with retaining structures. Any cut or fill slopes and their appurtenant drainage facilities should be designed in accordance with Uniform Building Code Appendix Chapter 33, Sections 3312 and 3313 and in general should be no steeper than 2:1 (horizontal to vertical) unless authorized by the El Dorado County Building Department based on corroborating evaluation by the project geotechnical engineer. Slope angles should be designed to conform to the competence of the material into which they are excavated.	Appl.	SSR	PTM; <u>PFM;</u> <u>PGP</u>	EDCBD	Yes. Partly satisfied.	This mitigation measure has been partially satisfied and will be applied during design and the construction phase.
Impact SG-5: Hazards Due to Trench Wall Instability. In areas of the site that contain weaker soils, utility trench walls may be unstable.	Mitigation Measure SG-5: Require that trenches greater than five feet in depth be shored, sloped back at a 1:1 (horizontal to vertical) slope angle or reviewed for stability by the County's geotechnical engineer in accordance with the Occupational Safety and Health Administration (OSHA) regulations (described in 29 CFR 1926.650 to 1926.653) if personnel are to enter the excavations. Require trench excavations to conform with local ordinances. Monitor shearing and high groundwater associated with the Bear Mountains fault during trench construction and require additional shoring and/or dewatering as necessary.	Appl.	SSR	PTM PEM; PGP	EDCBD	Yes. Partly satisfied.	This mitigation measure shall be applied during design and the construction phase.
Impact SG-6: Ground Rupture Hazards. Development in the White Rock and West Valley Villages may be subject to ground rupture due to	Mitigation Measure SG-6: Require the project applicant to map the fault geology of the site in detail prior to tentative subdivision map approval.	Appl.	SSR	РТМ	EDCBD COMPLETED	Yes. Satisfied.	This mitigation measure has been partially satisfied with the completion of the

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction, PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.						VERIFICATIO	N OF APPLICATION TO EAST
					[MM Applies	RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
earthquake activity.	Require that the width of the Bear Mountains fault and any fault splays be identified prior to siting schools, hospitals, fire stations and other essential service buildings. Require that the surface mapping be verified by seismic and trenching methods, that the trench logs be interpreted for evidence of recency of fault activity, and that, if necessary, age dating be performed.						geotechnical report that has been submitted with the TM packet.
Impact SG-7: Ground Shaking Hazards. The project site has the potential to experience severe seismic ground shaking, which could damage project structures and infrastructure.	Mitigation Measure SG-7: Require compliance with Uniform Building Code seismic design criteria (Appendix Chapter 16, Sections 1626-1635) and determine the exact location of the Bear Mountains fault prior to tentative subdivision map approval and the siting of essential service buildings. In addition, inform all potential home buyers of the potential seismic risk associated with the Foothills Fault System.	Appl.	SSR	РТМ	EDCBD COMPLETED	Yes. Satisfied.	This mitigation measure has been partially satisfied with the completion of the geotechnical report that has been submitted with the TM packet.
Impact SG-8: Seiche Hazards. Project occupants may be exposed to hazards due to seiches that may develop in (1) the El Dorado Hills Waste Water Treatment Plant pond located approximately 200 feet west of the project site, (2) the farm pond located near the eastern property boundary, (3) the 1,000,000-gallon water storage tank located in the north central portion of the site, or (4) any planned water tanks, lakes, ponds, or pools within the proposed development.	Mitigation Measure SG-9: Implement Mitigation Measure SG-8.	Аррі.	SSR	РТМ	EDCBD	Yes. Satisfied.	The mitigation measure requires project buildings to be adequately set back from nearby ponds or any lakes or ponds planned for construction. Design a flood control system below the 1,000,000 gallon water tank and restrict residential development in this area, or evaluate the structural design of the tank for failure potential and require improvements to substantially reduce this

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

impacts.			м	ONITORING		VERIFICATIO	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note		
							potential." There are no lots located downstream of the existing pond located east of the project. Future tank designs with have structural design to address potential failures.		
Impact SG-9: Dam and Water Storage Facility Failure. Seismic activity could cause failure of (a) the farm pond dam east of the project site. causing flooding in the East Ridge Village, and/or (b) the water storage tank in the north central portion of the site, causing flooding immediately downslope of the tank.	Mitigation Measure SG-9: Implement Mitigation Measure SG-8.	Appt.	SSR	PTM	EDCBD	Yes. Satisfied.	The mitigation measure requires project buildings to be adequately set back from nearby ponds or any lakes or ponds planned for construction. Design a flood control system below the 1,000,000 gallon water tank and restrict residential development in this area, or evaluate the structural design of the tank for failure potential and require improvements to substantially reduce this potential." There are no lots located downstream of the existing pond located east of the project. Future tank designs to address potential failures.		
Impact SG-10: Exposure to Asbestos Dust. Asbestos might be released from serpentine rocks or asbestiform mineral deposits during	Mitigation Measure SG-10. Identify serpentine deposits during geotechnical investigations associated with earthwork design and during	Appl.	SSR	PTM PGP. PPO.	EDCBD	Yes. Partly Satisfied.	This mitigation measure shall be applied to the project and verified according to the		

____ 4 . 1 - 47 12 - 4 N/- 11 -. ... ----.

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			Μ	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
earthwork activities.	earthwork construction monitoring. Where serpentine rock is identified, implement El Dorado County standards for dust control and mitigation for serpentine soils. Require that any identified asbestos contamination be disclosed to future property owners, as required by law.			<u>DPC</u>			identified timing.	
G. HYDROLOGY AND WATER			<u>,</u>					
QUALITY								
Impact H-1: Increased Flows in Tributary 4 of Carson Creek. Future development would cause Tributary 4 to experience an approximate seven- percent increase in peak flow at Latrobe Road, which would add to the existing downstream flooding and capacity problems in this tributary.	Mitigation Measure H-1. Implement the mitigation measures described under <i>Mitigation Measure H-1</i> in section IV.M.4 of the EIR, including preparation of a drainage plan, construction of onsite drainage facilities, and ongoing maintenance of detention basins and drainage facilities.	Appl.	SSR	PTM <u>PFM</u>	EDCDOT	Yes. Partly Satisfied.	This mitigation measure shall be applied to the project and verified according to the identified timing.	
Impact H-2: Increased Flows in Plunkett Creek. The project-related increase in runoff to Plunkett Creek could exacerbate flooding at Plunkett and Deer Creeks.	Implement <i>Mitigation Measure H-1</i> .	Appl.	SSR	PTM PFM	EDCDOT	Yes. Partly Satisfied.	This mitigation measure shall be applied to the project and verified according to the identified timing. The submitted Drainage Study is consistent with the Carson Creek Regional Drainage Study On-site detention is provided in the Plunkett Creek shed.	
Impact H-3: Localized Flooding. Periodic flooding of the proposed multi-use open space land use is not considered a significant impact; however, flooding of structures proposed in the core residential area or the school site could occur.	Mitigation Measure H-3. Project development shall not occur in areas within the 100-year floodplain (as delineated in the Bottorff study; see section IV.H.4 of the EIR) unless El Dorado County DOT-approved 100- year flood protection improvements (as defined in the <u>County of El Dorado Drainage Manual</u>) are implemented	EDC	SSR	РТМ	EDCDOT	Yes. Satisfied.	This mitigation measure has been satisfied with the review of the submitted drainage study for the project.	

The environmental mitigation measures listed in column to d into th ~ \/all/ 1. . . 10 ~

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OCT = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map 4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental imnacts

impacts.			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Impact H-4: Increased Flood Duration. Without future improvements to contain anticipated flows within Carson and Deer Creeks or the expansion of onsite detention facilities, increased flood duration would represent a potentially significant adverse impact to present and future uses of land along downstream flood-prone sections of Carson and Deer Creeks.	Mitigation Measure H-4. In addition to the mitigations cited for <i>Impacts H-1</i> and <i>H-2</i> , the applicant shall mitigate the flood duration impacts on Carson Creek and Deer Creek by either (1) contributing a proportionate share of the cost of Carson and Deer Creek channel improvements, or (2) designing and constructing onsite detention facilities with surplus capacity.	Аррі.	SSR	PTM	EDCDOT	Yes. Satisfied	This mitigation measure shall be applied to the project and verified according to the identified timing. The submitted Drainage Study is consistent with the Carson Creek Regional Drainage Study. On-site detention is provided in the Plunkett Creek shed.
Impact H-5: Construction-Related Soil Erosion and Sedimentation. Soil erosion and subsequent sedimentation and water quality effects could occur during project construction.	Mitigation Measure H-5. Require the applicant to (a) obtain a general construction activity stormwater permit under NPDES regulations, (b) obtain a County General Grading Permit, (c) include a County- approved erosion and sediment control plan in the project drainage plans, and (d) prepare a Storm Water Pollution Prevention Plan as part of the NPDES permit. Clear all drainage culverts and downstream receiving channels from accumulated sediment after each project construction phase is completed. These measures would reduce project construction-related erosion and sedimentation impacts, but not necessarily to a <i>less-than-significant level</i> . The effect of project construction-related erosion and sedimentation would therefore remain a <i>significant,</i> <i>unavoidable impact</i> .	EDC	SSR, CPI	PGP; DPC	EDCDOT	Yes. Partly Satisfied.	This mitigation measure shall be applied to the project and verified according to the identified timing.
Impact H-6: Urban Runoff Pollutant Discharge into Creeks. The project would generate urban runoff that may degrade water quality in Carson and Deer Creeks.	Mitigation Measure H-6. Implement a comprehensive urban runoff control program to mitigate the non-point source water quality effects of the project. This measure would reduce project impacts, but not necessarily to a <i>less-than-significant</i> <i>level</i> . The effect of project-generated runoff	Аррі.	SSR	РТМ	EDCDOT	Yes. Satisfied	This mitigation measure has been satisfied with the review of the submitted drainage study for the project.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)		M	IONITORING	-	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	pollutants on Carson and Deer Creeks would therefore remain a <i>significant, unavoidable impact</i> .							
H. AIR QUALITY								
Impact AQ-1: Air Quality Impacts from Construction. Construction activities such as demolition, excavation and grading operations, construction vehicle traffic, and wind blowing over exposed earth, would generate exhaust emissions and fugitive particulate matter emissions that would affect local and regional air quality.	Mitigation Measure AQ-1(a): Dustfall Control Measures. Require implementation of dust control measures by project construction contractors during all phases of construction. (See EIR text for details.)	Appl.	CPI	DPC, <u>PGP</u>	EDCPD	Yes. Partly Satisfied.	This mitigation measure will be implemented during construction.	
	Mitigation Measure AQ-1(b): Exhaust Emissions. Contractor's equipment fleets will be considered during the bidding process for construction contracts. Preference will be given to contractors using heavy-duty construction equipment meeting 1997 federal emission standards for this type of vehicle. Utilizing new equipment retrofitted to current emissions standards would reduce emissions of NQ _x from equipment exhausts by up to 20 percent.	Аррі.	СРІ	DPC <u>PGP</u>	EDCPD	Yes. Partly Satisfied.	This mitigation measure will be implemented during construction. As determined in the East Ridge Air Quality and Greenhouse Gas Analysis (GHG) prepared by PMC (July 2014) (Exhibit W of the staff report), project NOx emissions are below the AQMD standards.	
	Mitigation Measure AQ-1(c): The proposed project shall be required to conform to all EDCAQMD Best Available Fugitive Dust Control Measures and Best Available Fugitive Dust Control Measures for High Wind Conditions as described in Appendix C-1 of the EDCAQMD Guide to Air Quality Assessment (2002). These dust suppression techniques are summarized below.	Appl.	СРІ	PGP	Аррі.	Yes. Partly satisfied.	Measures from the East Ridge Air Quality and Greenhouse Gas Analysis (GHG) prepared by PMC (July 2014), shall be applied as part of project construction.	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental
The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental
impacts.

impacts.			M	IONITORING		VERIFICATION	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	 a. During earth-moving activities (except construction cutting and filling areas, and mining operations): Either maintain soil moisture content at a minimum of 12 percent, as determined by ASTM method D-2216, or other equivalent method approved by EDCAQMD; two soil moisture evaluations must be conducted during the first three hours of active operations during a calendar day, and two such evaluations each subsequent four-hour period of active operations; OR For any earth-moving which is more than 100 feet from all property lines, conduct watering as necessary to prevent visible dust emissions from exceeding 100 feet in length in any direction. b. Earth-moving – construction fill areas: Maintain soil moisture content at a minimum of 12 percent, as determined by ASTM method D-2216, or other equivalent method approved by the District; for areas which have an optimum moisture content for compaction of less than 12 percent, as determined by ASTM method 1557 or other equivalent method approved by the District; complete the compaction process as expeditiously as possible after achieving at least 70 percent of the optimum soil moisture content; two soil moisture evaluations must be conducted during the first three hours of active operations during a calendar day, and two such evaluations during each subsequent four-hour period 						

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval; PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado **County Building**

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			Μ	IONITORING		VERIFICATION OF APPLICATION TO EAS RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	of active operations.							
	c. Disturbed surface areas (except completed grading areas): Apply dust suppression in a sufficient quantity and frequency to maintain a stabilized surface; any areas which cannot be stabilized, as evidenced by winddriven dust, must have an application of water at least twice per day to at least 80 percent of the unstabilized area.							
	d. Disturbed surface areas – completed grading areas: Apply water to at least 80 percent of all inactive disturbed surface areas on a daily basis when there is evidence of wind-driven fugitive dust, excluding any areas which are inaccessible due to excessive slope or other safety conditions; OR							
	Apply dust suppressants in sufficient quantity and frequency to maintain a stabilized surface; OR							
	Establish a vegetative ground cover within 21 days after active operations have ceased; ground cover must be of sufficient density to expose less than 30 percent of unstabilized ground within 90 days of planting, and at all times thereafter; OR							
	Utilize any combination of control actions above such that, in total, they apply to all inactive disturbed surface areas.							

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			M	IONITORING		VERIFICATION OF APPLICATION TO EAS RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	vehicular traffic at least once per every two hours of active operations; OR							
	Water all roads used for any vehicular traffic once daily and restrict vehicle speed to 15 mph; OR							
	Apply chemical stabilizer to all unpaved road surfaces in sufficient quantity and frequency to maintain a stabilized surface.							
	f. Open storage piles: Apply chemical stabilizers; OR							
	Apply water to at least 80 percent of the surface areas of all open storage piles on a daily basis when there is evidence of wind-driven fugitive dust; OR							
	Install a three-sided enclosure with walls with no more than 50 percent porosity that extends, at a minimum, to the top of the pile.							
	g. Track-out control: Pave or apply chemical stabilization at sufficient concentration and frequency to maintain a stabilized surface starting from the point of intersection with the public paved surface, and extending for a centerline distance of at least 100 feet and width of at least 20 feet; OR							
	Pave from the point of intersection with the public paved road surface, and extending for a centerline distance of at least 25 feet and a width of at least 20 feet, and install a track-out control device							

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.			Μ	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	immediately adjacent to the paved surface such that exiting vehicles do not travel on any unpaved road surface after passing through the track-out control device.							
	During high wind conditions represented by gusts of over 25 miles per hour:							
	a. During earth moving: Cease all active operations; OR							
	Apply water to soil not more than 15 minutes prior to moving such soil.							
	b. Disturbed surface areas: On the last day of active operations prior to a weekend, holiday, or any other period when active operations will not occur for not more than four consecutive days: apply water with a mixture of chemical stabilizer diluted to not less than 1/20 of the concentration required to maintain a stabilized surface for a period of six months; OR							
	Apply chemical stabilizers prior to a wind event; OR							
	Apply water to all unstabilized disturbed areas three times per day; if there is any evidence of wind-driven fugitive dust, watering frequency is increased to a minimum of four times per day.							
	c. Unpaved roads: Apply chemical stabilizers							

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = EI Dorado County Planning Department; EDCSD = EI Dorado County Sheriff's Department; EDHFD = EI Dorado Hills Fire District; EDCDOT = EI Dorado County Department of Transportation; EDCBD = EI Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			м	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	prior to a wind event; OR							
	Apply water twice per hour during active operation; OR Stop all vehicular traffic.							
	d. Open storage piles: Apply water twice per hour; OR Install temporary coverings.							
	e. Paved road track-out: Cover all haul vehicles; OR							
	Comply with the vehicle freeboard requirements of Section 23114 of the California Vehicle Code for operation on both public and private roads.							
	Mitigation Measure AQ-1(d): All architectural coating activities associated construction of the proposed project shall be required to use interior and exterior coatings that contain less than 100 grams of volatile organic compounds (VOC) per liter of coating.	Аррі	СРІ	PGP, PBP	EDCPD	Yes. Partly satisfied.	Measures from the East Ridg Air Quality and Greenhouse Gas Analysis (GHG) prepared by PMC (July 2014), shall be applied as part of project construction.	
spact AQ-2: Regional Air Quality Effects. affic generated by the project would increase gional emissions for reactive organic gases and ides of nitrogen (two precursors of ozone) and M_{10} by several times the threshold of gnificance.	Mitigation Measure AQ-2: In addition to the measures already included in the project, require the applicant to incorporate feasible land use, energy, and transportation measures into the project, including those listed under this mitigation measure in the main text of the EIR. However, effective implementation of these measures would not be expected to reduce project-related air emissions	EDC	SSR	РҒМ, <u>РТМ</u> РВР	EDCPD, EDCBD	Yes. Satisfied	This mitigation measure has been satisfied with evaluatio of submitted the East Ridge / Quality and Greenhouse Gas Analysis (GHG) prepared by PMC (July 2014) and application of conditions of approval from Air Quality	

-.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			м	ONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
Impact AQ-3: Air Quality Impacts from Residential Uses. Woodsmoke from project residences would affect air quality locally.	remain significant and unavoidable. Mitigation Measure AQ-3: In addition to the general restriction on open-hearth fireplaces included in the main text of the EIR under <i>Mitigation Measure AQ-2</i> , the following restriction should be adopted as a	EDC	SSR	РВР	EDCBD	Yes. Satisfied	This mitigation measure has been satisfied with evaluation of submitted the East Ridge Air Quality and Greenhouse Gas	
	 Only natural gas fueled fireplaces are permitted. 						Analysis (GHG) prepared by PMC (July 2014) and application of conditions of approval from Air Quality Management District.	
Impact AQ-4: Odor and Land Use Compatibility. The project would place new residences adjacent to an existing wastewater treatment plant. This land use relationship could expose project residents to objectionable odors, although this potential could be reduced with the anticipated installation of odor control measures funded through proposed Assessment District 12.	Mitigation Measure AQ-4. In order to reduce land use compatibility impacts between the project and the treatment plant, require the applicant to provide a 300-foot-wide open space buffer and proper noticing of potential future project occupants.	Appl.	SSR	PTM	EDCPD	Yes. Satisfied	This mitigation measure has been previously implemented with the approval of the West Valley Village Tentative Maps. Disclosures shall be distributed within one mile of the wastewater treatment plant.	
I. NOISE							- Nor 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2 - 2	
Impact N-1: Land Use/Noise Conflicts along Latrobe Road Frontage. The <u>Valley View Specific</u> <u>Plan</u> proposes some noise-sensitive residential development along Latrobe Road. Current and predicted future noise levels along this corridor would exceed the County's noise/land use compatibility standards for these particular land uses.	Mitigation Measure N-1: Noise attenuation such as earth berms or combination earth berm/wall shall be installed at the time of development of project residential structures within the affected Latrobe Road frontage area (i.e., within the projected 60 dBA L _{dn} contour) and shall be designed according to the recommendations of an acoustical engineer, subject to the approval of the County. Special noise abatement measures and specifications in the architectural design of single- and multi-family residential structures shall also be implemented	Appl.	SSR	РТМ; РВР	EDCPD, EDCBD	No. Satisfied.	This mitigation measure has been previously implemented with the approval of the West Valley Village Tentative Maps.	

The environmental miting increasing listed in column two below have been incompared into the Mall ~

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
	within the affected frontage area. Single- and multi- family housing shall incorporate noise abatement measures as necessary to achieve an interior noise level of 45 dBA L_{dn} or less. Multi-family housing, which is subject to the requirement of Title 24, Part 2, of the State Building Code, shall be reviewed and an Acoustical Report submitted to the County prior to issuance of a building permit.							
Impact N-2: Land Use/Noise Conflicts along Interior Roadway Frontages. Interior project roadways which carry an average daily traffic volume of 4,000 to 5,000 vehicles per day will typically generate a 60 L _{an} noise contour at least 50 feet from the centerline of the roadway. Residential development proposed along major and minor collectors could therefore be exposed to noise levels exceeding an L _{an} of 60 dBA (the County's maximum acceptable exterior standard).	Mitigation Measure N-2: Implement measures recommended under <i>Mitigation Measure N-1</i> above. Roadside noise barriers, i.e., either a berm, soundwall, or combination berm/wall of approximately 6-foot height, would be effective along affected major collectors. The specific height, length, and location of such barriers would depend upon the final internal traffic distribution, individual tentative map, site plans, and grading plans.	Appl.	SSR	PTM; PBP	EDCPD, EDCBD	Yes. Partly Satisfied.	An Acoustical Analysis (dated April 17, 2015 prepared by Bollard Acoustical Consultants, Inc.) has been submitted for the project. All referenced applicable noise mitigation measures shall be applied.	
Impact N-3: Wastewater Treatment Plant Area Noise. Existing or future equipment at the wastewater treatment plant would generate noise levels in planned adjacent residential areas which would exceed County land use/noise compatibility standards.	Mitigation Measure N-3: Incorporate a 300-foot buffer on the project site adjacent to the wastewater treatment plant where residential land uses are proposed. Prior to development of this area, require an Acoustical Study to analyze collector road traffic noise impacts, and an assessment of noise from the wastewater treatment plant. The Acoustical Study shall recommend measures to ensure that the County's Noise Level Performance Standards are met. It is anticipated that the 300-foot buffer will be sufficient to mitigate noise impacts from the wastewater treatment plant on adjacent residential	Аррі.	SSR	PTM	EDCPD	No. Satisfied	This mitigation measure has been previously implemented with the approval of the West Valley Village Tentative Maps.	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and <u>underline</u> text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			M	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	lmpl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	development, subject to confirmation by the Acoustical Study. The possibility of additional specific equipment noise control improvements funded by the project shall also be evaluated and implemented, if necessary.						
Impact N-4: Existing-Plus-Project Traffic Noise Impacts along White Rock Road. The existing L _{dn} noise level on White Rock Road was measured and found to be greater than 55 dBA, but less than 60 dBA, at representative residential receptors. Project traffic would increase this L _{dn} noise level by about 5 dBA along White Rock Road west of Latrobe Road and by about 7 dBA along White Rock Road east of Latrobe Road. The L _{dn} with the addition of project traffic would therefore be greater than 60 dBA along both roadway segments. Both frontages include existing noise-sensitive uses (mobile home park and individual residences).	Mitigation Measure N-4: Incorporate traffic noise mitigation measures such as earthen berms, soundwalls or combination berm/walls and setback restrictions as part of the overall program of roadway widening improvements already planned along White Rock Road to accommodate anticipated cumulative traffic increases. Incorporate fair-share funding for these noise mitigation components into the overall White Rock Road improvement program (see <i>Mitigation Measure T-14</i>). This traffic noise mitigation measure shall be designed to comply with the maximum allowable noise exposure standards set forth in Table 6-1 of the <u>EI Dorado County</u> <u>General Plan</u> (i.e., an L _{dn} of 60 dB in outdoor activity areas at residential receptors).	Appl.	SSR	PTM	EDCPD	No. Partly satisfied.	The required improvements shall be constructed in accordance with the specific CIP projects along White Rock Road.
Impact N-5: Construction Noise. Residents located south and east of the project site would occasionally be exposed to increased noise levels during heavy periods of new construction activity in adjacent portions of the project site. Construction activities during various phases would be expected to produce intermittent noise levels exceeding 60 dBA L _{eg} at these residences.	 Mitigation Measure N-5: For all construction within the specific plan area, implement the following measures pertaining to construction scheduling, public notification, and equipment maintenance and use: (a) Construction Scheduling. Limit noise-generating construction activities near sensitive land uses to the hours of 7:00 PM, Monday through Saturday. Prohibit 	Аррі.	СРІ	DPC; <u>PGP;</u> <u>PBP</u>	EDCPD	Yes. Partly Satisfied.	An Acoustical Analysis (dated April 17, 2015 prepared by Bollard Acoustical Consultants, Inc.) has been submitted for the project. All referenced applicable noise mitigation measures shall be applied.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			N	IONITORING		VERIFICATION	N OF APPLICATION TO E RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	construction on Sundays.						
	(b) Construction Equipment. Properly muffle and maintain all construction equipment powered by internal combustion engines.						
	(c) Idling Prohibitions. Prohibit unnecessary idling of internal combustion engines near sensitive receptors.						
	(d) Equipment Location. Locate all stationary noise-generating construction equipment, such as air compressors and portable power generators, as far as practical from noise- sensitive land uses.						
	(e) Quiet Equipment Selection. Select quiet construction equipment whenever possible.						
	(f) Noise Disturbance Coordinator. Designate a project Noise Disturbance Coordinator (such as a County staff person or a superintendent already working at the construction site) responsible for responding to local complaints regarding construction noise. Include the name and the phone number of the disturbance						
	coordinator on the construction schedule notification mailed to nearby residents. Post a related sign at the main entry points to the portion(s) of the project under construction						

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative

Map Approval;

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

PFM = Prior to Final Map

⁴ EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

impacts.		г					
			м	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Impact N-6: Cumulative-Plus-Project Traffic Noise Impacts along White Rock Road. Project traffic would contribute to projected cumulative increases in traffic noise at sensitive frontages along White Rock Road east and west of Latrobe Road. Both roadway segment frontages include existing noise-sensitive uses (mobile home park and individual residences).	Mitigation Measure N-6: Implement Mitigation Measure N-4.	Appl.	SSR	РТМ	EDCPD	No. Partly satisfied.	The required improvements shall be constructed in accordance with the specific CIP projects along White Rock Road.
Impact N-7: Noise Impacts to Residential Second Floors facing Latrobe Road. Projected traffic noise from Latrobe Road would contribute to interior noise impacts to residential second floors facing Latrobe Road.	Mitigation Measure N-7: All second floor windows of the residences adjacent to Latrobe Road from which Latrobe Road is visible shall be upgraded to an STC rating from 30 to 33, as determined by the Acoustical Consultant. The Acoustical Consultant shall determine the appropriate rating for the widows and provide verification to Planning Services prior to issuance of a Building Permit.	Appl.	SSR	РВР	EDCPD, EDCBD	No. Partly Satisfied.	Measure to be applied to residential development along Latrobe Road. The submitted Acoustical Analysis (dated April 17, 2015 prepared by Bollard Acoustical Consultants, Inc.)evaluated interior noise levels within residences generated by the major collector roadways located within the East Ridge Development. That analysis concluded that, due to the low projected future traffic volumes on those collector roadways, the County's interior noise level standard would be achieved without the need for upgraded window assemblies.
Impact N-8: Latrobe Road Traffic Noise: Future traffic noise levels along Latrobe Road would contribute to noise levels that would	Mitigation Measure N-8: Mechanical ventilation (air conditioning) shall be provided for all residences in this development to allow the occupants to close	Appl.	SSR	РВР	EDCPD, EDCBD	Yes. Partly Satisfied.	Residential units within East Ridge village shall include air conditioning units.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			N	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
exceed the interior noise standards as indicated within the 2004 General Plan and Valley View Specific Plan.	doors and windows as desired to achieve compliance with the applicable interior noise level criteria.							
J. PUBLIC HEALTH AND SAFETY								
Impact PHS-1: El Dorado Hills Landfill. Potential soil, groundwater and air contamination at this abandoned, unlined facility, if not remediated prior to project construction, may create health hazards for construction workers and future occupants of the West Valley Village.	Mitigation Measure PHS-1: The applicant shall implement the following: (a) contact appropriate jurisdictional authorities such as the California Integrated Waste Management Board (CIWMB), the Central Valley Regional Water Quality Control Board (RWQCB), and the Placer County Environmental Health Services Department, regarding landfill closure; (b) conduct a detailed environmental assessment of the landfill site to determine if any soil or groundwater contamination exists; (c) depending on the level of contamination identified, either provide for minimum segregation of the landfill by designating it open space or parkland or provide for maximum segregation of the landfill (i.e., install fencing) to limit human exposure; and (d) complete clean-up prior to approval and recordation of any final subdivision map that includes the affected areas	Аррі.	SSR	РТМ	EDCPD	No. Satisfied.	This mitigation measure has previously been satisfied through coordination with applicable agencies.	
Impact PHS-2: Placer-mined Drainages. Potential mercury contamination in project site drainages, if not remediated prior to project construction, may create health hazards for construction workers and future project occupants.	Mitigation Measure PHS-2: The applicant shall implement the following: (a) collect representative wet sediment samples from stream areas that have been placer-mined and analyze the samples for mercury; (b) assess the vertical and lateral extent of elevated levels of mercury in sediments, if present, via surface and subsurface sample collection and laboratory analyses; and (c) assess the risk associated	Appl.	отс	РТМ	EDCPD, EDCDEH	Yes. Satisfied.	Supporting memorandum from Youngdahl concludes that, given the location of the placer mined drainages within the East Ridge open space lots, potential health risk is determined to be insignificant.	

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			м	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
	with elevated levels of mercury in sediments, and either restrict access to the area or remediate the contaminated materials to a level acceptable to the El Dorado County Department of Environmental Health.						
Impact PHS-3: Future Commercial/Office/R&D Uses. Future commercial, office, and R&D uses in the West Valley Village may store, handle, or transport hazardous substances that would have the potential to cause soil or groundwater contamination on the site.	Mitigation Measure PHS-3: The County shall require future onsite commercial development to prepare business plans that describe management of hazardous substances and procedures for handling potential releases of these substances.	EDC	отс	ΡΡΟ	EDCDEH	No. Satisfied.	If any commercial development should occur within VVSP, it would require full compliance with this measure.
Impact PHS-4: El Dorado Hills Waste Water Treatment Plant. Potential soil, surface water, and groundwater contamination and odor problems at the El Dorado Hills Waste Water Treatment Plant may create health hazards for construction workers and future occupants of the southern portion of White Rock Village and the northern portion of West Valley Village.	Mitigation Measure PHS-4: The County shall (a) implement <i>Mitigation Measure AQ-4</i> (see Section IV.I (Air Quality)); and (b) require the applicant to design the project to accommodate the existence of buried pipelines leading to and from the treatment plant.	Appl.	SSR	PTM	EDCPD	No. Satisfied.	As applicable, this mitigation has been applied to West Valley Village Maps.
K. CULTURAL RESOURCES							
Impact CR-1: Impacts on Prehistoric Sites (CA- ELD-80/H, CA-Eld-785/H, Ca-Eld-788, V1, V2, V4, V5, V10, V14, V15, V16, V19, V20, V22, V23, V24, V27, V38, V42, V43). The project could disturb these prehistoric sites.	Mitigation Measure CR-1: Avoid disturbance of these significant prehistoric sites, if feasible. Where avoidance is not feasible, develop and implement an appropriate mitigation program as specified under <i>Mitigation Measures CR-1</i> in section IV.L.4 of the EIR (see EIR text for details). Potentially Significant Unavoidable Impact	Аррі.	SSR	РТМ	EDCPD	Yes. Partly Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) for East Ridge analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Impact CR-2: Impacts on Placer Mining Sites (CA-Eld-80/H, V12, V21, V25, V39, V40, V41).	Mitigation Measure CR-2: Protect and avoid disturbance of mining sites to the extent possible.	Appl.	SSR	PTM	EDCPD	Yes. Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) for

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			M	ONITORING	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
The project could disturb these historic mining sites.	Where avoidance is not feasible, conduct additional documentation and analysis of the various mining sites as specified in section IV.D.4 of the EIR. Potentially Significant Unavoidable Impact						East Ridge analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Impact CR-3: Impacts on Mining Habitation Sites (V6, V7, V9, V17, V29, V30, V31, V32, V33, V34, V35, V36, V37, V44). The project could disturb these historic mining habitation sites.	Mitigation Measure CR-3: The applicant shall implement the following: (a) Hire a qualified archaeologist to conduct additional archival research and archaeological field test excavation of these sites. (b) Hire a qualified archaeologist to document these sites and avoid or protect them to the extent possible. Potentially Significant Unavoidable Impact	Appl.	SSR	PTM	EDCPD	Yes. Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Impact CR-4: Impacts on Way Station Site (V18). The project could disturb this historic site	Mitigation Measure CR-4: The applicant shall implement the following: (a) Hire a qualified archaeologist to conduct additional archival research and archaeological field test excavation of this site. (b) Hire a qualified archaeologist to document the site and avoid or protect it to the extent possible. (c) Implement the list of mitigation strategies listed under Mitigation Measure CR-4 in section IV.L.4 of the EIR.	Appl.	SSR	PTM	EDCPD	No. Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) analyzed the identified resources to be off-site.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

IDENTIFIED IMPACT (O Potential Impact CR-5: Impacts on Ranching Habitation Sites (CA-Eld-786-H, CA-Eld-787-H, V3, V8, V13, V16, V28). The project could disturb these historic sites. (a) Hirr additiona		Impl.	Type of		Monitoring	MM Applies to East	
Impact CR-5: Impacts on Ranching Habitation Mitigation Sites (CA-Eld-786-H, CA-Eld-787-H, V3, V8, V13, impleme V16, V28). The project could disturb these (a) Hirr historic sites. (a) Hirr additionates excan test excan	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Entity ¹	Monitoring Action	Timing Requirements ³	and Verification Entity ⁴	Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
Sites (CA-Eld-786-H, CA-Eld-787-H, V3, V8, V13, impleme V16, V28). The project could disturb these impleme historic sites. (a) Hirr additionates test exca	ally Significant Unavoidable Impact					[]	
documer the exter	ion Measure CR-5: The applicant shall ent the following: ire a qualified archaeologist to conduct nal archival research and archaeological field cavation of these sites. Hire a qualified archaeologist to ent these sites and avoid or protect them to ent possible.(c) ially Significant Unavoidable Impact	Appl.	SSR	ΡΤΜ	EDCPD	Yes. Partly Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) for East Ridge analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Heritage Resources. The project could disturb buried or concealed heritage resources discovered during project construction. implemention (a) in the heritage area of the for recommendation (b) if hun cease we coroner, (b) If hun cease we coroner, (c) Hire a developr impacts.	ion Measure CR-6: The applicant shall eent the following: the event of discoveries of buried or concealed e resources, cease project activities in the the find and consult a qualified archaeologist ommended procedures. The find and consult a qualified archaeologist pommended procedures. The find and consult a qualified archaeologist ownended procedures. The find and consult a qualified archaeologist ownended procedures. The find and consult a qualified archaeologist ownended procedures. The find and consult a qualified archaeologist ownent of appropriate mitigation of site s. The find archaeologist to assist in the ownent of appropriate mitigation of site s.	Appl.	CPI	DPC; <u>PGP</u> ; <u>PBP</u>	EDCPD	Yes. Partly Satisfied.	Cultural Resource Study by ECORP (January 13, 2015) for East Ridge analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Impact CR-7: Impacts on Buried/Undiscovered Mitigation Traditional Cultural Properties. The project the local	any significant unavoluable impact						۹.

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action, PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			Μ	IONITORING		VERIFICATIO	N OF APPLICATION TO EAST RIDGE
	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note
could disturb buried or concealed traditional cultural properties discovered during project construction.	 order to determine areas of potential traditional cultural importance. The applicant shall implement the following: (a) Maintain the initial contacts established with the Shingle Springs Band of Miwok and the El Dorado Indian Council during the archaeological inventory phase as part of ongoing operations. (b) In consultation with local Native Americans, research the available project-specific ethnographic data pertaining to local Nisenan and Miwok groups within the project vicinity. (c) In the event of discoveries of buried or concealed heritage resources, cease project activities in the area of the find and consult a qualified archaeologist for recommended procedures. (d) If human remains are inadvertently discovered, cease work immediately and notify the county coroner. (e) Hire a professional archaeologist to assist in the development of appropriate mitigation of site impacts. 						East Ridge analyzed the identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.
Impact CR-8: Impacts on Linear Features. Four discrete mining ditch systems (V-LF1, V-LF22, V- LF43, and V-LF45), one mining road (V-LF42), four	Potentially Significant Unavoidable Impact Mitigation Measure CR-8: Protect and avoid disturbance of these linear features to the extent possible. If avoidance is not feasible, conduct	Appl.	SSR	PTM	EDCPD	Yes.	Cultural Resource Study by ECORP (January 13, 2015) for East Ridge analyzed the

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval:

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department: EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

			N	IONITORING		VERIFICATION OF APPLICATION TO EAST RIDGE		
	RELATED MITIGATION MEASURES (MM) (OR CHANGE TO THE SPECIFIC PLAN)	Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note	
road transportation systems (V-LF7, V-LF18, V- LF24, V-LF41) one ranch water conveyance system (V-LF44), and 38 rock walls (AF-9-76-H, AF-9-77-H, V-LF2 through V-LF6, V-LF8 through V- LF17, V-LF19 through V-LF21, V-LF23, V-LF25 through V-LF40) are coherent parts of larger transportation, mining, and ranching systems and appear to possess sufficient research value to qualify them as "historical resources" as defined by Public Resources Code section 21084.1. The project could disturb these linear features.	additional field recordation and documentation to determine which features are significant contributing elements to the larger feature systems associated with transportation, mining and ranching. Preserve representative examples of each feature system. Potentially Significant Unavoidable Impact					27 - 1011111111 - 11 - 14 - 140	identified resources. Identified measures, including siting of resources within open space area, from the study shall be applied.	
L. ENERGY Impact E-1: Long-Term Project Energy Use Impact. At buildout, the residential, commercial and public facility uses proposed by the project could use an estimated 2.32 million therms of energy each year.	Mitigation Measure E-1: Require the project to comply with Title 24 Energy Efficiency Standards.	EDC	PC	PBP	EDCBD	Yes. Partly Satisfied.	This mitigation measure will occur at the time of building permit issuance.	
Impact E-2: Transportation-Related Energy Consumption. Unless the project provides substantially for modes of transportation that offer viable alternatives to the automobile, the project would be expected to result in comparatively wasteful uses of transportation fuel.	Mitigation Measure E-2: Reduce automobile trips by facilitating and encouraging use of local public transit opportunities and other alternative modes of transportation. Implement the following measures: . Develop a bikeway and pedestrian trail system along major roadways to connect residences to the Village Center and existing commercial centers and park-and-ride lot north of the site. . Require the installation of secure bicycle	Appl.	SSR	РҒМ <u>РТМ</u> <u>РВР</u>	EDCPD	Yes. Partly Satisfied.	This mitigation measure will occur at the time of building permit issuance. However, the TM has bikeways and pedestrian circulation plan and bus turnouts provided in the project.	

The environmental mitigation measures listed in column two below have been incorrected into the Velley View Specific Plan in order to mitigate identified environmental

1 Appl. = Applicant; EDC = El Dorado County 2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review

3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts.

			М	ONITORING		VERIFICATIO	VERIFICATION OF APPLICATION TO EAST RIDGE		
IDENTIFIED IMPACT		Impl. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	MM Applies to East Ridge? (Yes or No); Satisfied/ Partly Satisfied	Note		
	parking facilities at project schools commercial areas and parks.								
	. Wire each housing unit to allow use of emerging electronic communication technology.								
	. Implement feasible travel demand management (TDM) measures for a project of this type. This would include a ride-matching program (i.e., an information service for residents interested in								
	carpooling) and a public education program to inform residents of ridesharing and transit opportunities.								

1 Appl. = Applicant; EDC = El Dorado County

2 CPI = Construction Period Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Prior to Issuance of Building Permit; PGP = Prior to Issuance of Grading Permit; PPO = Prior to Project Occupancy; STR = Specialized Timing Requirement; PTM = Prior to Tentative Map Approval;

PFM = Prior to Final Map

4 EDCPD = El Dorado County Planning Department; EDCSD = El Dorado County Sheriff's Department; EDHFD = El Dorado Hills Fire District; EDCDOT = El Dorado County Department of Transportation; EDCBD = El Dorado County Building

Department; EDCDEH = EI Dorado County Department of Environmental Health

*2013 Updates are shown in strikeout and underline text.

OAK TREE PROTECTION, REVEGETATION, AND MONITORING PLAN FOR EAST RIDGE VILLAGE OF THE VALLEY VIEW SPECIFIC PLAN EL DORADO COUNTY, CALIFORNIA

Prepared For: HBT EAST RIDGE, LLC

December 17, 2014

Prepared By: Ralph Osterling Registered Professional Forester #38 State of California

Ralph Osterling Consultants, Inc. 1650 Borel Place, Suite 204 San Mateo, CA 94402

EXHIBIT V

15-0660 D 143 of 288

TABLE OF CONTENTS

1.0	EXECUTIVE SUMMARY	1
2.0	INTRODUCTION	4
2.1	Project Location and Description	5
2.2	Oak Woodland Tree Canopy Habitat Mitigation Requirements	5
3.0 METHO	OAK WOODLAND TREE CANOPY HABITAT INVENTORY AND IMPACT ASSESSMENT ODS	8
3.1	1996 General Plan Policy 7.4.4.4	8
3.2	Public, Multi-Use and Transitional Open Space	10
3.3	Oak Woodland Tree Canopy Habitat Impact Assessment	10
4.0	PRE-DEVELOPMENT OAK WOODLAND TREE CANOPY HABITAT	16
5.0	OAK WOODLAND TREE CANOPY HABITAT IMPACT ANALYSIS	17
6.0	POTENTIAL MITIGATION METHODS	19
7.0	OAK WOODLAND TREE CANOPY HABITAT REPLACEMENT AND DESIGN GUIDELINES	20
7.1	Proposed Planting Locations	20
7.2	Oak Tree Regeneration and Planting	24
7.3	Oak Tree Mitigation Requirements for Planting	25
7.4	Oak Woodland Landscaping Maintenance Techniques	25
8.0	OAK WOODLAND TREE CANOPY HABITAT REPLACEMENT MONITORING PROTOCAL	26
8.1	Success Criteria	26
8.2	Monitoring and Reporting	26
8.3	Mitigation Monitoring Responsibility	27
9.0	TREE PRESERVATION PROTOCAL	28
9.1	Protection During Construction	28
9.2	Post-Construction Actions	29
9.3	Maintenance Within The Tree Protection Zone	29
10.0	REGISTERED PROFESSIONAL FORESTER OAK TREE ASSESSMENT	31
10.1	1996 General Plan Policy 7.4.5.1	31
10.2	Forester Oak Tree Survey	31
10.3	Forester Oak Tree Impact Assessment	32
10.4	Forester Summary	33
11.0	REFERENCES	36

List of Figures

Figure 1-	Site and Vicinity Map	7
Figure 2-	Pre-Development Oak Woodland Tree Canopy Habitat	9
Figure 3-	Specific Plan Original Open Space Boundary	
Figure 4-	Proposed Project Open Space Boundary	
Figure 5-	Site, Grading, and Building Envelope Plan	
Figure 6-	Oak Woodland Tree Canopy Habitat Impacts (Tree Preservation Map)	
Figure 7-	Available Planting Areas (Mitigation Areas On-Site)	
Figure 8-	Typical Residential Lot Without Transitional Open Space Area	
Figure 9-	Typical Residential Lot With Transitional Open Space Area	
Figure 10-	36" and Larger Oak Trees	
Figure 11-	35" and Smaller Oak Trees Random Samplings	

List of Tables

Appendix E-

Table 1-	Oak Canopy Impacts, Replacement Requirements, and Available Planting Acreage	2
Table 2-	Open Space Areas and Oak Woodland Tree Canopy Habitat	3&17
Table 3-	Oak Woodland Tree Canopy Habitat Impacts and Replacement Requirements	
Table 4-	Available Oak Woodland Tree Canopy Habitat Mitigation Planting Areas	20
Table 5-	Health Rating Scale	26
Table 6-	Arborist Tree Assessment for 36" and Larger Oak Trees Health Rating	98
Table 7-	Arborist Tree Assessment for 35" and Smaller Oak Trees Health Rating Random Sampling	gs100
Table 8-	36" and Larger Oak Trees To Be Removed	103
Table 9-	35" and Smaller Oak Trees To Be Removed Radom Samplings	106
Appendix A-	Applicable EIR Mitigation Measures Monitoring Checklist and Specific Plan Conditions of Approvals 6 and 28	
Appendix B-	1996 General Plan Policies 7.4.4.4 and 7.4.5.1	
Appendix C-	El Dorado Hills Valley View Specific Plan Chapter 9	48
Appendix D-	Draft Conceptual Tree Mitigation Plan and Figure F-1 of the Draft EIR	85

ii

The proposed East Ridge Village is the most remote residential area and has the lowest density of the three villages within the Valley View Specific Plan (VVSP). The proposed East Ridge Village project consist of 701 residential lots located on approximately 734.5 acres in western El Dorado County, California. The VVSP Final Environmental Impact Report (FEIR) and the Mitigation Measures Adopted with the Specific Plan Conditions of Approvals for the project requires implementation of several oak tree protection measures during construction for those trees to be preserved onsite, compensation for impacted oak tree canopy according to the 1996 El Dorado County General Plan Policies 7.4.4.4., 7.4.5.1, and post-construction monitoring for preserved and mitigation of oak trees.

The VVSP Mitigation Measures BR-3 and BR-4 were analyzed at the time of the Specific Plan approvals and found to be in substantial compliance with the intent of the said mitigation measures based upon the following. The current mitigation monitoring checklist states the following requirements to satisfy BR-3 and BR-4: *Note: Condition #6 of the Valley View Specific Plan Conditions of Approvals (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through a combination of chapter 9 of the Specific Plan and Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1 to be submitted with tentative map applications" and specifies the following revision to the Specific Plan... "All trees above 24" in diameter at breast height shall be shown on the plan. If any 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process." Also, "A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with the tentative map application."*

The building envelope (primary building area) is restricted to an area of 12,000 square feet (sf) or 25 percent of the total lot area, whichever is greater in all the Estate Residential (ER) areas in the East Ridge Village project. The project has prepared a Preliminary Building Envelope Diagram plan for the project. This *Oak Tree Protection, Revegetation, and Monitoring Plan* (Plan) provides a comprehensive analysis regarding Oak Trees Canopy Habitat and Oak Tree Protection for the East Ridge Village project.

Prior to development within the East Ridge Village area of the VVSP, the site contains approximately 170.6 acres of Oak Savannah, approximately 386.4 acres of Oak Woodland and approximately 13.6 acres of Great Valley Mixed Riparian oak tree canopy habitat. For a total of approximately 570.6 acres of Oak Woodland Canopy Habitat. According to the 1996 El Dorado County General Plan Policy 7.4.4.4, the project is required to retain or replace 70% of the predevelopment tree canopy cover. A total canopy impact of approximately 171.18 acres (570.6 acres of existing canopy minus 399.42 acres to be retained) is allowable for the entire East Ridge Village without triggering oak canopy replacement requirements.

Based upon the proposed tentative map and the preliminary designs for the entire project approximately 81.3 acres of Oak Savannah, approximately 118.1 acres of Oak Woodland and 0.00 acres of Great Valley Mixed Riparian oak tree canopy habitat will be impacted. A total of approximately 199.4 acres of oak canopy habitat will be impacted. In order to comply with 1996

El Dorado County General Plan Policy 7.4.4.4, the project is required to replace approximately 28.22 acres (See **Table 1**) of oak tree canopy (199.4 acres of canopy impact minus 171.18 acres of allowable canopy impact under 1996 El Dorado County General Plan Policy 7.4.4.)

Table 1 summarizes the canopy impacts, replacement requirements, and available planting areas for the project area analyzed in this Plan. By comparing the total available on site planting acreage (column J) with the project's oak canopy replacement requirements (column F), the project can potentially replace up to 280% of its canopy replacement requirements on site, which would substantially exceed the 1996 El Dorado County General Plan Policy 7.4.4.4 requirements.

Oak Woodland Tree Canopy Habitat Impacts & Replacement Requirements						Oak Tree Mitigation Planting Areas							
APPROVED PROJECTS						1992	1997	EPI N <u>E</u> L	$\partial M \partial \hat{\pi}$		Cara da la	41 A	
A	В	С	D	E	F		7	I	ł		I	J	J
Project Area	Pre-Dev. Canopy (acres)	Preserved N Canopy M	Meet Gen.	Oak Canopy Replacement Reg. (acres)			Residential Lots (acres) [b]		Open Space Areas (acres)		Total On-site Planting Acreage		
	((acres)	((ac.)		Available	Actual	Available	Actual	Available	Actual	Available	Actua
East Ridge Village 701 lots (735 acres)	570.60	199.40	371.20	399.42	28.22	10.10	[c]	40.06	[0]	29.10	[c]	79.26	(c
TOTAL	570.60	199,40	371.20	399.42	28.22	10.10	[c]	40.06	[0]	29.10	[c]	79.26	[4

Table 1 - East Ridge Village Oak Woodland Tree Canopy Habitat Requirements And On Site Planting Areas

[a] Represents estimated plantable streetscape and landscape areas

[b] Represents 2 trees planted per lot for 701 lots. (See figures 8 and 9)

(c) Acreages not available at this time

To protect additional oak tree canopy habitat the proposed project incorporated the following: 1) clustered the development to retain the largest contiguous oak woodland habitat areas, 2) prepared a Preliminary Building Envelope Diagram plan to identify the primary building areas and the transitional open space area for each of the lots and 3) increased the public Open/Multi-Use Space areas to allow for contiguous oak woodland habitat and wildlife habitat corridors.

The project clustered the development in areas where limited oak tree canopy habitat exists or where no oak tree canopy habitat exists. These clustered development areas are located in the flatter area to reduced grading impacts. This allowed smaller lots to be located in these areas and larger lots to be located in the areas where oak woodland canopy habitat is prevalent and trees will be preserved

By applying the above measures the project increased the amount of public/ multi-use open space and transitional open space. East Ridge Village originally contemplated approximately 138 acres of public/multi-use open space. The proposed project has provided for approximately 204 acres of public/multi-use open space. This is an increase of 66 acres of public and multi-use open space than was originally planned for the East Ridge Village area. This increase of 66 acres of public/multi-use open space protects approximately 50 acres of additional oak tree canopy habitat. (See **Table 2**).

In addition to the public/multi-use open space, transitional open space areas on several lots are provided. A total of approximately 244 acres of transitional open space area has been provided in the project design. Approximately 178 acres of oak tree canopy habitat is preserved within these transitional open space areas. (See **Table 2**) By increasing both the public/multi-use open space areas and providing transitional open space areas, a total of approximately 280 acres of additional protection of the oak tree canopy habitat has been added to the project.

	- 3 weather that the state water	1 6. 17 6. 2. 1 19 35. 344	Area and Oak Wo	and a second	opy Habitat		Oak Woodl and Tr	onal Open Space and ee Canopy Habitat
APPROVED SPECI	FIC PLAN AND P B	C C	D D	ACE E	F	G	PROPOSED PRO H	JECT T
Project Description	Public/Multi-Use Open Space Per Specific Plan Located in East Ridge Village	Preserved Oak Canopy Habitat Per Specific Plan	Public/Multi-Use Open Space Per Tentative Map Located in East Ridge Village	Preserved Oak Canopy Habitat Per Tentative Map	Additional Public/Multi- Use Open Space	Additional Preserved Oak Canopy Habitat Per Proposed Project	Transitional Open Space Per the Proposed Project is	Preserved Oak Canop Habitat
East Ridge Village 701 lots (735 acres)	138.00	100.30	204.00	150.30	66.00	50.00	240.00	178.00
TOTAL	138.00	100.30	204.00	150.30	66.00	50.00	240.00	178.00

Oak trees that are 24" in diameter at breast height (dbh) or greater that could be impacted by the proposed project's development were identified. In addition, the health for oak trees that are 36" in diameter at breast height or greater were assessed. The health assessment was performed by Ralph Osterling a Registered Professional Forester using the standard health rating scale. There are 70 oak trees that were 36" dbh or greater. Of those 10 are in good condition, 26 are in fair condition, 22 are in poor condition and 12 are in very poor condition.

To insure all methods of avoidance will be achieved for the healthier oak trees, the Registered Forester in conjunction with the Project Engineers worked together closely on the preliminary site and grading plans for the project. All possible methods of avoidance were incorporated in this design process which including providing retaining walls, lot configurations, roadway layouts and open space areas to protect as many of the healthier trees as possible. A total of 20 oak trees 36" dbh or greater of the 70 oak trees surveyed are currently slated to be removed due to project grading and impacts. Of the 20 oak trees to be removed, 3 are in good condition, 6 are in fair condition, 11 are in poor condition and 0 are in very poor condition. In addition to the above trees to be removed 14 trees were also recommended to be removed by the Registered Forester due to very poor conditions and for safety reasons. The overall health assessment for oak trees that are 36" in diameter or greater to be removed are outlined in **Tables 6 and 8** and as shown in **Figure 10 in Appendix E**.

A random sampling of 145 oak trees less than 36" dbh were also surveyed to determine condition and health. Of those 13 are in good condition, 59 are in fair condition, 44 are in poor condition and 29 are in very poor condition. A total of 27 oak trees of the 145 oak trees surveyed are currently slated to be removed due to project grading and impacts. Of the 27 oak trees to be removed, 3 are in good condition, 13 are in fair condition, 11 in poor condition and 0 in very poor condition. There were 32 oak trees also recommended to be removed by the Registered Forester do to very poor conditions and for safety reasons. The overall health assessment for the randomly selected oak trees that are less than 36" in diameter are outlined in **Tables 7 and 9** and as shown in **Figure 11 in Appendix E**.

In addition to the detailed analysis that resulted in the acreages presented in Tables 1, 2, 3 and 4, this document also outlines planting guidelines, maintenance requirements, monitoring protocol for the mitigation oak trees, oak tree protection measures, post-construction monitoring guidelines for those trees that are preserved during construction and reporting procedures.

2.0 INTRODUCTION

This Oak Tree Protection, Revegetation and Monitoring Plan (Plan) has been developed for the East Ridge Village project located in the County of El Dorado, California. East Ridge Village is located within the approved Valley View Specific Plan (VVSP) and is one of the three Villages described within the VVSP. The project is located south of U.S. Highway 50 and east of Latrobe Road in El Dorado Hills, California. The 734.5 acres of property is identified by Assessor Parcel numbers 118:130:28, 31, 35 and 40.

This document implements Mitigation Measures BR-3 and BR-4 of the VVSP Final Environmental Impact Report (FEIR) and the Mitigation Measures Adopted with the Specific Plan Conditions of Approvals for the project as approved by the El Dorado County Board of Supervisors. The VVSP Mitigation Measures BR-3 and BR-4 were analyzed at the time of the Specific Plan approvals and found to be in substantial compliance with the intent of the said mitigation measures based upon the following. The current mitigation monitoring checklist states the following requirements to satisfy BR-3 and BR-4: Note: Condition #6 of the Valley View Specific Plan Conditions of Approvals (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through a combination of chapter 9 of the Specific Plan and Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1 to be submitted with tentative map applications" and specifies the following revision to the Specific Plan... "All trees above 24" in diameter at breast height shall be shown on the plan. If any 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process." Also, "A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with the tentative map application."

Both mitigation measures as shown in the mitigation monitoring checklist are attached in **Appendix A**. The mitigation measures require that canopy retention or replacement be provided for impacted oak woodland canopy habitat according to the 1996 El Dorado County General Plan Policies 7.4.4.4 and 7.4.5.1. Policy 7.4.4.4 provides information on how much oak woodland canopy habitat must be retained or replaced, based on the percentage of oak canopy that exists prior to development. Whereas policy 7.4.5.1 provides for native vegetation and landmark trees to be protected and maintained, native trees including oaks and landmark and heritage oaks. A tree survey, preservation, replacement plan and monitoring plan for replacement trees. Both policies are attached in **Appendix B**. The mitigation measures also requires implementation of oak tree protection measures be taken during construction to protect oak trees that are to be preserved. Oak woodland landscaping techniques and oak tree regeneration techniques are also outlined in Chapter 9 of the Specific Plan. (See **Appendix C**). In addition, a building envelope diagram plan showing the primary building areas and transitional open space area will be submitted with the tentative map showing preserved trees 36" dbh and larger.

This document also outlines planting guidelines, maintenance requirements, monitoring protocol for the mitigation oak trees, oak tree protection measures, post-construction monitoring guidelines for those trees that are preserved during construction plus reporting procedures.

2.1 **Project Location and Description**

The proposed East Ridge Village project consist of 701 residential lots and two proposed Park sites, located in El Dorado County, California. (Figure 1) The 734.5 acres of property is identified by Assessor Parcel Numbers 118:130:28, 31, 35 and 40, and is located on the south side of White Rock Road. The extension of the existing Valley View Parkway at the intersection of Blackstone Parkway and Valley View Parkway will provide for the main access to the site. East Ridge Village is located within the approved Valley View Specific Plan (VVSP) and is one of the three Villages described within the VVSP. East Ridge Village is the most remote residential area and has the lowest density of the three villages within the VVSP. It is intended to be developed as custom, semi-custom and production single family detached home sites designed to coexist with the natural terrain and native vegetation cover. The East Ridge Village will be developed using the zoning as outlined in the VVSP. The project site is dominated by non-native grassland and native oak woodland and savannah habitat. Elevations on the site range from approximately 775 feet to 1225 feet above mean sea level.

2.2 Oak Woodland Tree Canopy Habitat Mitigation Requirements

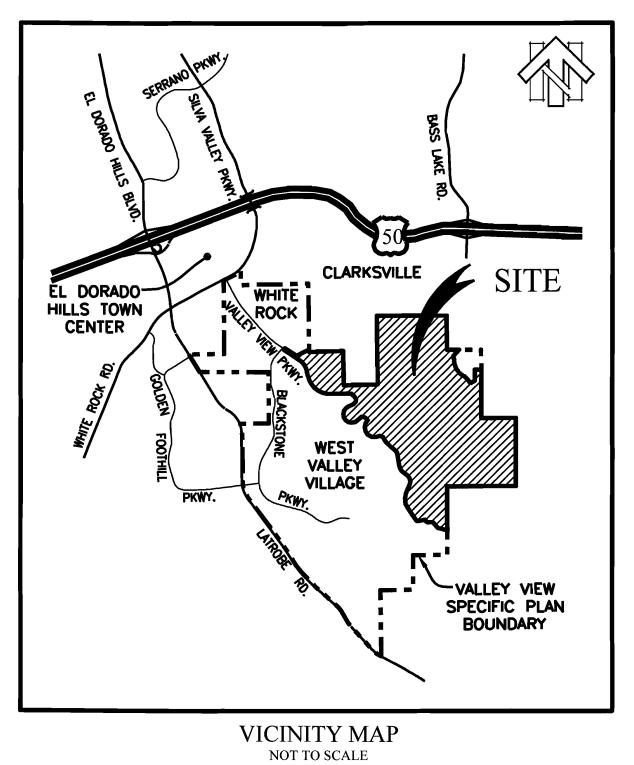
This document implements Mitigation Measures BR-3 and BR-4 of the VVSP Final Environmental Impact Report (FEIR) and the Mitigation Measures Adopted with the Specific Plan Conditions of Approvals for the project as approved by the El Dorado County Board of Supervisors (1998). Both mitigation measures outlined in the mitigation monitoring checklist have been attached in Appendix A. The VVSP Mitigation Measures BR-3 and BR-4 were analyzed at the time of the Specific Plan approvals and found to be in substantial compliance with the intent of the said mitigation measures based upon the following: The current mitigation monitoring checklist states the following requirements to satisfy BR-3 and BR-4: Note: Condition #6 of the Valley View Specific Plan Conditions of Approvals (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through a combination of chapter 9 of the Specific Plan and Condition #28, which requires "demonstration of tree preservation program consistent with General Plan Policies 7.4.4.4 and 7.4.5.1 to be submitted with tentative map applications" and specifies the following revision to the Specific Plan ... "All trees above 24" in diameter at breast height shall be shown on the plan. If any 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process." Also, "A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with the tentative map application."

Elements of the Plan are required to appear as standards in the tentative subdivision map, improvement plans, and Codes, Covenants, and Restrictions. The East Ridge Village will be required to adhere to the oak woodland canopy retention and replacement standards as described in this document.

A detailed analysis of oak woodland canopy habitat impacts as well as the specific mitigation areas to be planted, have been developed and identified as part of the tentative map processes. Preliminary grading plans and a Preliminary Building Envelope Diagram plan have been prepared to determine oak woodland canopy habitat impacts. The exact extent of oak woodland

canopy habitat loss can only be determined after final grading plans and primary building areas are defined.

Therefore, Ralph Osterling Consultants, Inc. conducted a detailed oak woodland canopy habitat inventory, tree survey health assessment and has prepared the following oak tree protection, revegetation, and monitoring plan for the 734.5 acre East Ridge Village project.





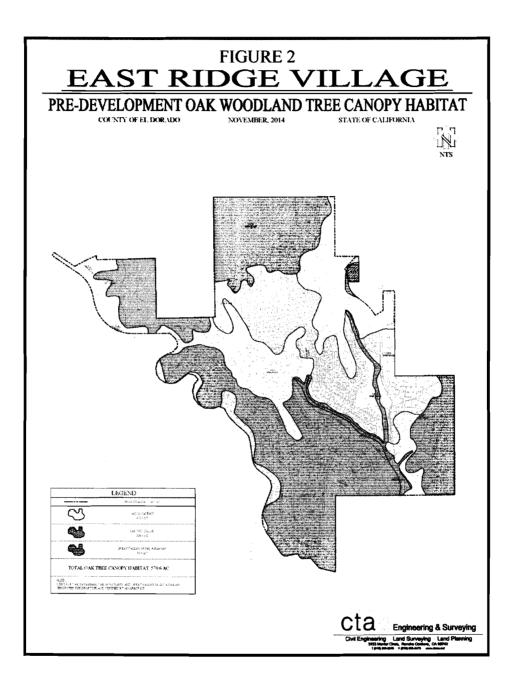
3.1 1996 General Plan Policy 7.4.4.4

The 1996 El Dorado County General Plan Policy 7.4.4.4 establishes canopy coverage retention or replacement standards for impacts to oak woodland canopy habitat rather than individual oak trees. Quantifying the extent of existing oak woodland canopy is more representative of defining oak woodland habitat than measuring tree trunk diameter or counting the absolute number of trees in the woodland. In order to determine the percent of canopy cover to be retained or replaced by the project, the amount of oak woodland tree canopy acreage on the project site had to be determined.

The amount of oak woodland tree canopy on the project was preliminarily determined at the time of the approval of the Specific Plan. A draft conceptual tree mitigation plan was prepared by Jeffrey A Hart a Licensed Arborist had been prepared for the project. This draft tree mitigation plan was later updated and included in Chapter 9 of the Specific Plan. Figure F-1 of the Draft Environmental Impact Report (DEIR) identified the different plant communities over the entire VVSP. Both the draft conceptual tree mitigation plan and Figure F-1 are attached in Appendix **D**. To determine the existing oak woodland tree canopy habitat for this project, a combination of the aerial photography of the site, tree and site surveyed oak trees and Figure F-1 of the plant communities as identified in the DEIR. Remote sensing (computerized aerial photo interpretation) techniques were used to identify the areas on the site that were covered by oak trees and field surveying of oak trees and site assessment of oak trees were completed for the site. To be consistent with the Specific Plan approvals, the boundaries were overlaid for the Oak Savannah, Woodlands and Mixed Riparian plant communities identify in Figure F-1 onto the aerial photo and the tree surveys. It was confirmed that the oak tree canopy habitat matched up with the original plant communities as identified in the DEIR Figure F-1. The total acreage of oak tree canopy habitat on the project site was calculated (Figure 2). This figure is consistent with the Specific Plan approvals for the project. General Plan Policy 7.4.4.4 establishes the following criteria for oak canopy retention or replacement:

Policy 7.4.4. The County shall apply tree canopy coverage standards to discretionary permit review applicable to oak woodland habitats. Parcels having canopy cover by trees of at least 10 percent, as determined from base line aerial photography or by site survey performed by a qualified licensed arborist or botanist, are subject to canopy coverage retention or replacement standards:

Existing Canopy Cover	Percent of Canopy to be Retained or Replaced
80-100 percent	.60 of existing canopy
60-79 percent	.70 of existing canopy
40-59 percent	.80 of existing canopy
20-39 percent	.85 of existing canopy
19 percent or less	.90 of existing canopy
Specific standards shall be included in	
the Zoning Ordinance	



3.2 Public, Multi-Use and Transitional Open Space

One of the policy requirements for the East Ridge Village is to reduce the footprint of the developed portion of residential lots to provide an open landscape managed for fire protection, oak woodland conservation and interlinked wildlife corridors.

To protect additional oak tree canopy habitat the proposed project incorporated the following: 1) clustered the development to retain the largest contiguous oak woodland habitat areas, 2) prepared a Preliminary Building Envelope Diagram plan to identify the primary building areas and the transitional open space area for each of the lots and 3) increased the public Open/Multi-Use Space areas to allow for contiguous Oak Woodland habitat and wildlife habitat corridors.

The project clustered the development in areas where limited oak woodland canopy habitat existed or where no oak woodland canopy habitat exists. These clustered development areas are located in the flatter area to reduced grading impacts. This allowed smaller lots to be located in these areas and larger lots to be located in the areas where oak woodland tree Canopy habitat is prevalent. This VVSP zoning code allows for this type of clustering in all of the Estate Residential Districts (ER). The majority of the oak woodland canopy habitat are located on the ridgelines and steeper areas of the project.

Chapter 9 "Community Design" of the VVSP provide grading and site design criteria for the ridgelines. The VVSP limits the primary building areas to no more than 12,000 square feet or 25% of the individual lots, whichever is greater within each lot. With more of the smaller lots to be clustered in areas with minimal amount of oak woodland canopy habitat, this allowed less and larger lots to be located in the areas of significant oak woodland canopy habitat. These larger lots, then allowed for larger areas for transitional open space.

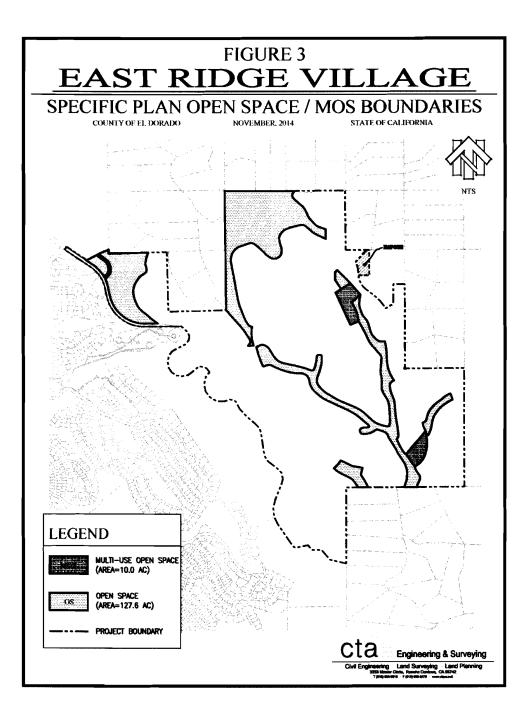
East Ridge Village originally contemplated approximately 138 acres of public/multi-use open space. (Figure 3) Due to the protection of natural and cultural resources additional public/multi-use open space area has been provided in the plan. This allowed for additional protection of oak woodland canopy habitat and provided for wildlife corridors. The proposed project provides for approximately 204 acres of public/multi-use open space. (Figure 4) This is an increase of 66 acres of public and multi-use open space than what was originally planned for in the East Ridge Village area.

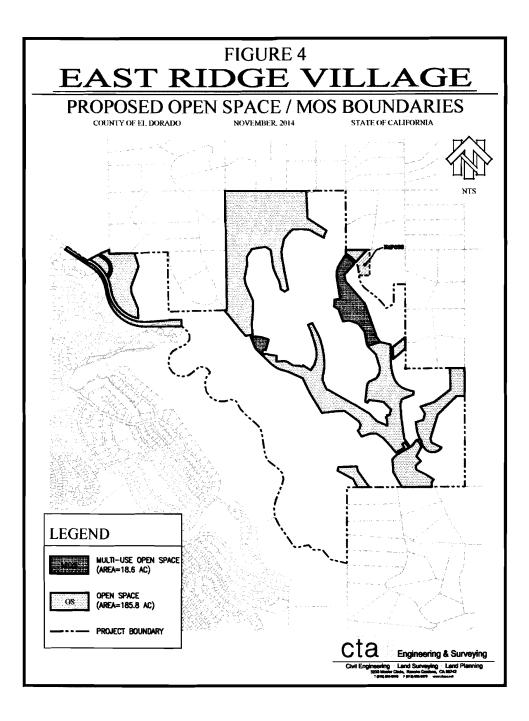
By applying the above measures the project increased the amount of public/ multi-use open space and transitional open space. This allowed for the protection of additional oak woodland canopy habitat for the project. (See Table 2)

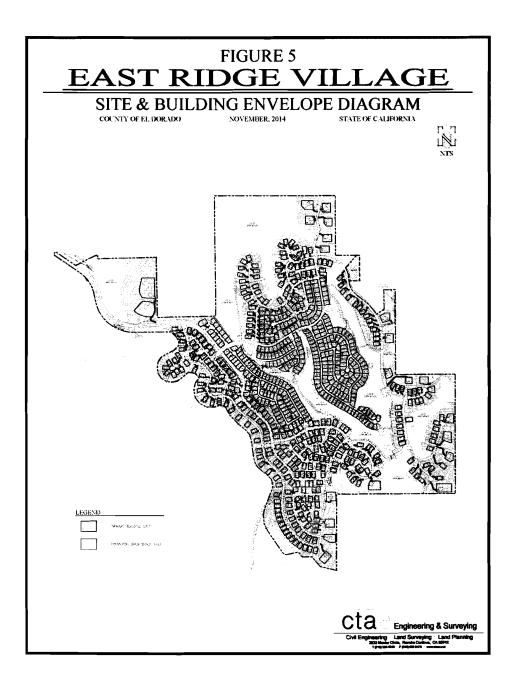
3.3 Oak Woodland Tree Canopy Habitat Impact Assessment

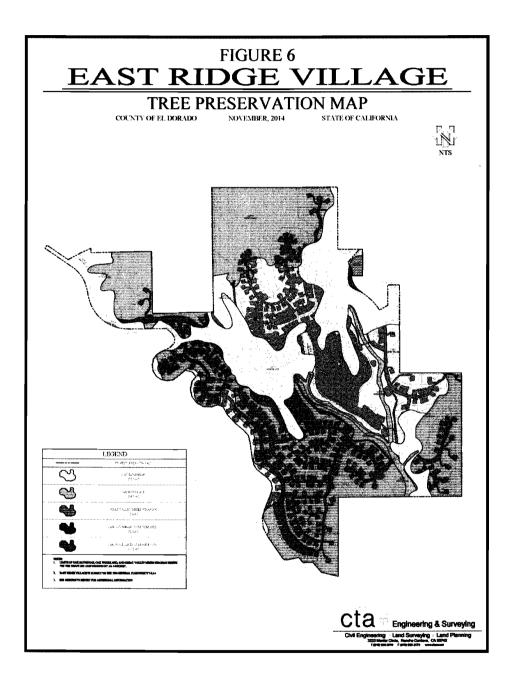
In order to calculate the amount of oak woodland tree canopy habitat impacts for the project, the proposed open space boundary, the site plan, preliminary grading plan and preliminary building envelope diagram plan as shown in **Figure 5** were superimposed over the pre-development oak woodland tree canopy habitat plan as shown in **Figure 2**. The maps showed polygons representing the proposed roads, lot lines, grading limits and the primary building areas (development envelopes). The development envelope is the area within each lot that will be disturbed by the construction process and was determined based upon the applicable Specific Plan standards for each type of development occurring in the tentative and final subdivision map were utilized. By combining all of these polygons, the amount of oak tree canopy habitat area

encompassed with the roads, lot lines, grading limits and development envelopes, it was possible to calculate the acres of oak woodland tree canopy habitat would be impacted, and the corresponding number of acres and trees needed for replacement. (Figure 6)









As shown in **Figure 2**, the 734.5 acres of the East Ridge Village area has a total of 570.6 acres of oak tree canopy habitat prior to any onsite canopy habitat impacts. The overall canopy density for the entire site was 78%. According to the 1996 General Plan Policy 7.4.4.4, the project is required to retain or replace 70% of the pre-development oak tree canopy habitat. Therefore, development within the East Ridge Village is required to retain or replace roughly 399.42 acres of canopy (0.70 x 570.6 acres of oak tree canopy). A total canopy impact of 171.18 acres (570.6 acres of existing canopy minus 399.42 acres to be retained) is allowable for the entire East Ridge Village project without triggering oak canopy habitat replacement requirements.

East Ridge Village originally contemplated approximately 138 acres of public/multi-use open space. (Figure 3) The proposed project has provided for approximately 204 acres of public/multi-use open space. (Figure 4) This is an increase of 66 acres of public and multi-use open space than was originally plan for the East Ridge Village area. This increase of 66 acres of public/multi-use open space protects approximately 50 acres of additional oak woodland tree canopy habitat. (See Table 2).

In addition to the public/multi-use open spaces, transitional open space areas on several lots are provided. A total of approximately 244 acres of transitional open space area has been provided in the project. Approximately 178 acres of oak woodland tree canopy habitat will be preserved within these transitional open space areas. (See **Table 2**)

By increasing both the public/multi-use open spaces, and providing transitional open space areas, a total of approximately 228 acres (178 acres plus 50 acres) of additional protection of the oak woodland tree canopy habitat has been added to the project.

Public/Mult	Tentative Map East Ridge Village Proposed Transitional Open Space and Oak Woodland Tree Canopy Habitat PROPOSED PROJECT							
А	В	С	D	Е	F	G	н	Ι
Project Description	Public/Multi- Use Open Spaces Per Specific Plan Located in East Ridge Village	Preserved Oak Canopy Habitat Per Specific Plan	Public/Multi- Use Open Spaces Per Tentative Map Located in East Ridge Village	Preserved Oak Canopy Habitat Per Tentative Map	Additional Public/Multi- Use Open Space	Additional Preserved Oak Canopy Habitat Per Proposed Project	Transitional Open Space Per the Proposed Project Located in East Ridge Village	Preserved Oak Canopy Habitat
East Ridge Village 701 lots (735								
acres) TOTAL	138	100.3 100.3	204 204	150.3 150.3	66 66	50 50	244 244	178 178

Table 2 -	East Ridge Village Open Space Areas and Oak Woodland Tree Canopy Habit	at
-----------	--	----

Figure 6 shows the results of the oak woodland tree canopy habitat analysis performed for project. The oak woodland tree canopy habitat impacts and replacement requirements are summarized in Table 3.

	Pre-Development	Total	Preserved	Canopy Needed to Meet	Oak Canopy
	Canopy	Canopy	Canopy	General Plan	Replacement
	(acres)	Impacts		Requirement	Requirement
Project Area		(acres)	(acres)	(acres)	(acres)
East Ridge Village	570.60	199.40	371.20	399.42	28.22
Total	570.60	199.40	371.20	399.42	28.22

Table 3- Oak Woodland Tree Canopy Habitat Impacts and Replacement Requirements

At the developer's option, pre mitigating for future impacts is permissible. Oak woodland tree canopy habitat may be conserved or replaced with one acre of replacement credit for every 35 trees surviving past five years in one or a combination of the following ways:

- 1) Tree planting on residential lots: Two trees per lot, Use of native oak species that are adapted to the specific conditions of each lot will be encouraged.
- 2) Tree planting in public/multi-use open spaces, public and private parks, street and/or landscape corridors or buffers, transitional open space on residential lots, and other areas where mitigation is suitable.
- 3) Conservation easements on land that is otherwise entitled for development. Existing canopy in these areas shall be credited on a 1:1 basis.
- 4) Off-site mitigation subject to County approval.
- 5) On-site planting could include inter-plantings within the existing preserved oak habitat areas. This would provide for a next generation or perpetuity of the resources.

7.0 OAK WOODLAND TREE CANOPY HABITAT REPLACEMENT DESIGN AND GUIDELINES

In accordance with the 1996 El Dorado County General Plan Policy 7.4.4.4 compensation shall be provided for all oak woodland canopy impacts exceeding 171.18 acres on the East Ridge Village project. As outlined in **Table 3**, it has been calculated that East Ridge Village will impact approximately 199.40 acres of oak woodland tree canopy habitat. Therefore, 28.22 acres of oak woodland tree canopy habitat shall be compensated. The proposed oak woodland tree canopy habitat replacement design and protocol, as outlined below, include proposed planting locations, planting guidelines, and maintenance requirements.

7.1 Proposed Planting Locations

Oak woodland tree canopy habitat may be replaced by planting trees within the East Ridge Village site in several locations. It should be noted that the amount of available onsite planting acreage (79.26 Acres) substantially exceeds the 28.22 acres of oak canopy habitat that is required to be replaced by the project. The acreages of available planting areas within individual villages and onsite open space areas are listed in **Table 4**. Proposed planting locations are described below.

1. Residential home sites: The East Ridge Village Design Guidelines for the home sites will include oak tree mitigation planting requirements. The lots shown in **Figures 8 and 9** represent a typical residential lot with available oak woodland tree mitigation planting areas. Please note the size of the available planting area will vary from lot to lot. The plan shall require that each lot plant a minimum of 2 trees per lot. This shall be outlined in the future design guidelines and CC&R's for the project.

One acre of replacement canopy shall be credited for every 35 trees that are established and healthy after five years of monitoring. Success criteria for those trees planted in the developed areas of a lot are discussed in Section 8.1 of the document.

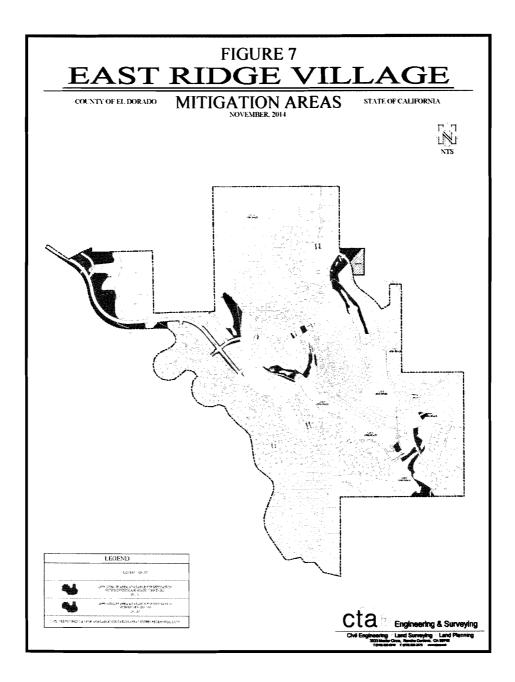
- 2. Oak tree mitigation planting areas are also available within the street/landscape corridors (Figure 7). Approximately 10.1 acres of planting space are available in these areas.
- 3. Oak tree mitigation planting areas are also available within the public/multi-use open space areas (Figure 7). Approximately 29.1 acres of planting space are available in these areas.

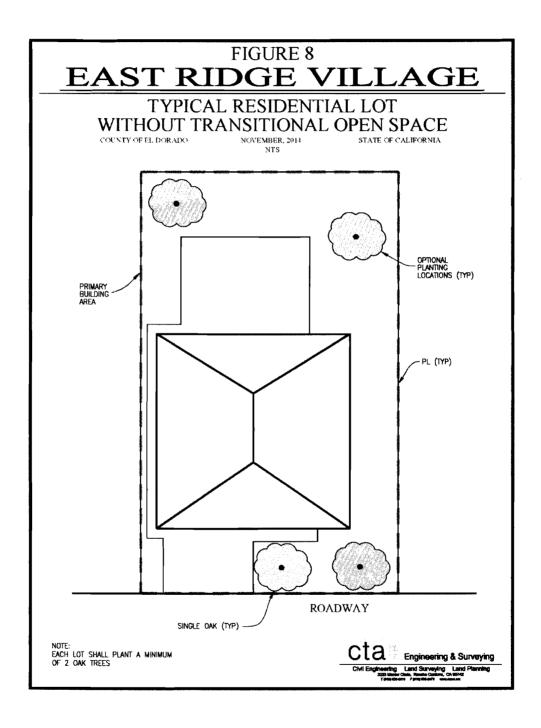
Total	10.1	40.06	29.1	79.26
East Ridge Village	10.1	40.06	29.1	79.26
Planting Area	*Street/Landscape Corridors (acres)	**Residential Lots (acres)	Open Space Areas (acres)	Total Available Planting Acreage (acres)

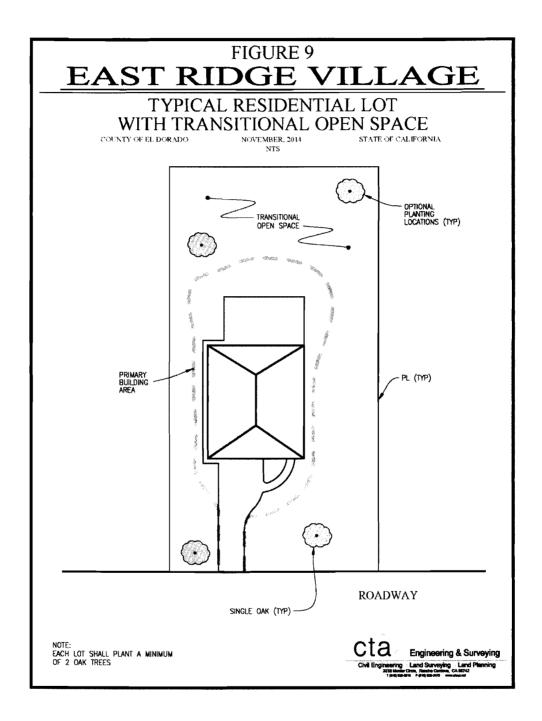
Table 4- Available Oak Woodland Tree Canopy Habitat Mitigation Planting Areas

*Represents plantable street/landscape areas on site that could be planted.

** Represents plantable residential lot areas on site that could be planted and is based upon 2 trees per lot.







7.2 Oak Tree Regeneration and Planting

Oak tree regeneration and planting techniques have been outlined in the VVSP under Chapter 9 on pages 119-122 as attached in **Appendix C**. The following additional guidelines have been included in this Plan, to provide more clarity to the techniques that have been outlined Chapter 9:

- 1. All replacement tress shall consist of blue oak (Quercus douglasii), valley oak (Quercus lobata), interior live oak (Quercus wislizenii) and black oak (Quercus kelloggii) since these four species are found on the site.
- 2. Canopy replacement can be accomplished by these three alternatives 1) direct seeding of oak acorns; 2) direct planting of oak tree seedlings; and 3) transplanting of oak trees (nursery containerized stock). The natural regeneration method that is outlined in the VVSP can also be used, but is difficult to manage and monitor for replacement of oak canopy. This natural regeneration method could apply to individual lots after development and would only add to the replacement oak canopy acreages as outlined in the Plan. However, for this Plan the three alternatives outlined above shall be used. These regeneration planting techniques can be monitored to determine their success criteria. Detailed criteria for the three alternatives can be found on Appendix C.
- 3. Assuming a 20-foot canopy radius for oak trees 30 to 50 years old, replacing one acre of oak tree canopy would require successful establishment and continued growth of 35 oak tree planting. Each planting space should be roughly 25 feet apart. As recommended by the project arborist/forester, additional oak tree plantings above the 35 may be planted to allow for plant mortality while the replacement trees become established.
- 4. Planting sites shall be identified based on the suitability of the soil, slope, aspect and micro-habitat.
- 5. Water basins made of loose soil shall be built around the outside of the root ball of each planting or water containment bags may be utilized such as "Treegator" or "Oozetube"
- 6. A wire cage or other appropriate tree shelter should be installed around all acorns and seedlings to help minimize herbivore and deer damage.
- 7. A layer of (4-6 inches thick) of wood chip mulch shall be placed around each planting; or a weed mat, made preferably of heavy weighted biodegradable landscape fabric, should be installed around each planting and maintained.
- 8. Due to wet soil conditions in the mixed riparian areas within the East Ridge Village Open Space areas other native species are recommended to create riparian woodland habitat. Species tolerant of the wet soil conditions present within these areas shall be used. Such species may include willows (Salix sp.), Fremont's cottonwood (Populus fremontii), and valley oak (Quercus lobata), as determined by the project arborist/forester.

7.3 Oak Tree Maintenance Requirements for Plantings

The following are maintenance measures necessary to provide conditions suitable for the establishment of the plantings:

- 1. It is essential the plantings be provided a reliable source of water until their root systems become established in the surrounding soil. Because rainfall is unpredictable, temporary irrigation shall be required. A proper watering regime is crucial to be establishment of the plantings. Conversely, over-watering of the replacement oak trees can result in unhealthy root systems and predispose them to root diseases. Most planting will require supplemental irrigation during the first three years. A temporary drip-irrigation system (or similar system) installed with at least two emitters for each planting, shall be implemented. If it is not feasible to install an irrigation system, each replacement tree should be watered by hand or water bags may be utilized at least twice a month between the months of April and Oct. A watering schedule, including which trees will require irrigation, shall be determined by the project arborist/forester based on the maintenance requirements of individual plantings. The watering schedule shall be prepared prior to the mitigation planting effort. The project arborist/forester shall monitor the soil moisture conditions closely to ensure the plantings are not over or under watered.
- 2. Annual grasses and herbaceous species within the planting sites will compete with the replacement oaks for nutrients, water, and light. They may also provide habitat for herbivorous wildlife. Periodic removal of competing vegetation shall be required until plantings are well established. Appropriate vegetation removal techniques shall be followed, which will typically require the removal be completed manually, unless otherwise approve by the project arborist/forester.

7.4 Oak Woodland Landscaping Maintenance Techniques

In addition to the oak tree maintenance requirements for plantings as outlined above, for the oak tree replacement areas located on individual lots within the East Ridge Village project. Oak woodland landscaping techniques as outlined in the VVSP under Chapter 9 on pages 118-119 shall be used. These techniques are outlined in **Appendix C**.

8.0 OAK WOODLAND TREE CANOPY HABITAT REPLACEMENT MONITORING PROTOCAL

Since the East Ridge Village project is required to replace oak woodland tree canopy habitat, it is likely that the replacement trees will be planted in several phases over the course of a few years. Each phase of the oak canopy replacement effort shall be monitored separately according to the protocol discussed in this section.

8.1 Success Criteria

Three years after planting, the number of oak seedlings/saplings exhibiting good health characteristics, or higher, in the planting areas shall equal or exceed 70% of plantings. Five years after planting, the number of oak seedlings/saplings exhibiting good health characteristics or higher, in the planting areas shall equal or exceed 100%. If the plantings fail to meet the success criteria, they shall be replaced on a tree-for-tree basis under the guidelines of the document until success criteria are met. As an example, to replace 1 acre of canopy a minimum of 35 trees are needed. Therefore, upon three years after planting 25 trees (70%) must exhibit good health and after five years all 35 trees (100%) must exhibit good health.

As outlined in **Table 3** 28.22 acres of oak tree canopy shall be replaced. The ultimate success criteria will be to achieve 100% of the 28.22 acres of replanting for the project.

8.2 Monitoring and Reporting

Monitoring has been designed to ensure compliance with the success criteria and to discover and remediate conditions that are detrimental or potentially detrimental to the plantings. Monitoring of the plantings shall be conducted by an arborist certified by the International Society of Arboriculture (ISA) or a Registered Forester. Monitoring shall occur annually for a minimum of five years for the year of planting beginning in early fall, assuming that the replacement trees have experienced one full summer of the site. Monitoring shall consist of a site assessment to evaluate the health of each planting. Health shall be evaluated based on the qualitative scale in **Table 6**. Only plantings receiving a rating of good or above shall be considered successful.

Rating	Tree Health
Excellent	Free of any signs of stress, disease, nutrient deficiency, or parasites. Size, color, and density of foliage is normal with above average growth rate.
Good	Minor evidence of stress, disease, nutrient deficiency, or parasites. Size, color, and density of foliage is normal with average growth rate.
Fair	Moderate evidence of stress, disease, nutrient deficiency, or parasites. Size, color, and density of foliage is less than normal with average growth rate.
Poor	Widespread evidence of stress, disease, nutrient deficiency, or parasites. Size, color, and density of foliage is abnormal with very little growth. High potential of tree mortality.

Ta	ble	5-	Health	Rating	Scale
----	-----	----	--------	--------	-------

Monitoring reports shall be prepared annually for each monitoring season until the five year monitoring period ends, or until success criteria are met. The basic purpose of the monitoring reports is to present data and summarize statistics for each planting area. Any conditions detrimental to the plantings (erosion, predation, etc.) identified during the monitoring season shall also be discussed. Actions to correct these conditions shall be identified in the annual monitoring report. Because temporary irrigation may be needed for the first several years, the effectiveness and necessity of the watering regimen for each planting area should be addressed in the monitoring report. Copies of the annual monitoring report shall be submitted to El Dorado County for review and approval.

8.3 Mitigation Monitoring Responsibility

The project proponent, or its successor, is the responsible party for monitoring plantings for the East Ridge Village project. Any maintenance or remediation required to meet the success criteria is the responsibility of the project proponent or its successor.

Oak tree preservation (conservation) techniques have been outlined in the VVSP under Chapter 9 on pages 114-118 as attached in Appendix C. Existing trees within the East Ridge Village project site will be preserved and incorporated into the project design and shall be protected per the protocol established below and in conjunction with Chapter 9 of the VVSP:

9.1 Protection During Construction

The following guidelines have been included in this Plan, to provide more clarity to the techniques that have been outlined Chapter 9. These measures are designed to protect oak trees to be preserved onsite during construction and to ensure the impacts are minimized.

- 1. In order to protect the root zone, brightly colored, plastic fencing, a minimum of 4-feet tall, shall be secured on steel poles driven into the ground and installed one foot from the outside edge of the dripline of each tree. In the event that a stand of trees will be preserved, the entire stand may be fenced, as a group, per the above stated guidelines. Fencing shall be shown on construction plans and shall be installed prior to the onset of grading activities.
- 2. Avoid, if possible, cut or fill within the canopy of preserved trees is recommended. If encroachment into the dripline is unavoidable, the following shall be implemented.
 - 2.1 If fills are necessary, per the recommendations of the project arborist/forester, a retaining wall, crushed stone or gravel, or aeration system may be recommended to protect the root health. This can be a system of perforated pipe or placement of sand/cobble instead of denser soil materials under the dripline. If retaining walls are necessary the use of concrete pier pilaster foundation, with discontinuous footing, is recommended. If this is not possible, trenching for the foundations will be allowed and measures to protect the exposed roots from desiccation shall be required, as recommended by the project arborist/forester.
 - 2.2 If cuts are necessary, measures to protect exposed roots from desiccation shall be required. Such measures include, but are not limited to, pruning exposed roots back to the undamaged tissue, spraying the roots with water to prevent them from drying, and covering exposed roots with moist soil, burlap, or mulch. As determined by the project arborist/forester, the impacted tree may require infrequent, deep watering during the dry season. Encroachments may substantially affect the health and structure of the tree and should be monitored.
- 3. Avoid, if possible, trenching for underground utilities or retaining walls within the canopy of preserved trees is recommended. If encroachment into the dripline is unavoidable then where feasible, underground utilities within the dripline of an oak tree shall be bored or tunneled to minimize impact to the root system. Trenching for the foundations footing for retaining walls will be allowed and the measures as outlined in 2.2 above, to protect the exposed roots from desiccation shall be required.

- 4. Pavement over the root system may be possible of approximately 25% of the root system or as recommended by the project arborist/forester. Both interlocking paving stones and pavement is allowed. Pavement shall provide for a minimum of 2"-3" of stone (aggregate base material without fines) underneath the pavement, this will allow for the tree to breath as well as obtaining water and nutrients.
- 5. Drainage patterns on the site shall avoid water accumulation in or diverted across, the dripline of any preserved oak tree.
- 6. Oak trees onsite that require pruning shall be pruned by/under the supervision of a certified arborist or Registered Professional Forester prior to the start of construction work and conform to ISA pruning guidelines.
- 7. Equipment and materials shall not be stored and no vehicles shall be driven or parked under the canopy of any protected tree.
- 8. Construction crews shall be informed of the above-referenced measures and shall be required to comply with the guidelines of the mitigation plan. They shall also be provided a copy of the map illustrating areas to be fenced and avoided.
- 9. An ISA certified arborist or Registered Professional Forester shall monitor the protected trees periodically during construction to ensure the above-referenced measures are being performed and to monitor the health and structure of the trees. Reports and recommendations shall be submitted to the owner on a monthly basis during construction operations that might impact the protected trees.

9.2 **Post-Construction Actions**

Upon completion of grading and construction activities, the following measures should be completed:

1. An ISA certified arborist or Registered Professional Forester shall inspect the preserved trees, including trees subject to encroachment within the dripline, for construction-related damage or other associated impacts. Trees subject to desiccation as a result of groundcover removal, trenching, grading, or stockpiling shall be monitored closely. A final list outlining the total impacts to onsite trees and current condition of all protected trees should be submitted to El Dorado County upon project completion.

9.3 Maintenance Within The Tree Protection Zone

If maintenance is required under the canopy of a preserved tree, Oak woodland landscaping techniques as outlined in the VVSP under Chapter 9 on pages 118-119 shall also be used. These techniques are outlined in **Appendix C**. Preserved trees within the East Ridge Village project shall provide maintenance per the measures established below and in conjunction with Chapter 9 of the VVSP:

1. Areas under the tree canopy shall be maintained in a natural condition.

- 2. Landscape maintenance personnel shall not apply any fertilizer on or beneath the canopy of protected trees without written approval by the arborist/Registered Professional Forester. Except for treatment of specific disease conditions, pesticides should not be applied to preserved trees.
- 3. All irrigation systems shall be installed outside the driplines of protected trees. All sprays from the landscape irrigation systems shall avoided and be directed away from these trees and any irrigation runoff shall be directed to flow outside the tree protection zone.
- 4. Landscape materials placed beneath the canopy can include shredded bark, wood chips, cobble, or similar materials. Any landscape plantings made beneath the canopy of preserved trees shall be drought-tolerant species (native species) with the same cultivation requirements as the preserved trees, and only drip irrigated.
- 5. Weed control within the tree protection zone shall be performed by manual or mechanical methods only.
- 6. No permanent fixtures shall be placed beneath the canopy. Permeable pedestrian, bicycle, or equestrian paths may be placed under the canopy of preserved trees

10.0 REGISTERED PROFESSIONAL FORESTER OAK TREE ASSESSMENT

10.1 1996 General Plan Policy 7.4.5.1

The 1996 El Dorado County General Plan Policy 7.4.5.1 establishes to protect and maintain native trees including oaks and landmark and heritage trees. Even though Policy 7.4.5.1 does mention the need for protection of heritage and landmark trees, the difficulty in enforcing this objective lies in the fact that no threshold of significance had been established by the County in determining the relative importance of heritage trees as a separate issue from oak woodland tree habitat in terms of aesthetics and resource. The County established a threshold by defining a heritage oak as one that is at a minimum of 36" at breast height in diameter and healthy, as determined by a certified arborist/Registered Professional Forester. The Specific Plan condition of approval 28 states: "All trees above 24" in diameter at breast height shall be shown on the plan. If any 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process." This was also included in the current mitigation monitoring checklist to address mitigation measures BR-3 and BR-4.

Policy 7.4.5.1 A tree survey, preservation, and replacement plan shall be required to be filed with the County prior to issuance of a grading permit for discretionary permits on all high-density residential, multifamily residential, commercial and industrial projects. To ensure that proposed replacement trees survive, a mitigation monitoring plan should be incorporated into discretionary projects when applicable and shall include provisions for necessary replacement trees.

10.2 Forester Oak Tree Survey

An extensive tree survey was performed on the East Ridge Village site to identify oak trees that would likely be impacted by development. The survey was performed over several weeks during the fall/winter season to locate all the trees. A Spencer tape was used to determine the diameter at breast height for the oak trees. The surveying crews tagged the oak trees with a corresponding number for future identification.

Then all of the 24" dbh and larger oak trees surveyed were isolated and identified on the site. As stated above, 24" dbh and larger will need to be shown on the plan. All of the oak trees surveyed have been shown on the grading plans for the project to determine those that would be impacted by the development. Then all 36" dbh and larger at breast height oak trees require a health assessment as stated in the above.

A Registered Professional Forester site survey was performed over several days on all the 36" in diameter trees and larger oak trees. There are 70 oak trees 36" dbh or greater. This site survey determined the overall health of each tree using the criteria as outlined in **Table 5**- Health Rating Scale. The results of the 36" dbh tree survey and larger have been shown in **Table 6 in Appendix E.**

During the Registered Professional Forester's site walks a random sampling of oak trees were also surveyed for size and health. There are 145 oak trees that were randomly surveyed. The results of those oak trees surveyed are shown in **Table 7 in Appendix E.**

10.3 Forester Oak Tree Impact Assessment

The 24" and larger oak trees were isolated and plotted on a conceptual site plan, preliminary grading plan and preliminary development envelope plan and then superimposed over the tree survey. These maps showed polygons representing the proposed roads, lot lines, grading limits and the primary building areas (development envelopes). The development envelope is the area within each lot that will be disturbed by the construction process and was determined based upon the applicable Specific Plan standards for each type of development occurring in the tentative and final subdivision map.

All efforts were made to preserve as many of the healthy oak trees. As specifically stated in both the mitigations measures BR-3, BR-4 and the Specific Plan Condition 28. "...If any 36" in diameter at breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealthy, or that all possible methods of avoidance have been attempted in the design process.", To insure all methods of avoidance were achieved for the healthier oak trees, the Registered Forester in conjunction with the Project Engineers worked together on the preliminary site and grading plans for the project. All possible methods of avoidance were incorporated in this design process including providing retaining walls, lot configurations, roadway layouts and open space areas to protect as many of the healthier trees. A total of 20 oak trees 36" dbh or greater of the 70 oak trees surveyed are currently slated to be removed due to project grading and impacts. Of the 20 oak trees to be removed, 3 are in good condition, 6 are in fair condition, 11 are in poor condition and 0 are in very poor condition. In addition to the above trees to be removed 14 trees were also recommended to be removed by the Registered Forester due to very poor conditions and for safety reasons. The overall health assessment for oak trees that are 36" in diameter or greater to be removed are outlined in Tables 6 and 8 and as shown in Figure 10 in Appendix E.

A random sampling of 145 oak trees less than 36" dbh were also surveyed to determine condition and health. Of those 13 are in good condition, 59 are in fair condition, 44 are in poor condition and 29 are in very poor condition. A total of 27 oak trees of the 145 oak trees surveyed are currently slated to be removed due to project grading and impacts. Of the 27 oak trees to be removed, 3 are in good condition, 13 are in fair condition, 11 in poor condition and 0 in very poor condition. There were 32 oak trees also recommended to be removed by the Registered Forester do to very poor conditions and for safety reasons. The overall health assessment for the randomly selected oak trees that are less than 36" in diameter are outlined in **Tables 7 and 9** and as shown in **Figure 11 in Appendix E**.

A total of 215 trees were surveyed on the site 218 of those are oak trees and 3 are pine trees.

10.4 Forester Summary

TERMS AND CONDITIONS

The following terms and conditions apply to all oral and written reports and correspondence pertaining to the consultations, inspections and activities of Ralph Osterling Consultants, Inc. hereinafter referred to as "ROC".

1. Any legal description provided to the consultant is assumed to be correct. No responsibility is assumed for matters legal in character nor is any opinion rendered as to the quality of any title.

2. It is assumed that any property referred to in any report or in conjunction with any services performed by ROC, is not in violation of any applicable codes, ordinances, statutes, or other governmental regulations, and that any titles and ownership to any property are assumed to be good and marketable. Any existing liens and encumbrances have been disregarded.

3. Possession of this report or a copy thereof does not imply any right of publication or use for any purpose, without the express permission in writing of the consultant and the client to whom the report was issued. Loss, removal or alteration of any part of a report invalidates the entire appraisal/evaluation.

4. The scope of any report or other correspondence is limited to the trees and conditions specifically mentioned in those reports and correspondence. ROC and the consultant assume no liability for the failure of trees or parts of trees, either inspected or otherwise. The consultant assumes no responsibility to report on the condition of any tree or landscape feature not specifically requested by the named client.

5. No tree described in this report was climbed, unless otherwise stated. We cannot take responsibility for any defects, which could only have been discovered by climbing. A full roots collar inspection, consisting of excavating the soil around the tree to uncover the root collar and major buttress roots was not performed unless otherwise stated. We cannot take responsibility for any root defects, which could only have been discovered by such an inspection.

6. The consultant shall not be required to provide further documentation, give testimony, be deposed, or attend court by reason of this appraisal/report unless subsequent contractual arrangements are made, including payment of additional fees for such services as described by the consultant or in the fee schedules or contract.

7. ROC guarantees no warrantee, either expressed or implied, as to the suitability of the information contained in the reports for any purpose. It remains the responsibility of the client to determine applicability to his/her particular case.

8. Any report and the values, observations, and recommendations expressed therein represent the professional opinion of the consultants, and the fee for services is in no manner contingent upon the reporting of a specified value nor upon any particular finding to be reported.

9. Any photographs, diagrams, graphs, sketches, or other graphic material included in any report, being intended solely as visual aids, are not necessarily to scale and should not be construed as engineering reports or surveys, unless otherwise noted in the report. Any reproductions of graphs material or the work produce of any other persons is intended solely for

the purpose of clarification and ease of reference. Inclusion of said information does not constitute a representation by ROC or the consultant as to the sufficiency or accuracy of that information.

10. Trees can be managed, but they cannot be controlled. To live near trees is to accept some degree of risk. The only way to eliminate all risk associated with trees is to eliminate all trees.

December 17, 2014

Certification of Performance

That I have personally inspected the tree(s) and /or property referred to in this report and have stated my findings accurately. The extent of the evaluation and appraisal is stated in the attached report and the Terms and Conditions;

That I have no current or prospective interest in the vegetation or the property that is the subject of this report and I have no personal interest or bias with respect to the parties involved;

That the analysis opinions and conclusions stated herein are my own and are based on current scientific procedures and facts;

That my compensation is not contingent upon the reporting of a predetermined conclusion that favors the cause of the client or any other party nor upon the results of the assessment the attainment of stipulated results or the occurrence of any subsequent events;

That my analysis opinions and conclusion were developed and this report has been prepared according to commonly accepted Arboricultural and Forestry practices;

I further certify that I am a Registered Professional Forester, State of California and a member of The Association of Consulting Foresters.

Disclosure Statement

Arborists and Foresters are tree specialists who use their education, knowledge, training and experience to examine trees and recommend measures to evaluate and enhance the beauty and health of trees and attempt to reduce the risk of living near trees. Clients may choose to accept or disregard the recommendations of my report or to seek additional advice.

Foresters and Arborists cannot detect every condition that could possibly lead to the structural failure of a tree. Trees are living organisms that fail in ways we do not fully understand. Certain conditions are often hidden within trees or below the ground. Arborists cannot guarantee that a tree will be healthy or safe under all circumstances or for a specific period of time. Likewise remedial treatments cannot be guaranteed.

Trees can be managed but they cannot be controlled. To work or live near trees is to accept some degree of risk.

Ralph Osterling

Ralph Osterling, President, ACF, CLFA Registered Professional Forester #38 State of California



December 17, 2014

Wagstaff and Associates. 1998.	Final Environmental Impact Report For The Proposed Valley View Specific Plan
Wagstaff and Associates. 1998.	Draft Environmental Impact Report For The Proposed Valley View Specific Plan
Richard Floch & Associates, 1998	El Dorado Hills Valley View Specific Plan
Jeffrey A. Hart, 1998	Draft Conceptual Tree Mitigation Plan

APPENDIX A- Applicable EIR Mitigation Measures Monitoring Checklist BR-3 and BR-4 and Specific Plan Conditions of Approvals 6 and 28

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts. A completed and signed chart will indicate that each mitigation requirement has been completed with, and that County and state monitoring requirements have been fulfilled with respect to Public Resources Code Section 21081.6.

		MONITO	RING		VERIFICATION		
IDENTIFIED IMPACY	RELATED MITIGATION MEASURES (OR CHANGE TO THE SPECIFIC PLAN)	impi. Entity ¹	Type of Monitoring Action	Timing Requirements ¹	Monitoring and Verification Entity ⁴	Signature	Date
<u>Alley View Specific Plan</u> , non-native trees and hrubs would reaster native vegetation along the irroject roads to create " <i>v Udy maniculed</i> lopebronce year round with minimal pointeounce and low water consumption." The nujority of plant species recommended in the andvaping section of the <u>Valley View Specific</u> <u>Upp</u> are either non-native or do not occur in the latural habitats found in the Valley View area	control invasive non-native species into the Specific Plan's landscape, restoration and habitat management plans; and [d] use caution when selecting any non-native plants for landscaping purposes on the use to insure that no potentially invasive plant species are selected. The current Specific Plan Landscape Plan objectives of " minimal maintenance and low water consumption " are worthwhile and could be achieved using native plants. (Note: Condition 46 of the Valley View Specific Plan Conditions of Approved by the El Dorodo County Board of Supervisars on December 8, 1998) indicated that this mitigotion measure is addressed through use of Transitional						
Impact 8R-2 Loss of Non-Native Annual Grassland Habitat. The Joss of approximately 307 acres of non-native grassland proster would decrease foraging habitat for a variety of birds, harnmals, and reptiles	Deem Space: Chapter & of the Specific Plan J Mitigation Measure BR-2: The applicant shall implement the following measures to avoid or minimine impacts of non-native annual grassland lusses up both common and sensitive plant and widthe species: (a) preserve grassland habitat in contiguous areas where passible to minimize fragmentation and maximize retention of habitat functions and values; and (b) use temporary fencing and/or protective signage to prevent construction impacts and unauthorized access to grasslands and associated wildlife contained for development. (Note: Condition 86 of the Volley View Specific Plan Conditions of Spacevisors on December 8, 1998) indicated that this mitigation measure is addressed through use of Transmond Dens Space. Chapter 8 of the Specific Plan J	Appl.	otc	PTM	EDCPD IMPLEMENTED WITHIN SPECIFIC PLAN	GINA PAOLINI	6/6/2013
Impact 8R-3: Loss of Oak Woodland/Oak Savannah Nabitats. The project-related loss of substantial oak woodland and oak savannah habitat (317 and 164 acres respectively) would	Mitigation Measure BR-3: The applicant shall implement the following (a) conduct pre- construction surveys for raptor and songbird nests, and bat roots; (b) imm development within the	Аррі.	στς	PTM; PGP	EDCPD		

1 Appli = Applicant, EDC = El Dorado County 2 CPI × Construction: Penod Inspection, OTC = One-time Confirmation Action; PC = Plan Check; POC = Poet Occupancy Inspection, SMS = Specialized Monitoring Study, SSR = Subsequent Standard Review 3 DPC = During Project Construction: PBP = Prior to Issuance of Building Permit, PGP = Prior to Issuance of Grading Permit, PPO = Prior to Project Occupancy, STR = Specialized Tuming Requirement; PTM = Prior to Tertables 1 - Tertables

3 DPC = During Project Construction, PBP * Prior to Issuance of Building Permit, PGP * Phor to Issuance of Grading Permit, PPO * Phor to Project Occupancy, STR * Specialized Turing Requirement; PTM * Phor to Tendabyt Map Approval. PFM = Prior to Final Map 4 FDCPD * El Dorado County Planning Department, EDCSO = El Corado County Shellif's Department, EDMFD * El Dorado Hills Fire District, EDCDOT * El Dorado County Department of Transportation, EDCBO * El Dorado County Building Department, EDCDEH + El Dorado County Department of Environmental Health

"2013 Updates are shown in stellwout and underline text.

Page | 24 14-0234 E 24 of 51

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts. A completed and signed chart will indicate that each mitigation requirement has been complied with, and that County and state monitoring requirements have been fulfilled with respect to Public Resources Code Section 21081.6.

	and the second second second	MONITORING				VERIFICATION		
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (OR CHANGE TO THE SPECIFIC PLAN)	impi. Entity ¹	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	Signature	Date	
e a significant loss of oak trees, and a significant abilities to many bird and mammal species evenal songbirds utilize the oaks for foraging, etting and cover, while raptors use these trees scrucial (oosting and nesting habilat. Portions of these existing oak communities would be agmented by development-itelated removal of ak trees from currently uninterrupted stands, my tree loss, whether individually standing or as at to a woodbind, would impact these bird packets. The loss of nests would impact erroroutive success, while the loss of roosts and over would displace individuals and decrease invoorship.	Canopy of existing dak trees in the dak woodland, dak javannah, and non-native grassland whenever possible to retain the maximum feasible number of nak trees. Ici concentrate development and upen spate in contiguous areas to minimize fragmentation, and oak savannah impacts are unavoidable, replant oaks at a rate of 5 to 1 (as specified by CDFG) as detailed in the Tree Replacement Pion specified under Mitigation Measure BK 4 below, and (e) implement the Tree Replacement Pion specified under Mitigation Measure BK 4 below, and (e) implement the Tree Replacement Pion prior to any construction activities that would adversely affect daks tsee EIR text for details]							
	(Note: Condition Bb of the Valley View Specific Plan Conditions of Approval (approved by the El Dorado County Board of Supervisors on December 8, 1998) indicated that this mitigation measure is addressed through a combination of Chapter 9 of the Specific Plan and Condition 828, which requires "demonstration of the pre-training program consistent with General Plan Poincies 7, 4, 4 and 7.4.5.1 to be submitted with tentative map application" and specifies the following revision to the Specific Plan:			-				
	 p. 72 Under Development Requirements Within Ook Woodlands add: All trees above 24° in diameter at Dreost height shall be shown on the plan if any trees 36° in diameter at Dreost height and above are skated for removal, the program shall 							

1 Appl = Applicant, EDC = FI (Sorado County 2 CPI = Construction Penod Inspection, OTC + One-time Continuation Action; PC = Plan Check; POC = Post Occupancy inspection. SMS = Specialized Monitoring Study; SSR = Subsequent Standard Review 3 DPC = During Project Construction PBP = Prior to Issuance of Building Permit, PGP = Prior to Issuance of Grading Permit, PPO = Prior to Project Occupancy, STR = Specialized Timing Requirement, PTM = Prior to Tentelive Map Approval. PFM = Prior to Final Map 4 EDCPD - EI Dorado County Perming Department; EDCSD = EI Dorado County Sherif's Department, EDHFD = Ei Dorado Hills Fire District, EDCDOT = EI Dorado County Department of Transportation, EDC8D + E: Oorado

County Building Department; EDCDEH = El Dorado County Departments of Environmental Health

*2013 Updates are shown in strikeous and underling text

Page | 25 14-0234 E 25 of 51

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts. A completed and signed chart will indicate that each mitigation new prequirement has been complied with, and that County and state monitoring requirements have been fulfilled with respect to Public Resources Code Section 21081.6.

		MONITORING				VERIFICATION	
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (OR CHANGE TO THE SPECIFIC PLAN)	impi. Entity ¹	Type of Monitoring Action	Timing Requirements ⁵	Monitoring and Verification Entity ⁴	Signature	Date
	unhealthy, or that all possible methods of avoidance have been attempted in the design process.						
	Under Oak Tree Conservation Program, add						
	A Primary Building Area, or building envelope shall be delineated on the tentative map concurrent with tentative map application (
Impact BR-4: Reduction of the Habitat Quality	Mitigation 68-4: The applicant shall implement the	Appl	PC.	PTM,	EDCPD		
of Oak Woodland Ouring Construction. Demage to pak trees and other mature trees preserved	following: (a) protect the existing oak trees within		CPI	OPC			
within the oak woodland and oak savannah	the bak woodland, oak savannah, and non-native						
communities may occur, the Valley View Specific	grassland during construction, and (b) implement the Tree Replacement Plan prior to any construction						
lan area. Construction impacts could include	activities that would adversely affect paks. [See EIR						
(a) damage to the root systems by earth moving equipment, (b) storage of construction materials	text for specifics.)						
and/or dumping within the dripline of the trees,	Note: Condition #6 of the Valley View Specific Plan				4		
(c) frimming of tree branches, (d) the siting of infrastructure improvements, homes, and	Conditions of Approval (approved by the El Darado						
commercial structures too close to the dripline of	County Board of Supervisors on December 8, 1998)						
the trees, and (e) trimming of tree branches.	indicated that this miligation measure is addressed						
· · · · · · · · · · · · · · · · · · ·	through a combination of Chapter 9 of the Specific						
	Plan and Condition #28, which requires						
	"demonstration of tree preservation program consistent with General Plan Palicies 7.4.4.4 and						
	7.4.5.1 to be submitted with tentolike map						
	application" and specifies the following revision to						
	the Specific Plun.						
	p 77 Under Development Requirements Within Oak Woodlands add:						
	 All frees above 24" in diameter at breast height shall be shown on the 						
	plan. If any trees 36" in diameter at						

⁴ Applicant, EDC = El Dorado County 2 GPI = Construction Period Inspection OTC = One-time Confirmation Action, PC = Plan Citeox, POC = Post Occupancy Inspection; SMS = Specialized Monitoring Study, SSR = Subsequent Standard Review 3 DPC = During Project Construction; PBP = Phor to Issuance of Building Permit, PGP = Prior to Issuance of Grading Permit, PPO = Pror to Project Cocupancy, STR = Specialized Timing Requirement, PTM = Prior to Tentalive 3 DPC = During Project Construction; PBP = Phor to Issuance of Building Permit, PGP = Prior to Issuance of Grading Permit, PPO = Pror to Project Cocupancy, STR = Specialized Timing Requirement, PTM = Prior to Issuance of Building Permit, PGP = Prior to Issuance of Grading Permit, PPO = Pror to Project Cocupancy, STR = Specialized Timing Requirement, PTM = Prior to Issuance of Building Permit to Tentalive Map Approval; PFM = Phor to Final Map

4 EDCPD = EI Dorado County Planning Department, EDCSD = EI Dorado County Sheriff's Department, EDHFD = EI Dorado Hills Fire District, EDCDOT + EI Dorado County Department of Transportation, EDCBD + El Dorado County Building Department, EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in sinkeout and underling text.

14-0234 E 26 of 51

The environmental mitigation measures listed in column two below have been incorporated into the Valley View Specific Plan in order to mitigate identified environmental impacts. A completed and signed chart will indicate that each mitigation requirement has been complied with, and that County and state monitoring requirements have been fulfilled with respect to Public Resources Code Section 21081.6.

	MONITORING					VERIFICATION	
IDENTIFIED IMPACT	RELATED MITIGATION MEASURES (DR CHANGE TO THE SPECIFIC PLAN)	impi. Entity ⁱ	Type of Monitoring Action	Timing Requirements ³	Monitoring and Verification Entity ⁴	Signature	Date
	breast height and above are slated for removal, the program shall demonstrate that either the tree is unhealth, or that all possible methods of avaidance have been attempted in the design process. Under Dak Tree Conservation Program, oad A Primpty Building Area, or building envelope shall be delivented on the tentilize map concurrent with						a da servizione e
Impact 88-5: Loss of Riperian Areas. Approximately 1.6 acres of Carson Creek and Plunkett Creek ripurian area would be developed with bridge structures. The resulting potentials for destruction or alteration of existing riparan areas could potentially impact the health and survival of birds, repplies, amphibians, and invertebrates in the riparian areas, especially on Plunkett Creek. The creation of ad-hoc trails through riparian areas may also be detrimental. Many invertebrates, especially insects, utilize the trees and shrubs within riparian areas, altracting birds and bats. Reptiles and amphibians may utilize riparian areas for foraging, reproduction,	 Henter on application.) Mitigation Measure BR-5: The applicant shall implement the following measures to mitigate impacts on rigarian area: (a) construct creek crossings in locations which minimize riparan vegetation disturbance, (b) provide buffers, (c) limit activities in buffer cores, and (d) protect riparan habitat. At a minimum, mitigation should conform to El Dorado County General Plan Policy 7.3.3.2, which requires avoidance of any net loss of riparian vegetation assoriated with wetlands. (See EIR text for details.) In addition, implement Mitigation Measure BR-6 (see below) 	Appl.	S\$R	ртм	EDCPD		
cover, and estivation during the dry season. Impact BR-5: Proposed Landscape Plan Impacts on Riparian Areas. The proposed Valley View landscape plan includes the use of non-native species in drainage areas where enhanced naturalized plantings are desirable. Local wildlife is adapted to use native riparian vegetation, and may be unable to utilize exotic species. The use of non-native species in a riparian area is inconsistent with <u>El Dorado County</u> General Plan	Mitigation Measure BR-6: The applicant shall implement the following: plant locally occurring native species (willows, alders, oaks) in repartain areas and adjacent buffer zones rather than non-native strees and strutes. At a minimum, mitigation should conform to El Dorado <u>County General Plan</u> Policy 2.3.3.2, which requires avoidance of any net loss of riparian vegetation associated with wetlands.	Αρρί.	554	PTM	EDCPU		

* Applicant, EDC = El Orado County 2 GPI = Construction Period Inspection, OTC = One-time Confirmation Action, PC = Plan Check, POC = Post Occupancy Inspection, SMS = Specialized Monitoring Study, SSR = Subsequent Standard Review 3 DPC = During Project Construction, PBP = Prior to Issuance of Building Perint, PGP = Prior to Issuance of Grading Perint, PPO = Prof to Project Occupancy, STR = Specialized Timing Requirement, PTM = Prior to Tentative MBA Approval i operation and the second of t

County Building Department, EDCDEH = El Dorado County Department of Environmental Health

*2013 Updates are shown in stempout and underline text.

Page 1 27 14-0234 E 27 of 51

AZ98-01/SP94-01/Valley View Specific Plan Attachment 1/Conditions of Approval Page 2

 All tentative maps shall be conditioned to require a water meter award letter for all residential lots.

6. Mitigation measures of the Valley View Specific Plan EIR, as shown on Attachment 2 of this report, and the mitigation monitoring program are incorporated into the Specific Plan with the exception of those measures listed below which have been analyzed and found to be in substantial compliance with the intent of said mitigation measures:

Mitigation Measure	Method of Compliance
V-I(a)	Condition of Approval #28
V-1(b), (c), V-2(a) and V-3	These measures are addressed in the revised
	Chapters 8 and 9 of the Specific Plan
V-4	This measure is addressed in Chapter 5 of the
	Specific Plan.
V-6	This measure is addressed in Chapter 9
V-7	Condition of Approval #35
PF-11	Addressed in the Development Agreement
BR-1 and BR-2	Addressed through use of Transitional Open
	Space, Chapter 8
BR-3 and BR-4	Combination of Chapter 9, and Condition of
•	Approval 28

 A final Valley View Specific Plan document shall be submitted incorporating all the changes, conditions, and mitigation measures, and mitigation monitoring plan included herein within 60 days of approval.

8. Parkland dedication shall be calculated based on the factors for developments within the El Dorado Hills Community Services District (Chapter 16.12.A.9 of the El Dorado County Code). Parks shall be offered to the El Dorado Hills CSD. Prior to the recordation of the first final map, the developer shall show evidence of an agreement with the El Dorado Hills CSD for the location, size, improvements, and timing of dedication/acceptance of parks throughout the Specific Plan area, and assure compliance with the parkland dedication requirements.

9. The responsibility of Open Space maintenance will be the responsibility of the homeowners association in cooperation with responsible public agencies. Methods of maintenance will be provided for within the Open Space Management Plan. The Plan shall be approved by the Planning Department prior to the first tentative map submittal.

The Open Space Management Plan shall address on-going management of transitional open space areas within lots, relationship of transitional open space to

		· .	AZ98-01/SP94-01/Valley View Specific Plan Attachment 1/Conditions of Approval Page 5
	24.	p.54	Under Local Roads, 1* paragraph, add, "which have no sidewalk in the ER districts and sidewalks on both sides in all other districts. The County may delete sidewalks at the tentative map stage based on slope and grading constraints and may require additional sidewalks at the tentative map stage based on the site's proximity to schools and parks.
	•	•. • • • •	Under East Ridge Local Roads, add, "In Type 1, to be utilized in the ER-1 and ER-2 districts, a 24 paved section is employed with rolled curbing to be combined with subsurface drainage collection systems where it is feasible to build them. Where physical features prohibit the construction of sub surface drainage systems, surface drainage may be utilized. In Type 2, the 24 foot paved section that is used with gravel shoulders and drainage and essentially matches the standard embodied in County Standard Plate 101A, may only be constructed in the ER-LL districts. Type 2"
	25.	p.55	Top of page, add, <u>The sidewalks may be located adjacent to the curb, in</u> which case a vertical curb shall be constructed or set back from the travel way with a landscaped strip between.
	26.		Figures 5.5, 5.6, 5.9 and 5.11 of the Specific Plan shall be amended to provide sidewalks on both sides. In addition, the County retains the discretion to delete sidewalks at the tentative map stage based on slope and grading constraints or add sidewalks as needed based on a tentative map's proximity to schools and parks.
	27.	p.70	Under Project Phasing, add the following language:
			Prior to the subdivision of the VC, MU or CR areas, a conceptual plan shall be submitted to the Planning Director. Said plan shall contain provisions for vehicular and pedestrian circulation, general building location and massing diagrams, and layout of other infrastructure needs consistent with the Valley View Specific Plan. The plan may be approved by the Planning Director or his designee, and all subsequent development in the specified areas shall conform to the plan.
	28.	p.77	Under Development Requirements Within Oak Woodlands add:
•			5. Demonstration of tree preservation program consistent with General Plaa Policies 7.4.4.4 and 7.4.5.1, to be submitted with tentative map application. All trees above 24° in diameter at breast height shall be shown on the plan. If any trees 36° in diameter at breast height and above are slated for removal, the program shall demonstrate that

AZ98-01/SP94-01/Valley Vi Attachment 1/Conditi	
either the tree is unhealthy, or that all possible meth have been attempted in the design process.	ods of avoidance
Under Oak Tree Conservation Program, add:	
A Primary Building Area, or building envelope shall be of tentative map concurrent with tentative map application.	delineated on the
Add at the end of the 2 nd paragraph:	
"the Architectural Review Committee shall be solely re- design approval of such projects, <u>except where specific design</u> been imposed by the County through conditions of appro- maps."	sign criteria have
Add within 2 nd paragraph:, "of the Architectural Revie <u>County</u> when the committee or approving authority circumstances"	
. p.87 The end of last paragraph needs to be completed.	
. p.88 The following paragraph shall be added under Residential	Development:
The CC&R's for each tentative map for residential developm provisions for the establishment of an architectural review purpose of this committee is to ensure that the Arch Guidelines for single family development within the Spec administered in conformance with the Specific Plan. These provide the minimum basis for review.	committee. The itectural Design ific Plan text are
. p.90 Under Building Location - Primary Ridgeline, change as for	ollows:
5. Prior to initiating floor plan or building design, A parea location study should be undertaken as a parmap, review. The site location study would vegetation, view exposure from below, adjacent rest and access together with other siting constraints. A the optimal building location and envelope, building then proceed based on these parameters: the prima shall be designated on the building envelope diagrameters.	t of the tentative evaluate slope, sidential massing After identifying ng design would ary building area

General Plan

Policy 7.4.2.7 The County shall form a Plant and Wildlife Technical Advisory Committee to advise the Planning Commission and Board of Supervisors on plant and wildlife issues, and the committee should be formed of local experts who will consult with other experts with special expertise on various plant and wildlife issues, including representatives of regulatory agencies. The Committee shall formulate objectives which will be reviewed by the Planning Commission and Board of Supervisors **OBJECTIVE 7.4.3: COORDINATION WITH APPROPRIATE AGENCIES** Coordination of wildlife and vegetation protection programs with appropriate Federal and State agencies. **OBJECTIVE 7.4.4: FOREST AND OAK WOODLAND RESOURCES** Protect and conserve forest and woodland resources for their wildlife habitat, recreation, water production, domestic livestock grazing, production of a sustainable flow of wood products, and aesthetic values. Policy 7.4.4.1 The Natural Resource land use designation shall be used to protect important forest resources from uses incompatible with timber harvesting, Policy 7.4.4.2 Through the review of discretionary projects, the County, consistent with any limitations imposed by State law, shall encourage the protection, planting, restoration, and regeneration of native trees in new developments and within existing communities. Policy 7.4.4.3 Utilize the clustering of development to retain the largest contiguous areas possible in wildland (undeveloped) status. Policy 7,4.4.4 The County shall apply tree canopy coverage standards to discretionary permit review applicable to oak woodland habitats. Parcels having canopy cover by trees of at least 10 percent, as determined from base line aerial photography or by site survey performed by a qualified licensed arborist or botanist, are subject to canopy coverage retention or replacement standards: Percent of Canopy Cover to be Retained or Replaced **Existing Canopy Cover** 80 - 100 percent 60 of existing canopy 60 - 79 percent 70 of existing canopy 40 - 59 percent 80 of existing canopy

 20 - 39 percent
 85 of existing canopy

 19 percent or less
 90 of existing canopy

 Specific standards shall be included in the Zoning Ordinance.
 20 of existing canopy

Chapter 7 - Conservation and Open Space

Policy 7.4.4.5

Where existing individual or a group of oak trees are lost within a stand, a corridor of oak trees shall be retained that maintains continuity between all portions of the stand. The retained corridor shall have a tree density that is equal to the density of the stand.

OBJECTIVE 7.4.5: NATIVE VEGETATION AND LANDMARK TREES

Protect and maintain native trees including oaks and landmark and heritage trees.

Policy 7.4.5.1

A tree survey, preservation, and replacement plan shall be required to be filed with the County prior to issuance of a grading permit for discretionary permits on all high-density residential, multifamily residential, commercial, and industrial projects. To ensure that proposed replacement trees survive, a mitigation monitoring plan should be incorporated into discretionary projects when applicable and shall include provisions for necessary replacement of trees.

Policy 7.4.5.2

The County shall require, as a condition of development approval for Commercial, industrial, and multifamily residential uses, that at a minimum 50 percent of the proposed landscaping is consistent with the predominant plant community and fits the natural vegetation native to the area. Exotic or introduced plant species not consistent with the plant community in which proposed development is located shall be discouraged.

PRESERVATION OF CULTURAL RESOURCES

GOAL 7.5: CULTURAL RESOURCES

Ensure the preservation of the County's important cultural resources.

OBJECTIVE 7.5.1: PROTECTION OF CULTURAL HERITAGE

Creation of an identification and preservation program for the County's cultural resources.

Policy 7.5.1.1

The County shall include a Cultural Resources section in the Zoning Ordinance to address effective inventory, preservation, protection, and management of prehistoric and historic resources and to establish cultural and historic resource review procedures. Cultural resources include archaeological landscapes, sites, structures, features, artifacts, and/or areas of ethnic and religious importance. The ordinance shall include, but is not limited, to the following components:

 Development of project review guidelines including the requirement for consultation with local Native American groups;

134

Chapter 7 - Conservation and Open Space

「御きをすたたち」





3

5

3

7

Community Design, including architecture, landscaping and principles guiding the Clocation of improvements and layout of developed properties is an important part of determining the quality of life for residents. Good design promotes civic pride, efficiency of services and transportation of goods and people, and a sense of identity.

These Design Guidelines are included as an integral part of the Valley View Specific Plan for use by persons, organizations and public agencies in planning and carrying out developments within the Plan. They are not intended to bring a uniformity to each part of the Plan area, but rather to promote quality and cohestveness. Within the guidelines is found the general blueprint for development decisions affecting the siting of buildings, landscaping, parking and other design details. The Plan also establishes a process for the architectural review of proposed development of certain types of uses by an Architectural Review Committee to be established under Conditions, Covenants and Restrictions (CC&R's) in order to assure a compatibility of design, maintenance of a level of quality of development and compliance with the goals and policies of this Plan. These guidelines shall form the basis of any more detailed design policies which may be set by the CC&R's. For all residential developments, the Architectural Review Committee shall be solely responsible for the design approval of such projects, except where specific design criteria have been imposed by the County through conditions of approval of tentative maps.

These guidelines may also be employed by the County in its review of certain types of applications such as for all commercial development and Special Use Permits which involve the review of site plans or building plans. The guidelines are intended to be flexibly applied so that the creative process of design professionals engaged in the development of specific parts of the Plan can be fully realized within this general framework.

All developments which follow the adoption of the Valley View Specific Plan will be judged as to their consistency with the Plan and secondarily as to compliance with these guidelines. Where design review occurs, the approving authority for El Dorado County will apply the guidelines, not with the force of law, but rather, as a program



3

3

3

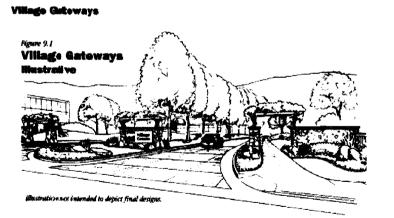
intended to family steer development in predictable directions. Judgment shall be retained by the approving authority as to whether a particular situation merits strict application af the rules and standards contained herein or whether deviation may be warranted. It applying this judgment, no specific development project nor portion of the Plan shal be entitled to a special privilege, lessening the achievement of the overall level of quality which the entire Plan area enjoys.

Sketches, plant lists and illustrations that appear in these Design Guidelines are to be considered which of the features illustrated but not as precise designs. Where dimensions are given they may be considered as general minimums to be reduced by approval of the Architectural Review Committee, or approving authority when the committee, or county fiads special circumstances in the particular situation under review.

All improvements shall meet the requirements of Title 24 of the State Administrative Code for energy conservation. To the extent that private architectural review requirements may conflict with this Title, other applicable sections of state law or local building codes, the provisions of such statutes or codes shall prevail.

Basic Previsions

Walley View is essentially a residential community with commercial, office and public uses largely intended to support the resident population. Residential areas are designed as three "villages" in a manner consistent with the pattern of the overall community of El Dorado Hills. Within each village, except for East Ridge, will be a number of acighborhoods designed to be accessible to limited access collector roads through identifiable entrances. In East Ridge Village, the prevailing lower densities and low traffic volumes makes the development of internal, limited access collectors unnecessary. Here neighborhoods will be more closely identified with terrain and the ultimate pattern of internal roads.



88

1

9 Community Decign

At the main entrance to West Valley Village and White Rock Village, defined gateways will be created into the community. This will be accomplished by landscaping, decorative walls and subdued signing within the right-of-way. At East Ridge, a similar gateway will be created at some point along the main collector access road ascending from White Rock Village. Figure 9.1 illustrates the Village entrance concept.

Neighborhood Entrances

1

1

3

2

1

3

Where defined entrances to neighborhoods are created off major collector roads, they may be developed with individualized signing and landscape treatment within a generalized framework. If such neighborhoods are developed as a single project, they may employ the marketing name of the project or may use such other indentifying name as may be determined at the time of subdivision. Signing may be developed within landscape areas or on decorative wall surfaces but shall be illuminated by indirect light only. Designs may employ the use of wood; composites; metal sculpture; carved, polished or cast stone; or letters in bas-relief. Figure 9.2 is illustrative of neighborhood entrance detail.

At points other than entrances, landscaping will be installed within the parkways and medians of collector roads as shown in Figures 5.5 through 5.7 in Chapter 5.At major

nodes and near entrances, landscaping may be elaborate, employing irrigation systems and such materials as turf and other high maintenance materials. The use of recycled treated effluent shall be preferred for landscape areas. Where such water cannot reasonably be provided, potable water may be used for entrances and high visibility design

Internal Streetscapes

elements. Any other landscaping shall use low maintenance plant materials which require infrequent or no irrigation. Figure 9.3 Neighborhood Entrances Illustrative Origination of the state of the st



13

(]

(`

10

1.1

1.1

1...

٤.,

ì

Residential Development

Building architecture in single family neighborhoods shall reflect a blend of the Compatible use of materials, combinations of colors, and architectural style with variety in setbacks and articulation of wall surfaces and roof lines. The repetition of simple roof lines on uniform setbacks and the dominance of large front-oriented multiple car garages on narrower lots are perhaps the two structural elements that most detract from pleasant and visually interesting neighborhoods. Architectural trim elements around windows, doors and defining building waist bands shall be continued on side and rear elevations which are visible from public vantage points. The degree of architectural detailing and finish shall generally be consistent throughout a production housing project from the least expensive to the most expensive unit.

The CC&R's for each tentative map for residential development shall contain provisions for the establishment of an architectural review committee. The purpose of this committee is to ensure that the Architectural Design Guidelines for single family development within the Specific Plan text are administered in conformance with the Specific Plan. These guidelines shall provide the minimum basis for review.

Architectural Guidelines for Single Family Residential

- Architectural design of all structures shall consider the site on which buildings are constructed, their relationship to other structures in the area, climate orientation and natural vegetation.
- Natural materials such as wood, masonry, stucco, stone and terra-cotta shall be incorporated. Finish colors shall be textural in nature, primarily natural tones, with accent trims on building openings and indentions.
- 3. Where rear facades of residential structures face a public open space or are visible from public roads or paths, that facade shall incorporate some of the same design elements as are used on the front of the house, such as window treatments and trim bands.
- 4. Walls of buildings shall have varied forms that provide visual interest and create texture, shadow patterns and avoid uninterrupted planes.
- 5. Trim materials shall be a minimum of three inches (3") in width and substantial thickness to create shadow patterns. Interesting window treatments are encouraged particularly on facades which face pedestrian and vehicular corridors.
- Attractive attic and foundation vents, consistent with the architectural style shall be used in all cases. Plant shelves are encouraged.

90

÷

onnunity Design
All roof flashings, gutters, downspouts and other related materials shall match adjacent materials and surfaces.
Openings in buildings shall be designed using architectural enhancements, indentations, roof variations and ornamentations.
Roofing materials are encouraged to be concrete tile, composition tile, slate, or similar tile materials. Because of the inherent danger of brush fires in foothill areas, the use of wood shake roofs shall not be permitted.
All mechanical equipment that is part of the residence, including cable boxes and electrical equipment shall be screened from view from any vehicular or pedestrian corridor, in all residential areas. No roof mounted equipment is allowed.
le Family Residential Site Design
Pedestrian and bikeway systems within a residential neighborhood shall be designed to tie into the community systems wherever possible. Local side- walk systems shall tie into the community pedestrian network at convenient locations, especially where commercial land uses abut a residential project.
When residential projects are adjacent to major drainage facilities or incor- porate a drainage facility as a part of the project design, the overall site plan is encouraged to treat the facility as an amenity. The site design shall utilize an "cycs-on" concept as opposed to one which turns its back to the feature.
Attractive unit masonry walls may be used at all appropriate locations.
Single family production housing shall include installation of front yard land- scaping for all units prior to occupancy. In lieu of developer-installed front yard landscaping, a home builder may allow for consumer-installed front yard landscaping through terms of sale including landscaping incentives such as credit or rebate programs. Such consumer-installed landscaping shall be in-

ב ב א

2

3

5. Shrubs shall be planted near house walls to provide a cooling effect and to shade and screen outdoor air conditioning units.



Ĩ

2

0

f

i

12

-

1.

03

13

ł

Ridgellaes

The following design treatments relate primarily to hillside and ridgeline locations since they are the areas of greatest visual concern. The intent is to reduce visual impacts from development in sensitive, exposed areas without adding prohibitive cost or limit flexibility to builder product.

These criteria are intended for use along the west slope of the primary ridgeline separating West Valley and East Ridge and two secondary ridgelines in West Valley.

Building Location—Primary Ridgeline

This section of criteria, Building Location, pertains to the west face of the primary ridgeline within East Ridge only. The remaining sections pertain to all designated ridgeline areas, including the East Ridge primary ridgeline.

- 1. Residential and ancillary buildings shall only be located on *primary building area* as defined in the "Development Requirements Within Oak Woodlands" section of the Specific Plan. This restricts improvements in ER areas to an area of 12,000 square fect or 25% of the total lot area, whichever is greater.
- 2 Residential and ancillary buildings shall not be sited in locations that are outside the general perimeter of the oak tree woodlands located along the upper west facing slope of the ridge. Buildings shall be sited to blend in with the woodland and utilize the woodland as a screening device from views of the ridgeline from outside the community.
- 3. The primary building area for a residential building shall be carefully located to avoid the most significant and mature oak trees within a given lot boundary. The building pad shall be selected to maximize the screening effect of oak trees from viewpoints located generally west and north of the property.
- 4. The primary building area shall be located on the lot in a manner that minimizes grading and the extent of visible fill or cut slopes from points down-slope. A balance between tree removal and minimizing grading should be achieved in the site design process.
- 5. A primary building area location study should be undertaken as part of the tentative map review. The site location study would evaluate slope, vegetation, view exposure from below, adjacent residential massing and access. After identifying the optimal building location and envelope, the primary building area shall be designated on the building envelope diagram.

92

9 Community Design

6. The view from U.S. Highway 50 and Latrobe Road shall be preserved by restricting building placement location along the East Ridge primary ridge-line as follows: All structures shall be situated below the ridgeline and not on the crest of the ridgeline in such a way that the majority of the structure does not project above the ridgeline. Where tree canopy exists within 100 feet of the building site, the structure may be located upon the ridgeline only under the circumstance that this is the only location available to avoid unnecessary tree removal. "Ridgeline" shall be defined as the top or crest of the ridgel.

Downslope Lots

3

3

3

2

1

This section of criteria, pertains to west-facing downslope lots adjacent to both the primary ridgeline at the western edge of East Ridge Village and west-facing downslope lots adjacent to the secondary ridgelines in West Valley.

- 1. Building massing shall generally "break" and "step" to reflect and reinforce the topography of the adjacent hillside and ridgeline. Stepping of building form on the down-slope side shall be provided where building pads are located on slopes in excess of 15% grade. "Steps" or offsets between vertical planes shall be at least six feet in depth.
- 2 Continuous, vertical building walls shall not exceed two floors in height on any downhill facade. Building facades that are greater than two floors in height due to slope conditions shall break the building face with terrace or stepped massing. Use of exposed "still" designs is prohibited, however, building pier systems may be utilized if integrated into the architectural design, covered by exterior wall and does not exceed ten feet in height.
- 3. Rooflines shall be "broken" and undulating in character and should generally reflect and reinforce the adjacent topography. Simple, full length, double gable rooflines are prohibited. Full width gables over two story massing is prohibited when facing directly down hill. Hip roofs, combination and multiple gable roofs are encouraged.
- 4. "Articulated massing" and detail are required on all downhill facing rear elevations. Massing shall be broken with off-setting planes, balconies, dormers, projections and other devices of sufficient scale to create shadow, character and interest when viewed from a distance. Large-bulk structures and boxlike masses are to be avoided.
- 5 One story elements shall be incorporated into building massing to better blend with topography and transition from adjacent oak woodlands. To the extent possible, massing should "build up" from one to two stories, especially

E DONADO
34
Gener Vero

1.1

ł

17

; ---

i 11

3

11

["

1.1

11

1

0

13

1 1

1

1

1

SPECIFIC PLAN

where homes are exposed to downhill viewpoints or not screened by existing woodland.

- 6 Building massing should be compatible to adjacent residences and provide a gentle transition of height and volume. Strong contrasts and dramatic statements should be avoided.
- Roof slopes should be flatter in slope rather than steeper to harmonize with adjacent topography and create a horizontal rather than vertical character.

White Rock Hillside Additional Design Criteria

The following design criteria applies exclusively to development of the ER-LL lots located on the immediate knoll at the northwestern section of White Rock Village, just southeast of the Multi-family Residential (MF) designated area.

- The lot configuration shall take a radial form with the center being the top of the ridge.
- Homes shall be located at the uppermost elevation of the lot, forming a "clustered" pattern of architectural massing.
- To minimize unsightly massing in relation to slope, no building pads shall be located on slopes exceeding 25%.
- 4. Homes located on slopes between 15% and 25% shall "step up" the slope and provide a one story down hill massing element at least 12 feet in depth.
- 5. No more than 25% or 12,000 sf of the lot shall be improved or graded.
- 6. Lot line fencing shall be limited to within 75 feet of buildings.
- Architectural styles for homes in this area shall be of a Ranch, Prairie or other style that is characterized by horizontal lines, flat roof pitches and moderate to dark earth tone colors.
- 8. Exterior walls shall be darker in tone utilizing earth tones such as brown, tan, green or warm gray. Flat white shall not be used except for trim.
- Natural appearing roof materials, such as fire retardant shakes, flat tiles, slate, barrel tiles, should be utilized to create a diverse, rich visual character. Roof colors should be darker than wall colors.
- 10. Grading shall be feathered out around all edges of the cluster so that after revegetation has been completed, no scarring is evident.

3

1

2

]

Architectural Character

Residential architecture shall be primarily controlled under a private process for Architectural Review administered under the authority of Conditions, Covenants and Restrictions (CCE-R's). In order to respond to changing availability of materials and the latest construction technologies, specific architectural requirements shall not be set within this Specific Plan, however the following general guidelines shall be followed in the administration of the architectural review process.

- 1. In general, the design of residential exteriors shall be harmonious with the character of the communities natural landscape.
- 2 Building materials and colors shall be subdued to minimize contrast. Colors shall be limited to both light and dark shades of warm earth tones. A variety and diversity in color is, however, encouraged.
- 3 Selection of dominant building colors shall take into consideration adjacent building, foreground natural landscape and adjacent woodland tones.
- Colors not normally found in the natural landscape, such as white, blue, cool gray and black shall be avoided.
- Rooftop appurtenances (jacks, vents, etc.) shall be located and grouped to conceal them from offsite vantage points below, and from direct view of neighboring homes.
- Cantilevered decks and balconies on any visible downslope lots shall be limited in size or avoided entirely.
- 7. Reflective windows and building materials shall be prohibited.
- 8. Building designs should in general be horizontal in character and attempt to blend and connect with the adjacent landscape and topography. Deep overhangs, horizontal roof lines and hip roofs should be considered over towers, turrets, and styles that require steep vertical roof forms.
- Accent materials should be considered that are harmonious with the natural landscape, such as cobble, cut stone, random stone, medium and rough timber and warm tone brick.

Grading Criteria

 Buildings should be sited on the lot in a location and configuration that minimizes the extent of grading and the height of resulting cut and fill slopes.



ì

ł

1

ŧ

ļ

1.

H

1

3

63

- 2 Cut and fill slopes over twelve feet in height that are visible from adjacent streets or offsite vantage points should be avoided.
- Cut and fill slopes over six feet in height and that are visible from adjacent streets or offsite vantage points shall be rounded and blended into adjacent, natural grades.
- 4. Creative architectural solutions should be pursued that adapt the building to the existing topography and minimize grading. It is, however, understood that gradeadaptive solutions can be prohibitively expensive. A balance between economic feasibility and land form adaptation should be a primary goal.

Multi-family Development

Multi-familydevelopment is permitted in the MFR,VC,MU, and CR land use districts and may accur within close proximity to commercial or single family uses. In order to ensure that a harmonious neighborhood character is achieved, the following design standards shall be met:

- Exterior naterials, colors and architectural styles shall utilize earth tones such as brown, tan, green or warm gray. Flat white shall not be used except for trim elements.
- Roofs shall be "full roof" design consisting of barrel tile, flat tile, retardant shake or other natural appearing material.
- Buildings shall be set back a minimum of 20 feet from adjacent property lines and shall be buffered through a combination of fencing and landscaping.
- Multi-family housing shall not be located on slopes steeper than 15% without "stepping" the building with minimum 8 foot wide single story elements.
- Parking shall be sited away from adjacent single family uses, or shall be buffered through a minimum 10 foot landscaped setbacks or other screening such as fences or walls.
- Trash containers shall be screened from view through the use of 6 foot masonry wals or solid wood fencing and shall not interfere with parking or internal circulation.

9 Committy Design

- 7. All other parking is subject to the requirements set forth in Chapter 17.18, *Off-street Parking and Loading*, of the El Dorado County Code.
- Wall materials shall have a natural appearance such as wood, masoury, stucco, stone or simulated stone.

11. A combination of hip and gable roof types shall be utilized within each multi-

- 9. Bright wall colors, such as flat white, pink or yellow, are not allowed.
- 10.Single, unbroken roof lines shall not exceed 60 feet in length.
- 3

3

1

family neighborhood.

Commercial Development

Commercial uses are planned in two locations, the Village Center and the Mixed Use area. Both locations are adjacent to Latrobe Road in West Valley Village. In both cases, commercial uses may be combined vertically with high density residential development as well as occurring separately. Comprehensive review of the site design, density and architectural features of commercial development shall be accomplished by the County through the Specific Plan Review process, as determined by the provisions of this Plan.

Commercial Architecture

- 1. The theme and building forms of proposed structures shall be consistent within each commercial center.
- Architectural materials that have a natural appearance such as wood, masonry, stucco, stone and simulated stone are encouraged. The use of textured or patterned concrete is acceptable if enough visual interest is incorporated.
- The architectural design of buildings shall consider the site, relationships to other structures, circulation, climatic orientations and natural vegetation.
- 4. Buildings shall not have long unarticulated exterior surfaces. Walls shall have varied forms and or texture to create visual interest.
- 5. Entrances to buildings shall be accentuated architecturally.
- 6. Horizontal orientation of roof planes is encouraged with attractively detailed parapets or similar elements incorporated to hide roof mounted equipment with emphasis on views from Latrobe Road.



ί.,

 \mathbf{O}

1

f

1

17

1

1

1

Commercial Circulation

- 1. Site access shall be minimized to limit disruption to off site traffic flows.
- Access driveways shall be designed to provide sufficient stacking capabilities to minimize site congestion.
- Clearly identifiable pedestrian routes from parking areas to buildings shall be incorporated. Textured or patterned paving materials are preferred.
- 4. Where the community pedestrian and bikeway system fronts a proposed project site, the on-site circulation system shall integrate and provide clearly defined routes for both types of transportation.

Commercial Site Design

- Parking areas shall be designed so that exterior landscaped buffers are not encroached upon. Berming and landscaping, within the landscape setback, shall be used to partially screen parking areas from view.
- Service areas, if present, shall be designed to have clear and convenient access without interfering with vehicular and pedestrian circulation.
- Service areas will be screened from roadways with six foot masonry walls, landscaping or architectural elements.
- 4. Buildings will be located in such a manner so as to enhance the projects visibility and identity, maintain compatible relationships with adjacent projects, provide convenient access to entrances and to address unique site opportunities.
- 5. Design of both parking areas and open spaces shall be done so that either element is not concentrated in one area. Large expanses of parking will be discouraged, smaller linked clusters of separated parking lots are preferred. Larger parking areas may be developed provided that landscaping is a minimum of 10% of the lot area and planters and landscape strips are a minimum of 5 feet.
- Shade trees shall be required to provide the following minimum coverage of parking lots within 15 years of issuance of building permits:

5-24 spaces	30%
25-49 spaces	45%
50 or more	50%

div D

Sign Guidelines

3

]

2

3

1

Freestanding Commercial and Office Signing

- 1. Freestanding pole signs are prohibited.
- At each street entrance to the Village Center, one detached sign on each side of the street shall be permitted. The information displayed on the signs shall be limited to the name and symbol or logo of the center. No advertising should be permitted on these signs.
- Such signs shall be low-profile signs less than 6 feet in height with maximum message area of approximately 100 square feet.
- Such signs shall be located in the landscape setback at least 10 feet from the street right-of-way line and comply with site distance requirements.
- 5. Wood and other natural earth materials such as concrete, aggregate, stone, brick slumpstone, or other acceptable material of a natural character may be used for these signs. Predominantly plastic signs shall not be permitted. Signs shall be integrated with landscaping.

Detached Business identification Signs

- One detached sign shall be permitted on each development site for the purpose of identifying the occupant or occupants of the site. The information displayed on these signs shall be limited to the name and symbol of the business occupying the site or the name and symbol of the businesses occupying the site and the street and street number. No advertizing shall be permitted on these signs.
- Signs shall be less than 4 fect in height with a maximum message area of 32 sq. ft. When multiple businesses are proposed to occupy a single site, signs may be 6 feet in height with a maximum message area of 40 square feet.
- 3. Wood and other natural earth materials such as concrete, aggregate, stone, brick slumpstone, or other acceptable building materials for these signs are acceptable. The choice of materials should match major building materials. Signs shall have back-lighting ot be externally illuminated. District identifications signs shall not be combined with business identification signs.



f

1]

3

L

1

1.

2

C

1

Mounted Susiness Identification Signs

- One mounted sign shall be permitted on each structure, or in the case of multiple businesses in a single structure, the wall frontage for that business, for the purpose of identifying the occupant. The information displayed on this sign shall be limited to the name and symbol of the occupant and address.
- 2. Mounted signs attached to vertical surfaces of a building or building-associated wall shall be allowed, with the provision that such signs appear as an integral part of the overall architectural and site design concept. Sign materials shall complement those of the structure to which they are attached. The attached sign area shall not exceed three percent (3%) of the total area of the walls on any face of the building to which they are attached.

Foncing

Find the set of the se

A number of differing applications are illustrated. Perimeter fencing along collector roads will be installed at the time adjacent private lands are developed to provide security, limit access and to complement the streetscape. Where a collector road is adjacent to an open space area a more open design is proposed. Fencing of interior lot lines and, for East Ridge, to enclose development envelopes of larger, estate parcels shall be more informal. In East Ridge, such fencing shall also be less opaque, allowing for a less intrusive visual element in the landscape.

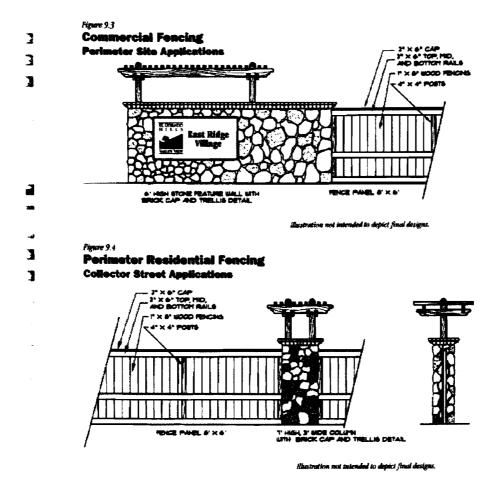
Perimeter Fencing and Walls

High quality wood fencing and decorative stone accent features shall be provided in perimeter fencing surrounding commercial centers and residential neighborhoods in West Valley and White Rock Villages.

Figure 9.3 illustrates the fencing standard to be used along arterial and collector streets where no access is allowed. Figure 9.4 shows a perimeter fence along collector streets in Residential Neighborhoods in West Valley and White Rock Villages.

Interior Foncing

Within the SFR. CR and MFR districts and in ER districts within West Valley Village, interior fencing shall conform to Figure 9.4 except that masonry pilasters and trellis details shall not be required except at exposures facing street sides or other public views. Two by six inch mid-rails may be eliminated for any fence 6 fect in height or less.





i

, 1

.

ł

3

1

Ĺ

 \square

í

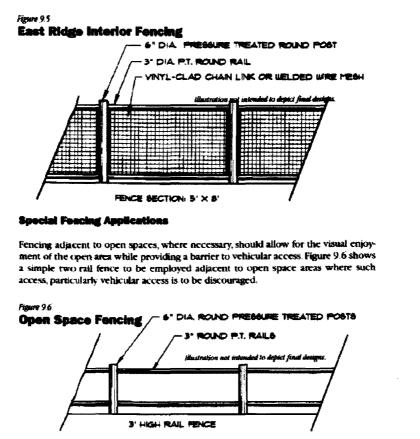
1

ł

۱. ۱...

i

In ER districts in East Ridge Village, fencing shall be provided according to the design illustrated in Figure 9.5 or such other design as may be approved by the Architectural Review Committee. On parcels containing woodland resources, the area fenced may be limited to a portion of the lot as described in Chapter 8, Development Requirements Within Oak Woodlands.





Lighting

3

]

3

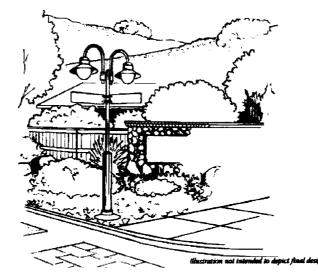
2

1

Lighting fixtures in outdoor public spaces will be designed to harmonize with the loverall design theme and prevent undesirable glare into surrounding properties. The following policies shall govern the design and placement of such lighting:

- Standard street lights shall be installed only at intersections and other locations where illumination is made necessary by public safety concerns where required by the El Dorado County Department of Transportation.
- Street signs may be integrated with low intensity illumination as illustrated in Figure 9.7. Such light fixtures shall be shielded and limited to no more than twenty feet in overall height.
- 3. Freestanding parking lot lighting in commercial and Multi-family parking lots shall utilize shielded down-lighting fixtures and shall be limited to no more than 30 feet in height. Lighting may be attached to building surfaces but shall be shielded to prevent overcast of illumination onto surrounding properties.
- Lighting shall be avoided where it may reflect into open space areas except where necessitated by public safety concerns.

Figure 9.7 Lighting Standard





. . .

17,

Landscaping

Parkway Landscaping

Desired effect of Landscape:

The overriding criteria behind the selection of the plants in each of the following plant lists is to provide a plant palette that will result in a landscape in developed portions of the Plan area, particularly West Valley and White Rock Villages, that will have a tidy manicured appearance year round with minimal maintenance and low water consumption. Shrub masses should be maintained as "masses" and not pruned into individual "pom poms". Land form should emulate the flowing contours of the foothill setting punctuated with the native rock outcrops, particularly with settings of the "tombstone" formations prevalent on the property.

An ample supply of reclaimed water is available for parkway landscape purposes, making possible the use of turf as a major landscape element. Trees and shrub plantings, by their nature, are a long term investment and should, in general, be of a water conserving type. Exercise of prudence in the permanent plantings will give a buffer to future water shortages so that the higher investment trees and shrubs can survive water shortage. The temporary abandonment of some lawn areas can be quickly regenerated following drought times.

The use of perennials and "scruffy" appearing shrubs such as *buddlea* or *perovskia*, for example, is discouraged as distracting from the tidy manicured look desired for the parkways. Within the flow of the evergreen shrubbery, focal points of large scale colorful shrubs should provide seasonal accents.

Landscaping at village and neighborhood entry points should be further enhanced with areas of seasonal color, utilizing the rich selection of flowering annuals, perennials and bulbs available. "Tidiness and manicured look" should extend to the seasonal plantings as much as to the permanent ones.

The lists are organized by plant type and matrixed to the various major corridors so that some variety of identity to each corridor is accomplished. Many additional plant material names could well be added to any of these lists; the intent is to provide a core palette of species that meet the criteria. It is expected that individual site landscape plans will adhere to the intent of these landscape parameters, and embellishment beyond these parameters should be limited in scope.

66

9 Community Decign

2

2

-4

3

1

Major Street Theme Trees

These are large-growing trees to set the theme and identity for the major corridors.

CRITERIA:

- Fast rate of growth, large mature size
- · Relative disease- and pest-free, clean habit
- Non invasive / non-surface rooting
- · Deciduous with fall color or spring flowers a bonus
- Relative low water requirement

Red Maple
Raywood Ash
Maiden Hair Tree
Sweet Gum
Tulip Tree
Sycamore
Scarlet Oak
Red Oak
Valley Oak
Idaho Locust

Secondary Parkway Trees

To be used to 'back up' the Avenue trees.

- CRITERIA:
- · Medium to fast rate of growth, medium mature size
- · Relative disease- and pest-free, clean habit
- Deciduous or evergreen fall color or spring flowers a bonus
- Relative low water requirement

Cedrus deodara	Deodar Cedar
Cedrus libani	Cedar of Lebanon
Celtis australis	European Hackberry
Celtis sinensis	Chinese Hackberry
Laurus nobilis	Grecian Laurel

	EL GORALDO HITLS	
		-
	Specific Plan	Į.
Magnolia grandiflora	Southern Magnolia	1
Nyssa sylvatica	Tupelo	· ·
Pinus species (except radiata)	Pioc	
Pistacia chinensis	Chinese Pistache	• •
Pyrus calleryana 'Bradford'	Bradford Pear	, ~
Pyrus calleryana Aristocral	Aristocrat Pear	
Quercus agrifolia	Coast Live Oak	i
Quercus ilex	Holly Oak	C
Quercus virginiana	Southern Live Oak	
Quercus urislizenii	Interior Live Oak	L A
Sapium sebiferum*	Chinese Tallow Tree	[]
Sequoía sempervirens	Coast Redwood	ţ
"use only where roots have plenty of room		
Color Accest Trees		
For use in focal point areas or accent points	in the parkway.	1
CRITERIA		1
 Colorful flowers, foliage or fru 	•	
 Medium to low water require 	ment	T
Cercis canadensis	Eastern Redbud	
Crataegus species	Hawthorn	. .
Koelreuteria panniculata	Golden Rain Tree	
Lagerstroemia	Crape Myrtle	
Magnolia soulangiana	Saucer Magnolia	1
Malus species	Flowering Crabapple	ι.
Prunus species	Flowering Plum	1
Pyrus kawakali	Evergreen Pear	1
Sopbora japonica	Japanese Pagoda Tree	
		1
		1
		I
		l
		1

Í



Screen Trees

1]] To be used for large scale screening of objectionable views or for privacy.

- CRITERIA:
- · Fast rate of growth
- Evergreen
- · Medium to low water requirement

Calocedrus decurrens	Incense Cedar
Cedrus deodara	Deodar Cedar
Cupressus glabra	Arizona Cypress
Pinus species	Pine
Quercus (evergreen varieties)	Oak
Sequoia sempervírens	Coast Redwood

Wetland Grove Trees

To be used in drainage areas where "enhanced "naturalized plantings are desirable.

	to be men in mininge firens truere entrute	e settementer the set of the set	
1	CRITERIA:		
-	 Compatible with drainage environment 		
	 Grove type of adaptability 		
فغب			
3	Acer buergeranum	Trident Maple	
-4	Acer truncatum	Chinese Maple	
3	Betula species	Birch	
101#	Nyssa sylvatica	Tupelo	
	Populus fremontii (male only)	Western Cottonwood	
-	Quercus wislizenti	Interior Live Oak	

Transition Buffer Zones

This list of plants includes low-fuel-buildup, drought-tolerant plants to be used in the transition Buffer Zone of large lots bordering on open space. See the Fire Safety Plan for additional recommendations—such as clear space requirements. All plantings in fire risk areas should be periodically thinned to reduce fuel load as may be required by an approved Fire Safety Plan. This zone would have temporary irrigation for plant establishment only.

E DORADO H I L L S IFFC PLAN

(` 1 1 -

11 í.

t.,

Arctostaphylos (low-growing species)	Manzanita	
Artemisia caucasica	Silver Artemisia	1
Atriplex glauca	Salt Bush	,
Atriplex semibaccata	Creeping Saltbush	1
Ceanothus (low-growing varieties)	California Lilac	
Cistus crispus	Rockrose	C
Cistus salviifultus	Sage-leaf Rockrose	
		Ľ
ERENNIALS / BULBS / ANNUALS		C
Achillea species	Yarrow	1
Brodiaea	Brodiaca	Ľ
Calochortus species	Mariposa Lilies	1
Eschscholzia californica	California Poppy	1
Fritillaria (native)	Chinese Lanterns	1
Lupinus species	Lupine	4
Mimulus species	Monkey Flower	6
Penstemon species	Penstemon	Г
Salvía columbarie	Chick	1
Salvia sonomensis	Creeping sage	Į.,
Santolina cbamaecyparis	Lavender Cotton	G
Santolina virens	Green Santolina	£.
Zausneria species	California Fuchsia	Ľ.
PRING BULBS [Note: these *exotics* will thrive u	nder oaks with no summer water.}	i
		1
(Daffodils, Narcissus, Scilla, Iris)		1
(Daffodils, Narcissus, Scilla, tris)		
(Daffodils, Narcissus, Scilla, Iris)		
(Daffodils, Narcissus, Scilla, (ris)		; ;
(Daffodils, Narcissus, Scilla, (ris)		; ;
(Daffodils, Narcissus, Scilla, (ris)		
(Daffodils, Narcissus, Scilla, Iris)		
(Daffodüls, Narcissus, Scilla, (ris)		
(Daffodüls, Narcissus, Scilla, (ris)		
(Daffodils, Narcissus, Scilla, (ris)		

ity Dee

....

3

3

Plant Species to Avoid in Transitional Areas

These species are known to be highly invasive when they are allowed to escape into the natural environment.

Hedera canariensis	Algerian Ivy
Bamboo	All varieties
Cynodon dactylon	Bermuda Grass
Genista and Spartium	Broom
Hedera beilx	English Ivy
Pennisetum selaceum	Fountain Grass
Lonicera japonica balliana	Halls Honeysuckie
Centrantbus rubra	Jupiter's Beard
Cortaderia selloana	Pampas Grass
VInca major	Periwinkle
Ligustrum ovafolium and Japonicum	Privet
Stenotapbrum secundatum	St. Augustine's Grass
Tradescantia	Trailing Varieties

Tree Species to Avoid in Public Area Parkways

In general trees whose form or growth babit are not in keeping with the footbill environment, or whose growth or rooting babits are damaging to paving or structures; those known to be so prolific as to become weedy or those known to be disease prone, bost damaging pests, or produce fruit or nuts that would be messy or an attractive nuisance.

Acacia species Bambos and Canes Chinese Tree of Heaven Cottonwood (female) Eucalyprus species Japanese Privet Leland Cypress Lombardy Poplars Mimosa Modesto Ash Monterey Pine



í î

;

ſ

[7]

11

11

1.1

1

3

 \Box

12

Mulberry Palms Weeping Willow White Alder

Large Shrubs for Parkway Backdrop and Screening

- CRITERIA:
- Fast growth rate, large shrub form
- Minimal maintenance at maturity
- Tidy appearance
- · Medium to low water requirement
- · Evergreen hardy

Arbutus unedo	Strawberry Tree
Ceanothus (large growing varieties)	California Lilac
Cotoneaster lacteus	Red Clusterberry
Escalionía rubra	Red Escallonia
Escallonia fradesii	Escallonia
Euonymus japonica	Evergreen Euonymus
Feijoa sellowiana	Pineapple Guave
Juniperus (large species)	juniper
Ligustrum Texanum	Texas Privet
Leptospermum species	Tea Tree
Nerium oleander	Oleander
Photinia fraseri	Frasers Photinia
Pittosporum tobira	Mock Orange
Prunus caroliniana	Carolina Cherry Laurel
Prunus laurocerasus	English Laurel
Raphiolepis Majestic Beauty	India Hawthorn
Viburnum suspensum	Sandandicwa Viburnum
Viburnum tinus	Laurustinus
Xylosma congestum	Xylosma

9 Community Design

.

Large Deciduous Flowering Accent Shrubs

CRITERIA:

- Shrubs to be interspersed into the evergreen backdrop for large scale seasonal color display
- Tidy appearance (clean look when not in flower)
- Medium to low water requirement

3		
4	Cercis occidentalis	Western Redbud
1	Chaenomeles japonica	Japanese Flowering Quince
-	Forsythia species	Forsythia
	Lagerstroemía (sbrub forms)	Crape Myrtle
**	Punica granatum (fruitless type)	Pumegranate
	Roses (floribunda type)	Roses
•	Styrax officinalis californicus	California Styrax

Small to Medium landscape Shrubs for General Application

CRITERIA: • Dependable, hardy, easy maintenan • Evergreen tidy appearance • Medium to low water requirement • Seasonal color accents	
Abella grandiflora 'Edward Goucber' Arctostaphylos 'Howard McMinn' Herberis thunbergii Buxus species Carpenteria californica Ceanothus species Ciscus species Cosrea species Correa pulchella Cotoneaster species Dietes vegeta Escalionia 'Terri'	Dwarf Abelia Manzanita Japanese Barberry Boxwood Bush Anemone California Libac Rockrose Creeping Coprosma Australian Fuchsia Cotoneaster Fortnight Lily Terri Escallonia

ł į 1 Juniperus species Juniper . . Lacandula species Lavender Mabonia species Oregon Grape 11 **Heavenly Bamboo** Nandina domestica New Zealand Flax j e Phormium tenax Pittosporum tobira varieties Pittosporum 11 Pyracantha Red Elf Firethorn Rapbiolepis species India Hawthorn Rosa floribunda varieties Floribunda Roses Rosmarinus species Rosemary Salvia gregii Autumn Sage Viburnum 'Spring Bouquet' Viburnum 11 10 Small to Medium Shrubs for Special Applications Ł CRITERIA For limited use 1 · Where cultural conditions allow these higher water-use plants · Could be a welcome addition to the plant palette -Azalea soutbern índica 'Duc de Roban' Hybrid Azalca أسا Hybrid Azalea Azalea southern indica 'Fielders White' Hybrid Azalea Azalea soutbern indica 'George Taber' D Hybrid Azalca Azalea soutbern indica 'Phoenicia' 13 Camellia japoníca & sasangua varieties Camellias Erica species Heath ŧ Gardenia species Gardenia 1 Hydrangea Hydrangea species 1 Loropetalum varieties Loropetalum Osmanthus fragrans Sweet Olive ÷. Pieris japonica Lily of the Valley Shrub i. 1

112

iy P

Herbaceous or Perennial Species

These permanent planting, colorful perennials should be used at accent points. Many other perennials could be acceptable in limited use with appropriate maintenance to maintain tidy appearance.

CRITERIA

- Dependable, relatively low maintenance
- 3

3

2

ai.

3

1

Relative low water requirements

Discase / pest resistant

Tidy appearance

Acbillea tomentosa	Yarrow
Agapanthus species	Lily of the Nile
Artemisia 'Powys Castle'	Wormwood
Euryops pectinatus 'Green Gold'	Euryops Daisy
Hemerocallis species	Daylily
Santolina virens	(No common name)
Tulbaghia violacea	Society Garlic

Vines

These vines can be used for masking large expanses of wall with relative low maintenance. Other High maintenance vines such as wisteria, rosa banksae, or clematis atmandi can be welcome additions in controlled situations.

CRITERIA

- Self-adhering climbers
- · Low to medium water requirements
- Relative low maintenance

Ficus pumila

Macfadyanas ungus cati Parthenocissus tricuspidata Creeping Fig Cat Claw Vine Boston Ivy



į

[...

Ľ

3

Ł

ł

1. L

-

أهد ا

a

1

Ground Covers for Mass Application CRITERIA Dependable cover • Disease & pest resistance · Low maintenance · Low to medium water requirement Arctostaphylos Manzanita California Lilac Ceanothus borizontalis & gioriusus Coprosma kirkii Creeping Coprosma Cotoneaster (evergreen prostrate varieties) Loropetalum Hypericum calcycinum St. Johnswort Juniperus (prostrate varieties) Sweet Olive Myoporum parvifolium Myoporum Trachelospermum Jasmine Vinca minor Periwinkle **Ground Covers for Smaller Area Applications** CRITERIA Flower mass · Easy care + Hardy Gazania 'Mitsuwa' Gazania Osteospermum fruticosum **Trailing African Daisy** Scaevola 'Mauve Clusters' Mauve Clusters **Oak Woodland Conservation Techniques** ţ **General Tree Care** Before construction begins, it is important to have the trees in the most healthy, vigorous condition as possible so that they can withstand the inevitable stress of construction activities. The following recommendations pertain only to trees that may be directly impacted by roads, houses, and other hard surfaces. í. 1

9 Community Design

1. Pruning trees. Prune to remove deadwood and end-weights of unusually heavy limbs. End-weight removal should be done in such a manner that the cut leaves a lateral branch of at least 1/3 the diameter of the removed portion. No stub cutting should be allowed. Leaving stubs as well as excessive pruning is not only unsightly but it encourages vigorous watersprout growth which is susceptible to mildew. Excessive pruning can also result in sunburning of exposed limbs, poor branching structure, and added maintenance costs. Pruning should follow International Society of Arboriculture pruning standards. Pruning must be supervised by an arborist.

 Fertilize and Aerate the Soil. It is advisable to fertilize the trees before construction begins. Deep root liquid "feeding" with a fertilizer high in nitrogen, but also containing phosphorous and potassium, is recommended.

Root Protection Zone

3

3

3

2

1

3

1. Soil Compaction and Root Damage. Protect the trees from soil compaction and root and trunk damage from the activities of heavy equipment and parking of vehicles. Soil compaction reduces air space in the soil and lessens the trees ability to "breathe". The majority of a tree's root system, though extensive, is relatively shallow.

Protect the root zone by building *protection fences* around individual trees. A good starting point for protection is the dripline area of the tree. The dripline radius is an easily identifiable indicator of the tree's hazard zone to operators of heavy equipment. It is important to keep in mind that the dripline area does not indicate the true area of the tree's roots since a large tree's actual root zone can extend several times again beyond the distance of the dripline radius. Therefore, the farther the placement of the protection fences from the tree as possible will help to insure its survival. The fences should be installed before construction begins.

It is best that grading occur when the soil is dry in order to avoid excessive compaction.

2. Grade Changes—cutting. Avoid making grade changes—changes in the ground level—within the dripline of the trees. Grading is probably the principle cause of death of oak trees in new construction sites. Grading damages the tree's root system which lie in a shallow zone near the surface of the soil. Cutting the tree's roots can cause considerable damage to the trees, and impairs the tree's ability to absorb water and nutrients. Precaution should be taken not only to protect large roots, but just as importantly the smaller "feeder" roots.



ļ

1

1

11

ſ

(

11

۲

ل ا

 \Box

1.1

÷

1

When roots have been exposed by grading, they should be cut back to the soil line under the supervision of a qualified arborist. Grading cuts expose larger amounts of soil surface and therefore causes greater moisture loss from the root zone. During hot weather, it may also be important to water the cut surface and cover with opaque plastic or mulch. When lowering the grade around trees, keep cuts as far as possible away from the tree by installing walls. Use of discontinuous footings will minimize injury to roots.

3 Grade Changes—Adding Fill and Pavement. The addition of fill can be as equally damaging as the removal of top soil. Fill, especially heavy clays, prevents the root's access to oxygen, an element critical to the plant respiration. Respiration is related directly to the processes of active water absorption and nutrient uptake. Fill also prevents water percolation into the root zone. If fill must be added to a site, there are three possible solutions:

A. Retaining Walls. Retaining walls in the root protective zone are designed to hold back the soil above or below an existing tree, thus avoiding the addition of fill directly on the root zone. Retaining walls should be avoided if possible as they can cause critical areas of the dripline to be buried or can sever the roots. If retaining walls are used, then use a discontinuous pier type of foundation.

B. Crushed stone or gravel. If a porous soils is used as fill and the fill is no more than about 18 inches deep, then several layers of 2-3 inch stone can be spread over the original soil surface. Start with a thin layer just beyond the dripline and build to a height of the fill at the base of the tree. This allows air, water and nutrients into the root system.

C. Spoke and Wheel Aeration Systems. Actation systems should be designed for each individual tree. They permit air and water to reach the tree's roots. Aeration systems are installed at the original grade before any fill is added. A concrete or asphalt surface used in combination with an aeration system should be used.

4. Trenching. The digging of utility trenches can result in the destruction of the trees' roots. No trenching should be done anywhere within or near the dripline of the tree. If trenching must be done, then the utilities should be placed in a conduit which is bored or tunneled through the soil; this reduces the damage to the roots. If utility conduits are not available, then try to place all of the utilities in a single trench. This may require discussion with the various utilities companies as it can be difficult to coordinate their various trenching specifications and timing needs. When roots are exposed in the

9 Community Design

1

3

3

2

]

trenching process, they should be covered with wet burlap and kept moist until the soil is returned.

5. Dratnage Alterations Avoid grading designs that result in a tree being in a depression that collects water, especially during the summer season when oaks need dry soil. The soil should drain away from the trunk area.

Roof downspouts and paving near a tree may result in either excessive water close to the trunk during the rainy season, or conversely, preventing water from reaching the root zone. Appropriate measures must therefore be taken.

6. Pavement over the root system. Under certain circumstances, it may be possible to put a hard surface, such as a driveway, over a part of the root system (about 25%). At least two alternative designs are possible. Interlocking paving stones may be placed over the soil surface. They allow the roots to breath as well as obtaining water and nutrients. Another possible solution is using pavement, but placing 2-3" stone underneath the pavement, again allowing the tree to breath as well as obtaining water and nutrients. (See figure 7 & 8).

7. Retaining walls and fences. When installing fences and retaining walls, it is important to avoid any trenching or digging if possible. In place of trenching for foundations, the use of concrete pier pilaster foundation, with discontinuous footing, is recommended.

8. Fertilization. Before watering and mulching, apply a water soluble nitrogen fertilizer on to the soil surface. Approximately 4 pounds per 1000 sq. ft. are recommended. Immediately water and spread mulch.

9. Drought avoidance—irrigation. Soil disturbance during the summer months, and especially during periods of drought, can severely impact oak trees. Prior to invading the root zone, it will be necessary to water that part of the root zone that will remain. The top 3 ft. of the root zone should be thoroughly wetted. This will not only help a generally stressed tree, but it will also begin to assist the tree in growing roots needed to compensate the roots that will be lost.

A soaker hose should be placed about 4 ft. away from the trunk to the outer area of the root zone that is to be protected. Irrigate overnight or for about 8-10 hours. Water slowly to avoid runoff. If runoff occurs early on, turn the water off for several hours, and then water again.

10. Drought avoidance-mulching, Prior to soil disturbance, mulch the areato a depth of 4-6 inches - that will be protected. Along with irrigation, as



ł

l

{ `

13

1

11

6.

1.....

ĺ.

1.

mentioned above, mulching the root zone area will insulate the tree from water loss and encourage new roots to grow.

11. Root pruning. When trenching or a grade change is made in the root zone, it is important that the roots not be ripped or that braided remains of roots left dangling. Roots that are 1" or more in diameter should be preserved. Far better, the roots should be cleanly pruned back to 1-2 inches of the soil line. When trenching is done with a backhoe, then it is best to have an arborist on the site to prune the roots as they are encountered.

12. Protection of exposed root zone. The embankment of the cut root zone should be moistened and covered to retard water loss. Layers of burlap, moistened on a regular basis, should be placed on the cut banks.

13. Tree removal. Should trees be removed, they should be taken down by a professional, and the stumps removed with a router. The use of a backhoe is not recommended, as that tends to disturb the root system.

Oak Woodland Landscaping Techniques

Tree Maintenance

- Irrigation. Most California oaks are adapted to cool, moist winters and hot, dry summers. They prefer well-drained soils. A similar environment should be maintained in developed locations. In addition to following the above procedures, it is necessary to adhere to certain practices. Do not water in the summer months, especially near the base of the tree. If water is done during the summer months, infrequent watering is preferred to frequent watering. Excessive and/or frequent watering encourages the growth of life-threatening root fungi.
- 2. Gardening Techniques Beneatb Oaks. As native oaks do not tolerate summer watering, it is important to select ornamental plants that are tolerant of summer drought conditions. Many native plants are well suited in developed oak landscapes and are not only attractive, but require low maintenance.

Placing mulch in the root zone of oaks is beneficial. It adds humus, improves aeration and fertility, and prevents excessive evaporation. Leaf litter or wood chips should be used as mulching. The source of the chips should be monitored. Do not use redwood chips as they contain certain undesirable chemical. Do not use chips that might contain seeds of weed trees and shrubs.



Э

Do not plant within 6 to 10 feet of the trunk. Do not use plants that require supplemental water once established. Choose drought tolerant plants and irrigate with a drip-system for not more than two summers.

Oak Tree Regeneration Techniques

Direct Seeding of Oak Acorns

Oaks are readily established by direct seeding of acorns. Methods of collection and preparation of acorns includes the following:

3 3	 Valley oak acoms should be collected locally, either on site or within a several mile radius. Acoms are "ripe" when the cap can be separated from the seed.
•••	 Acoms should preferably be collected directly from the tree; those lying on the ground are usually dried out, diseased, or infected by insects.
	 Collect the acorns by using a long pole to "beat" the branches, causing the acorns to fail onto a tarp beneath the tree.
2	 Keep only the healthiest and largest acorns. Shriveled or diseased acorns should be thrown out. Place the acorns into a container of water to further weed out unhealthy ones which float to the top.
3	• The acorns should then be stored in a controlled environment to maintain their viability. Place acorns in zip-lock polyethylene bags (that breathe) with a moist medium such as a 3:1 perlite and vermiculite mixture, and store in a refrigerator at approximately 38 degrees Fahrenheit.
	• Plant the acorns from early fall (after sufficient rains) to early spring.
	 At planting time, place 2-3 acorns per hole, burying them at depths from 1-3 inches.

 Protect the acorns with a planting sleeve that is buried 3-5 inches beneath the soil surface for protection from rodents.



ţ

1.

ţ

Ę

Ľ

-

1

ŕ *

3

: :

ł

Containerized Seedling Materials

Nursery Conditions/Health Requirements

Seedlings raised from locally collected materials shall be contract grown at a nursery experienced in cultivating native plants. Plants can be grown in various sized containers, but containers that accentuate long root growth should be used. Several commonly used in restoration practice include: $2.5 \times 2.5 \times 5$ inch treebands; 9-inch dee-pots; and 4 x 4 x 14 inch treebands. Smaller sized containers are less expensive, and are more readily available over a shorter time interval after ordering. A disadvantage of small-sized materials is that young plants can be fragile and more difficult to establish (and therefore more expensive in the establishment phase). An advantage of larger sized plant materials is that they can be somewhat more hardy in the establishment phase (thereby requiring less care), but plants will not fair well if rootbound.

The plants shall be grown under similar climatic conditions to those in the locality of the project site. Plant material shall be grown for at least 6 months, but no more than two years, in the containers in which they are delivered before planting in the ground.

Plants must show vigorous growth and health characteristics. Vigor, health, and root development is more important than height and spread. Plants should be free of insects and disease, disfiguring knots, sun-salt injuries, abrasions of the bark, or other objectionable defects.

Roots should be well distributed through the entire soil ball, be fully developed without restriction. No trees shall be used that are rootbound. Roots shall not be bent, curled, twisted, or deformed as a result of the growing process.

Delivery

The plants shall be handled and transported in a manner that will prevent damage to the branches, roots, shape or future development. In open vehicles, the plants should be covered with a tarp The root mass shall be kept moist at all times.

Delivery inspection shall be made after previously inspected trees have been delivered to the job site. A dated notice of approval shall then be issued. If any of the plants are unacceptable, then the Contractor will notify the nursery or party responsible for delivery, in writing, why the plants are unacceptable.

Protection and Handling

Plants that have been delivered to the job site may need protection from drying conditions, e.g., watered in the event that they are not planted immediately. Plants that are dry or wilted shall not be planted.

9 Community Design

3

3

1

2

3

1

Sundling Planting Methods

The procedure for the planting of seedling container material is as follows:

- Within a 3 foot square area, clear all weeds, herbaceous ground cover, and other materials to reduce competition for water and nutrients.
- For sloping terraces, dig a 12-18 inch wide terrace that slopes back slightly into the hillside. No terrace is needed on level ground.
- Excavate a planting hole approximately 1.5-2 times the height and 2-4 times width of the root ball (smaller hole sizes are permitted when the soil is loose; conversely, larger hole sizes are recommended in hard soils). For 9-inch deepots, this will be approximately 12-18 inches deep and 10-12 inches across. Roughen the sides of the planting hole.
 - Place a 1/2 ounce of slow release fertilizer in the bottom of the hole and mix with native soil used to back fill the bottom of hole. Tamp and fill until the depth of the hole is 0.5 inches less than the root ball depth.
 - Remove the plant from the container without breaking the root ball. Scarify
 or roughen the sides and loosen the bottom of the root ball if the plant is
 rootbound.
- Place the plant in the hole, hold plant in place, and back fill with native soil. Be sure to remove larger rocks, weeds and other debris from the soil mix. Plant should be installed so that the root crown is 1/2 inch above the soil of the root ball to allow for settling. Tap soil in planting hole to remove air pockets. Add water to planting hole to allow for settling of the soil.
- Construct a 3-inch high berm for a temporary irrigation basin (depending upon the type of permanent irrigation, a larger basin may be constructed at this time).
- Place a 3-4 inch thick layer of mulch in the 3 foot square planting area (but do not bury root crown).
- Place 3 (-4) foot square landscape fabric around plant, covering the mulch area. Secure each of the 4 corners with a six inch staple.
- Pour 2-3 gallons of water into the planting basin.



ţ

ì

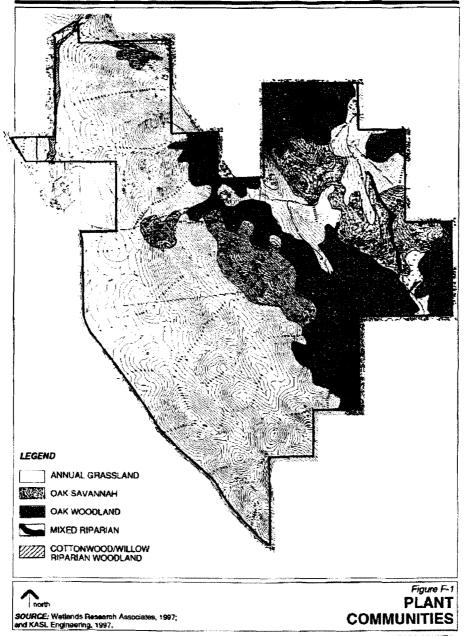
.

1

 Tree sletters shall be placed over the plant, inserting the lower surface of the tube 0.5-2 inches into the soil surface (inserting the tubes into moist soil is easier). The tree shelter shall therefore be scaled at the base with soil to prevent air from entering directly into the shelter from the bottom. The tree shelter stake should be driven into the ground approximately 3-5 inches, and then the tube tied or fastened to the stake with the ratchet locking ties.

APPENDIX D- Draft Conceptual Tree Mitigation Plan (Jeffrey A. Hart) and Figure F-1 of the Draft EIR

Figure F-1



VALLEY VIEW SPECIFIC PLAN EIR * EL DORADO COUNTY Wagelaff and Associates * Urban and Environmental Plannan

NOTE: This Draft Tree Mitigation Plan has updated and has been included in Chapter 9 of the Specific Plan see Appendix C

Conceptual Tree Mitigation Plan

for the

Mansour Company

by

Jeffrey A. Hart

The Valley View oak tree mitigation plan involves the following concepts:

- 1. Designation of open space preserves.
- 2. Avoidance of tree impacts during construction.
- 3. Designation of gransition open space areas.
- The deployment of arborist teanniques to protect tress during construction.
 Development of a landscaping maintenance program compatible with oak
- Development of a midscaping and demande proposition companies with the states.
- 6. Development and implementation of an oak tree regeneration program.

1. Open Space Designation

The Valley View project site consists of approximately 2,000 acres, and of these, anotal grassland habitat comprises 1400-1500 acres, approximately XX acres is made up of wellands, and 500 acres (ar approximately 56,000 trees) consists of oak wondland habitat. The forest canopy types have been divided into 9 different cover classes, as described in an earlier report (Hart, 1997) that summarized preliminary recommendations for development and conservation.

The first element of the tree mitigation program consists of setting aside open space woodland areas within the project area. At the present time, approximately xx acres are designated as open space preserve. This area represents approximately xx canopy acres (xx % of total), or xx (xx percent of total) trees.

2. Avoidence of frees During Construction

The second element of the tree mitigation program consists of avoiding tree hupacts, to the extent practically feasible, wherever construction is being proposed near oak trees. Impact to trees should be lessened by aligning roads, driveways, and houses to avoid direct tree impact (please elaborate to give examples of which I may not be aware). For example, per regulations of the COE, many of the forested welland corridors crossings have been minimized. Imore examples, here Richard, Project engineers should work closely with an arborist or botanist to avoid trees wherever possible.

3. Designation of Transition Open Space Areas

In addition to hardscope features (e.g., roads, buildings, yard areas) and open space areas, a third (and use classification consists of transition open space areas. This land use consist of areas within individual lots, but outside the 12,000 square feet "built areas".

> Page 1 Drafi 4/21/98

A estimate of the total number of canopy acres (and trees) will be determined for the transition open space areas. It is possible that approximately 200 acres (277) will be preserved within this land use classification.

Land use activities that are not permitted within transition open space areas include the construction of gazebos, fences, planic tables, benches, etc. Land use activities permitted may include pruning and prigation.

The land owner may occasionally lightly prune trees in order to improve viewsheds from their house. However, general printing within the transition open space area is not recommended since dead wood in trees serves as valuable habitat for widdlife. It is recommended that no more than 10% of the trees for canopy area) be printed in the transition open space areas.

Light irrigation, to encourage natural fire breaks, may also be permitted within the transition open space areas. Perennial banch grasses, such as blue wildrye, should be planted in a zone within the transition zone, but adjacent to the built environment, where light irrigation (occasional deep watering punctuated by relatively long dry periods) can foster a permanently green zone that would retard wildfire.

4. Built Sites.

The built sites are those areas within the homeopmers lots where the driveway, house yard, outbuildings (e.g. tool sheds), pools, and landscaping are permitted. No more than 12,000 square feet (or 25% of the individual lots, whichever is greater) within each lot will consist of the built environment. Lots range in size from xx to xx acres it, size.

Several issues relative to tree preservation and conservation are pertinent, including: I) evoluance of impact 2: arboricultural techniques necessary to protect traes; and 3: landscaping.

Impacts to trees may be direct, in which there is a need to occasionally remove entire trees that may be in the path of structures and roads, or indirect largely due to impacts to the trees root zone. To avoid direct impacts, driveways leading to the developed site could be designed to follow a meandering path to avoid trees. Meandering driveways would also create softer lines than straight toads. Roads and driveways requiring grade changes within the trees root zone (= driphne) constitute indirect impacts. Some impact to this zone may be safely permitted, provided that mitigating measures are followed including: 1) not impacting more than 1/8 of the root zone. 2) promoting measures such as mulching, fertilizing to promote the health; 3; providing root aeration systems for grade changes. See Appendix I for a more complete description. An experienced arborist should be on site during construction to monitor these activities.

Oak trees preserved within the built environment add considerably to the quality of living. Additional measures to promote tree health in intensively used environments include corrective tree pruning. fertilization, and other measures detailed in Appendix I. Grade changes can be detrimental to tree health, since either grade lowering will injure roots, and grading raising will deplete available oxygen required for root growth and overall tree health. Appropriate aeration systems, as detailed in Appendix I, should be followed.

Landscaping in the vicinity of oak uses can add to the aestbetic quality of the site... However, the amount and frequency of brigation required to sustain exotic, non-native plantings can be detrimental to oak tree health. To the extent feasible, the use of drought tolerant landscaping plants (including California native species), will promote tree health. Irrigation schedules that include occasional deep watering regimes alternating with extended dry periods should permit the planting of luxuriant landscape plants yet not impair the bealth of oak trees. Landscaping techniques, and recommended drought tolerant species are included in Appendix I.

> Page 2 Draft 4/21/98

5. Oak Regeneration Program.

The oak regeneration program is designed to compensate for tree loss through 1) rise out regeneration program is besigned to compliant in the name drough () fostering patural regeneration, 2' direct seeding of oak acortis; 5) direct planting of oak trees. Four species of oak are found on the site: blue oak, valley oak, interior live oak, and black oak. An oak tree mitigation program should follow a more complete analysis of impacts to the site.

Natural Regeneration. The effect of many years of grazing at the Valley View site has impaired the natural regeneration process. While many large oak trees are found on the site, small trees indicative of frequent regeneration pulses are very uncommon. Cows tend to eat young oak trees, especially after the annual grasses have cried out by early summer. The effect of removing the cows from the property will likely enhance the natural regeneration process. At the same time, however, the increased growth of annual as a consequence of removing the cattle may compete with oak seeding establishment. Various measures will be taken to ensure regeneration success.

Arborists have long recognized that wood chips placed as mulch beneath oak trees provide conditions that foster hatural regeneration. The beneficial influence of wood chip mulch would appear to be reduction of weed competition and increase of relative soil moisture. Acoms can either fall directly from the uses into the mulch, or often blue son indistrict receives the outer that access, show the late we have the description of the access should be placed at splected placement of woodchip mulch, averaging 5-6 inches deep, should be placed at splected locations. Any trees removed from the site should be chipped and the mulch used to foster regeneration.

This natural process of oak establishment can be augmented by collecting acords in the fall, storing them in cold refrigeration and after the first fall rains, planting them in the top 2-3 inches of the milich.

Another strategy would be to grow young seedlings from the acorns, which would Another strategy would be to grow young security, instant an accrua, a be bianted as one year old plants the following fall. Methods for collecting acords, storage, planting, and container plant establishment is described in Appendix xx.

Page 3 Draft 4/21/98

Appendix I.

Arboricultural Tree Preservation Techniques

General Tree Care

Before construction begins, it is important to have the trees in the most healthy, vigorous condition us possible so that they can withstand the inevitable stress of construction activities. The following recommendations pertain only to trees that may be directly impacted by roads, houses, and other hard surfaces.

1. Pruning trees. Prune to remove deadwood and end-weights of unusually heavy limbs. End-weight removal should be done in such a manner that the tut leaves a lateral bratch of at least 1/3 the diameter of the removed portion. No stud catting should be allowed. Leaving study as well as excessive pruning is not only unsightly but it encourages vigorous watersprout growth which is susceptible to mildew. Excessive pruning can also result in surburning of exposed limbs, poor branching structure, and added maintenance costs. Pruning anould follow International Society of Arboriculture pruning standards. Pruning must be supervised by an arborist.

³ Fettilize and Astate the Soil. It is advisable to fertilize the trees before construction begins. Deep root liquid "feeding" with a fertilizer high in nitrogen, but also containing phosphorour and potassium, is recommended.

Root Protection Zone

 <u>Soll Compaction and Root Damage</u>. Protect the trees from soil compaction and root and trutck damage from the activities of heavy equipment and parking of vehicles.
 Soll compaction reduces an space in the soil and lessens the trees ability to "breathe". The majority of a tree's root system, though extensive, is relatively shellow.

Protect the root zone by building protection fences around individual trees. A good starting point for protection is the dripline area of the tree. The dripline radius is an easily identifiable indicator of the tree's hazard zone to operators of heavy equipment. It is important to keep in mind that the dripline area does not indicate the true area of the tree's roots since a large tree's actual root zone can extend several times again beyond the distance of the dripline radius. Therefore, the farther the placement of the protection fences from the tree as possible will help to insure the its survival. The fences should be installed before construction begins.

It is best that grading occur when the soil is dry in order to avoid excessive compaction.

2. Grade Changes autring. Avoid making grade changes - changes in the ground level - within the drivbine of the trees. Grading is probably the principle cause of death of oak trees in new construction sizes. Grading damages the trees root system which lie in a shallow zone near the surface of the soil. Cutting the trees roots can cause considerable damage to the trees, and impairs the tree's ability to absorb water and nutrients. Precaution-should be taken not only to protect large roots, but just as importantly the importantly the important of a data.

smaller "feeded" nots When nots have been exposed by grading, they should be out back to the soil line. Grading cuts expose larger amounts of soil surface and therefore causes greater moismire loss from the root zone. During hot weadler, it may also be important to water the cut surface and cover with opaque plastic or mulch. When lowering the grade around trees, keep cuts as far as possible away from the tree by installing walls. Use of discontinuous footings will minimize injury to roots/Figure 3).

> Page 4 Draft 4/21/98

3 <u>Grade Changes</u>. Adding <u>Fill</u> and <u>Vavement</u>. The addition of fill can be as equally damaging as the removal of top soil. Fill, especially heavy clavs, prevents the root's access to oxygen an element critical to the plant respiration. Respiration is related directly to the processes of active water absorption and nutrient uptake. Fill also prevents water periodation into the root zone. If fill must be added to a site, there are three possible solutions:

A. <u>Retaining Walls</u> Retaining walls in the root protective zone are designed to hold back the soil above or below ar existing tree, thus avoiding the addition of fill directly on the root zone. Retaining walls should be avoided if possible as they can cause ortical areas of the dripline to be buried or can sever the roots. If retaining walls are used, then use a distontionous pier type of foundation (Figure 1)

B. <u>Crushed stane of gravel</u>. If a porous soils is used as fill and the fill is no more than about 19 inches deep, then several layers of 2-5 inch stone can be spread over the original soil surface. Start with a thir layer just beyond the dripline and build to a height of the fill at the base of the tree. This allows air, water and nutrients into the root system (Figure 5).

C. <u>Spoke and Wheel Agration Systems</u>. Agration systems should be designed for each individual tree. They permit all and water to reach the tree's roots. Agration systems are installed at the original grade before any fill is added. A concrete or asphalt surface used in combination with an agration system should be use (Figure 6).

4. <u>Trenching</u>. The digging of utility trenches can result in the destruction of the trees roots. No trenching should be done anywhere within or near the dipline of the tree if trenching must be done, then the utilities should be placed in a conduit which is bored or tunneled through the sol; this reduces the damage to the roots. If utility conduits are not available, then try to place all of the utilities in a single trench. This may require some lobbying with the values utilities companies as it can be difficult to coordinate their vanous trenching specifications and timing needs. When roots are exposed in the tracking process, they should be covered with we burke and kept moist until the soil is returned.

5 <u>Drainage Alterations</u>. Avoid grading designs that result in a tree being in a depression that collects water, especially during the summer season when oaks need dry soli. The soli should drain away from the trunk area.

Roof downapouts and paving near a tree may result in either excessive water close to the trunk during the ramy season, or conversely, preventing water from reaching the root zone. Appropriate measures must therefore be taken.

6. <u>Pavement river the more system</u>. Under certain circumstances, it may be possible to put a hard surface, such as a driveway, over a part of the root system (about 25%). At least 1 alternative designs are possible. Interlocking paving stones may be placed over the soil surface. They allow the roots to breath as well as obtaining water and nutrients. Another possible solution is using pavement, but placing 2-3" stone underneath the pavement, again allowing the tree to breath as well as obtaining water and nutrients. (See dgure 7 & 8).

7. <u>Retaining walls and fences</u>. When installing fences and retaining walls, it is interportant to avoid any trenching or digging if possible. In place of trenching for foundations, the use of concrete pler pllaster foundation, with discontinuous footing, is recommended

 Eertilization. Before watering and mulching, apply a water soluble nitrogen fertilizer on to the soil surface. Approximately 4 pounds per 1000 sq. ft are recommended. Immediately water and spread mulch.

9. <u>Drought avoidance</u> - irrigation. Soil disturbance during the summer months, and especially during periods of drought, can severely impact oak trees. Prior to invading the root zone, it will be becessary to water that part of the root zone that will remain. The top 3 d, of the root zone should be thoroughly wetted. This will not only help a generally

Page 5 Draft 4/21/98

successed tree, but it will also begin to assist the tree in growing needed roots that will be needed to compensate the roots that will be lost. A soaker hose should be placed about 4 ft, away from the trunk to the outer area of

the root zone that is to be protected. Irrigate overnight or for about 8-10 hours. Water slowly to avoid runoff. If runoff occurs early on, turn the water off for several hours, following by watering again.

10 Drought avoidance ... mulching. Prior to soil disturbance, mulch the area - to a depth of 4-6 inches - that will be protected. Along with irrigation, as mentioned above, mulching the root zone area will insulate the tree from water toss and encourage new

10. Rept pruning. When trenching or a grade change is made in the root zone. It is important that the root, but be ripped or that braided temains of roots left dangling. Roots that are 1° or more in diameter should be preserved. Far better, the roots should be cleanly proped back to 1/2 inches of the soil line. When trenching is done with a patchaod, then it is best to have an arborist on the site to prune the roots as they are encountered.

13. <u>Protection of exposed root zone</u>. The embankment of the cut root zone should be moistened and covered to retard water loss. Layers of burlap, moistened on a regular basis, should be placed on the cut banks. 13. <u>Line removal</u>. Should trees be removed, they should be taken down by a professional, and the stumps remove with a router. The use of a backhoe is not eccempted on the cut banks to down by a

recommended, as that rends to disturb the root system.

Page 6 Draft 4/21/98

Appendix II. Landscaping Techniques

Tree Maintenance

1. <u>irrigation</u> Most Galifornia doks are adapted to cool moist winters and hot, dry summers. They prefet well-drained soils. A similar environment should be maintained in developed locations. In addition to following the above procedures, it is necessary to adhere to certain practices. Do not water in the summer months, especially near the base of the tree. If water is done during the summer months, infrequent watering is preferred to frequent watering. Excessive and/or frequent watering encourages the growth of life-threating root fungi.

2. <u>Gardening Techniques Beneath Oaks</u>. As native oaks do not tolerate summer watering, it is important to select ornamental plants that are tolerant of summer drought conditions. Many native plants are well suited in developed oak landscapes and are not only attractive but require low maintenance.

Placing mulch in the root zone of oaks is beneficial. It adds humus, improves acration and fertility, and prevents excessive evaporation. Leaf litter of wood chips should be used as mulching. The source of the chips should be monitored. Do not use redwood chips as they contain certain undesirable chemical. Do not use chips that might contain seeds of weed trees and shrubs.

Do not plant within 6 to 10 feet of the trank. Do not use plants that require supplemental water once established. Choose drought tolerant plants and itrigate with a dop-system for nor more than two summers.

Page 7 Draft 4/21/98

Appendix III.

Oak Tree Regeneration Techniques

Direct Seeding of Oak Acoms

Oaks are readily established by direct seeding of acorns. Methods of collection and preparation of acorns includes the following:

- Valley oak acords should be collected locally either on site or within a several inde radius.
- Acoms are "ripe" when the cap can be separated from the seed.
- Acoms should preferably be collected directly from the treet those lying on the ground are usually dried out, diseased, or infected by insects.
- Collect the acorns by using a long pole to "beat" the branches, causing the acorns to fall onto a tarp beneath the tree.
- Reep only the healthiest and largest acoms. Shriveled or discussed acoms should be thrown out. Place the anoths into a container of water to further weed out unhealthy ones which float to the top.
- The acorns should then he stored in a controlled environment to maintain their viability. Place acorns in np-lock polyethylene bags (that breathe) with a moist medium such as a 0.1 perfite and vermiculite mixture, and store in a refrigerator at approximately 35 degrees Pahrenheit
- · Plant the acorns from early fall (after sufficient rains) to early spring.
- At planung time, place 2-3 acorns per hole, burving them at depths from 1-3 inches.
- Protect the accents with a planting sleeve that is buried 3-5 inches beneath the soft surface for protection from codents.

Containarized Seedling Materials

Nursery Conditions/Health Requirements

Seedlings raised from locally collected materials shall be contract grown at a hursery experienced in cultivating native plants. Plants can be grown in various sized containers, but containers that accentuate long root growth should be used. Several grownonly in restoration practice include: $0.5 \times 2.5 \times 5$, inch treebands; 9-inch dee-pots; and 4 x 4 x 14 inch treebands. Smaller sized containers are less expensive, and are more readily available over a shorter time interval after ordering. A disadvantage of small-sized materials is that young plants can be tragile and more difficult to establish (and therefore note expensive in the establishment phase). An advantage of larger sized plant materials is that young hands more hardy in the establishment phase (thereby requiring less caret, but plants will not fair well if rootbound.

The plants shall be grown under similar climatic conditions to those in the locality of the project site. Plant material shall be grown for at least 6 months, but no

Page 8 Draft 4(31/98

more than two years, in the containers or which they are delivered before planting in the around.

Plants must show vigorous growth and health characteristics. Vigor, health, and root development is more important than height and spread. Plants should be fee of insects and disease, disfiguring knots, sun-sait injuries, abrasions of the bark, or other objectionable defects.

Roots should be well distributed through the enore soil ball be fully developed without restriction. No trees shall be used that are rootbound. Roots shall not be bent. curled, twisted, or deformed as a result of the growing process.

Delivery

The plants shall be handled and mansported in a manner that will prevent damage to the branches, roots, scape or furthe development. In open vehicles, the plants should be covered with a tarp. The root mass shall be kept moist at all times. Delivery inspection shall be made after previously inspected trees have been

delivered to the lob site. A dated notice of approval shall be these be issued. If any of the plants are unacceptable, then the Contractor will notify the nutsery or party responsible for delivery, in writing, why the plants are unacceptable.

Protection and Handling.

Plants that have been delivered to the job site may need protection from drying conditions, e.g., watered in the event that they are not planted immediately. Plants that are dry or willed shall not be planted.

Seedling Planting Methods

- The procedure for the plancing of seedling container material is as follows: Clear a 3 foot square area of weeds, herbaceous ground cover, and other materials to reduce competition from weeds for water and nurrients.
- For sloping terraces, dig a 12-18 inch wide terrace that slopes back slightly into the hillside. No terrace is needed on level ground.
- Excavate a planting hole approximately 1.5-2 times the height and 2-4 times width of the root hall (smaller hole sizes are permitted when the soil is loose; conversely, larger hole sizes are recommended in hard soils). For 9-inch dec pots, this will be approximately 12-18 inches deep and 10-12 inches across. Roughen the sides of the planting hole.
- Place a 1/2 punce of slow release tertilizer in the pottom of the hole and mix with native soil used to back fill the bottom of hole. Tamp and fill until the depth of the hole is 0.5 inches less than the root ball depth.
- Remove the plant from the container without breaking the root ball. Scarify or roughen the sides and loosen the bottom of the root ball if the plant is rootbound.
- Place the plant in the hole, hold plant in place, and back fill with native soil. Be sure to tensive large: tooks, weeds and other debris from the soil min. Plant should be
- installed so that the root crown is 172 inch above the soil of the root ball to allow for settling. Tap soll in planting hole to remove air pockets. Add water to planting hole to allow for settling of the soil.
- Construct a 3-inch high berm for a temporary irrigation basin (depending upon the type of permanent irrigation, a larger basin may be constructed at this time)
- Place a 3-4 inch thick layer of mulch in the 3 foot square planting area (but do not bury

foot crown) Place 3 (-4) foot square landscape fabric around plant, covering the mulch area.

Page 9 Draft 4/21/98

Pour 2-3 gallons of water into the planting basin. These shelters shall be placed over the plant, inserting the lower surface of the tube 0.5-2 inches into the soil surface (inserting the tubes into moist soil is easier). The tree shelter shall therefore be sealed at the base with soil to prevent air from entering directly into the shelter from the bottom. The tree shelter stake should be driven into the ground approximately 3-3 inches, and then the tube tied or fastened to the stake with the factor locking ties.

Page 10 Draft 4/21/98

Ì.....

						ger Oak Trees I		
Item No.	TAG #	DIA	SPP.	STRUCT	HEALTH	0/A	CROWN N/E S/W	COMMENTS
1	10212	36	L	F	Р	Ρ		
2	10684	57	L	Р	F	F		
3	10237	74	В	P	F	F		PRUNE – SAVE
4	10238	41	B	F	- Р	F		PRUNE SAVE
5	10259	48		F	G	G	35	PRUNE – SAVE 2
6	10258	38		VP	F	VP	35	REMOVE
7	10248	48	В	F	G	G	35	SAVE
8	10246	37	В	Р		P	35	PRUNE – SAVE
9	11513	46	В	Р	Р	Р	30	
10	10257	42	L	Р	Р	P	P	CUT
11	10202	37	L	P	P	P		CUT
12	10239	36	L	P	F	P	40	NO TRIM – SMALL
13	10223	42	L	P	P	 P	<u> </u>	
14	3011	48	60	VP	P	VP	-0-	REMOVE 3
15	3245	38	L I	F	P	P	-0-	VERY DEADWOOD
16	10862	36	 1	F	G	G	30	6' TRIM FINE - SAVE
17	10582	36	8	P	G	P	<u> </u>	PRUNE – KEEP 4
18	10587	36	<u>v</u>	F	G	F	+	SAVE
19	11393	39	<u> </u>	VP	P	P		RIPRAP
20	10451	48	 	VP	F	r VP		REMOVE
21	11377	36	B	F		F		PRUNE – SAVE
22	11373	36	B	F	F	F	<u> </u>	PRUNE – SAVE
23	11370	36	U	P	F	F		PRUNE – SAVE
23	5006	30		VP	P	 	<u> </u>	REMOVE
24	9931	35	L B	<u>Р</u>	F	<u>VP</u>		PRUNE – SAVE
25	10817	38	В	 Р	F	Р	+	SAVE
27	9342	36	B	P	P	 Р	+	PRUNE – SAVE
28	8927	52	B	P P	F		<u> </u>	PRUNE SAVE
29	3928	39	B	VP	 Р	VP	╂────	REMOVE
30	9559	56	B	VP VP	<u>Р</u>	P	╂────	PRUNE – SAVE
31	9495	36	 	F	G	F		PRUNE – SAVE
32	9638	30		G	G	G	· ·	PRUNE – SAVE
33	9615	42	L L	P	 P	P	<u> </u>	GOOD
34	9905	36	L	VP	F	r VP	<u> </u>	UNSAFE
35	9900	36	<u> </u>	VP F	F	F		PRUNE + PHOTO
36	9903	43	B	G	F G		╉─────	ACORNS 10
30	9614	38	B	<u>в</u> Р	G	G F	╂────	PRUNE - SAVE ?
38	9653	37	B	Р F	G	G	┨────	PRUNE – SAVE
39	9590	43	<u>в</u> В	F	P	G	╂────	
40	9601	45 37	B	 Р	Р	<u> </u>	┼────	· · · · · · · · · · · · · · · · · · ·
40	7781	37	<u>в</u> В	F	P F	F	╂────	PRUNE – SAVE
41	7780	36	<u>в</u> В	F F	<u></u> F	F	ł	PRUNE - SAVE
42	8608	30	<u>B</u>	F	F	F	┫────	
43	11350	43		P VP	F	F	┼───	
44	7269	43 39	B B	VP VP	<u>۲</u>		<u> </u>	
45	7269			P VP		VP		
40	7692	40	B		F	F	<u> </u>	PRUNE - SAVE
4/		39	В	P	F	F	<u> </u>	PRUNE + CABLE 15
_	7685	36	B	F	F	F	┨─────	├────
49	5591	36	B	P	P	P	╀────	
50	5549	36	B	VP	VP	VP		HABITAT
51	11329	36	LO	Р	F	P		L

Table 6- 36" In Diameter And Larger Oak Trees Health Rating

	Table 6- 36" In Diameter And Larger Oak Trees Health Rating													
ltem No.	TAG #	DIA	SPP.	STRUCT	HEALTH	0/A	CROWN N/E S/W	COMMENTS						
52	7304	36	VO	F	F	F								
53	11392	40	L	VP	P	Р		PROTECT AND SAVE AS VIEW TREE						
54	9539	52	L	VP	F	VP		REMOVE						
55	11543	39	В	F	F	F		SAVE						
56	11524	36	В	F	F	F		TRIM AND BALANCE						
57	10185	39	В	F	G	G								
58	10182	44	В	F F	F	F								
59	11536	39	L	VP	P	VP								
60	9532	39	В	VP	P	Р								
61	8928	39	В	VP	P	VP		REMOVE						
62	10867	36	L	Р	Р	Р		REMOVE						
63	10124	36	В	F	F	F		PRUNE						
64	10275	39	L	VP	P	VP		REMOVE						
65	11497	38	V0	G	G	G		PROTECT AND TRIM						
66	10267	38	В	F	F	F		TRIM AND SAVE						
67	10222	36	В	Р	G	F		REMOVE FOR SAFETY						
68	10577	37	В	F	G	G		TRIM AND SAVE						
69	11529	38	B	F	G	G		TRIM AND SAVE						
70	11527	36	L	Р	F	P		TRIM AND BALANCE						

				Assessed 3	te surveyed In	ees Less tildii 55	_	ak Trees Health Assessment
Item No.	TAG #	DIA	SPP.	STRUCT	HEALTH	0/A	CROWN N/E	COMMENTS
iteritite.	17.0 #	DIA	JFF.	STRUCT		074	S/W	COMMENTS
1	1023	35	L	Р	F	P		REMOVE 1
2	10251	31	L	P	P	P		
3	10262	32	L	P	Р	P		
4	10266	32	В	Р	P	P		
5	10687	26	В	Р	F	F		
6	10715	29	BL	P	F	P	40	MULTI PRUNE, OK
7	3386	24	В	P	Р	P	30	TOO SMALL
8	3263	23	6	F	P	Р	25	TRIM
9	10270	35	L	Ρ	F	F	30	ткім, ок
10	10271	30	L	Р	F	F	25	TRIM, OK
11	10586	34	В	P	F	F		PRUNE – KEEP
12	10490	32	G	F	F	F		PRUNE – SAVE
13	5007	25	В	P	F	Р		PRUNE – SAVE
14	5010	32	B	F	F	F		PRUNE – SAVE
15	5011	28	В	F	F	F		PRUNE – SAVE
16	9749	29	в	VP	F	Р		PRUNE – SAVE
17	9748	28	В	F	P	F		PRUNE – SAVE
18	9747	30	В	F	F	F		PRUNE – SAVE
19	9746	32	В	F	Р	F		PRUNE – SAVE
20	10824	32	В	Р	Р	Р		OPEN SPACE
21	9341	25	В	F	Ρ	Р		OPEN SPACE
22	8767	16	L	P	Ρ	Р		REMOVE
23	8772	28	L	Р	VP	Р		
24	7958	25	В	F	Р	F		PRUNE – SAVE
25	7957	23	В	Р	F	F		PRUNE – SAVE
26	9550	32	В	F	F	F		PRUNE - SAVE
27	9552	34	В	VP	Р	VP		REMOVE
28	9540	32	L	VP	Р	VP		REMOVE
29	9541	28	L	VP	P	VP		REMOVE
30	9578	32	L	VP	Р	VP		REMOVE
31	9580	30	L	VP	Р	VP		REMOVE
32	9546	30	В	Р	Р	Ρ		PRUNE – SAVE
33	9561	31	В	Р	VP	VP		
34	9560	34	В	G	F	G		PRUNE – SAVE
35	9534	34	L	VP	Р	Р		
36	9538	35	В	G	F	F		PRUNE – SAVE
37	9526	31	В	G	G	G		PRUNE – LIGHT
38	9717	35	В	F	F	F		PRUNE – SAVE
39	9744	29	В	F	F	F		SHALLOW PINE ROOTS,GOOD – KEEP, TRIM
40	9745	30	B ?	G	G	G		PRUNE – SAVE
41	9724	32	В?	G	G	G		PRUNE – SAVE
42	9897	34	В	F	F	F		PIX
43	9901	29	B?	VP	F	VP		
44	9902	28	B	F	P	P		
45	9659	30	L		VP	VP		
46	9656	28	В	F	F	F		
47	9654	34	B	F	G	G		
48	9651	35	B	G	F	F		PRUNE – SAVE
49 50	7782 9606	32	B	F	P	F		
			B	P	F	P		
51 52	9605 9604	30	<u>в</u>	VP VP	F P	P		
52	9603	29	в	4V F	F			
54	9603	32	в	ع	F	F		
55	7783	32	B	۲	F	F		PRUNE
56	7784	30	ĸ	 	F VP	F VP		REMOVE
57	7775	30	B		F F	VP VP		
58	8519	34	в В	VP VP	<u>г</u> Р	VP VP		REMOVE
59	8587	35	B	P	P P	<u>Р</u>		
60	8612	26	B		Р Р	P	-	
61	8669	26 29	B	Р	F	F	-	
62	8679	30	B	P	F F	F		–
63	11347	35	B	P	F	 Р	-	<u> </u>
	11241		ن ا		<u> </u>	r		L

Table 7- Randomly Assessed Site Surveyed Trees Less than 35" In Diameter Oak Trees Health Assessment

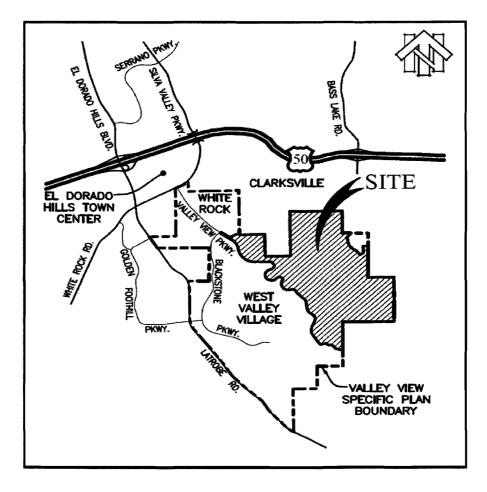
— ——		Table	7- Randomi	y Assessed Si	ite Surveyed Tr	ees Less than 35	5" In Diameter Oak Trees Health Assessment
64	11348	29	В	VP	VP	VP	
65	11341	25	В	F	P	Р	
66	11343	32	В	P	F	Р	
67	8673	29	L	F	F	F	
68	8652	21	L	VP	Р	VP	REMOVE
69	8267	33	В	Р	F	P	
70	10768	28	B	P	F	F	
71	8344 7490	34	В	F	F	F	
72	7490	34 33	B	F F	F	F	PRUNE – SAVE
74	7249	25	В	P P	P	P	
75	7237	16	B	F	F	F	<u> </u>
76	7240	31	B	Р	F	P	<u> </u>
77	7241	24	В	Р	F	P	
78	7377	35	В	Р	Р	Р	
79	10780	29	В	Р	F	F	
80	6085	32	В	VP	F	P	
81	8012	33	В	G	Р	F	PRUNE – SAVE
82	8013	31	В	F	F	F	PRUNE – SAVE
83	5748	25	В		F	F	<u>↓ </u>
84	5541	22	F	P	P	P	<u> </u>
85 86	5579 6131	32	B	F	Р 	VP	<u>↓ </u>
86	6090	27 20	B	VP F	F	F	+
87	5394	20	B		<u>Р</u>	P VP	<u>+ +</u>
89	5387	27	B	P	F	F	
90	5343	29	B	Р	F	F	PRUNE - SAVE
91	5224	29	В	G	G	G	SAVE
92	5395	28	В	F	F	F	SAVE
93	5333	24	В	F	F	F	
94	5207	31	В	VP	P	P	
95	5219	20	<u> </u>	F	P	F	
96	5235	35	В	VP	VP	VP	DEAD
97 98	5149	22	В	G	F	G	
99	5154 5152	28 18	В	<u>VP</u> F	P VP	VP VP	
100	5257	27	B	VP	VP VP	VP VP	
101	8107	21	B		F	F	
102	8153	8, 10, 12	В	P	Р	Р	
103	8083	22	В	Р	P	Р	
104	747	28	В	G	G	G	SAVE
105	8085	22	В	F	P	Р	
106	8093	23	В	Р	Р	Р	
107	5066	27	B	Ρ	P	Р	↓
108	5180	21	B	F	F	F	
109 110	5179 8002	19 22	B 	VP P	VP F		
110	2238	14, 16	в	P F		<u>Р</u> Р	
112	2621	20	<u> </u>	F VP	P	VP	
113	907	28	в	F	P	P	· · · · · · · · · · · · · · · · · · ·
114	921	29	B	VP	VP	VP	<u>+</u>
115	886	25	В	VP	Р	Ρ	
116	2851	22, 16	В	VP	F	F	SAVE
117	2662	26	В	F	F	F	
118	2136	35	В	F	F	F	SAVE
119	6454	32	<u>B</u>	F	P	F	SAVE
120	6970 6971	23, 27	B	F	<u>Р</u>	F	SAVE – ACORNS
121 122	6971 6756	30	B	F	Р	P P	
122	6752	23, 13 33	NO R	F	G	P G	SPLIT @ dbh
125	6741	33	vo	F	G F	G F	SAVE
124	11327	19, 32	LO	r VP	 	F	RIPARIAN
125	6742	27	vo	F	F	F	OPENSPACE
127	7301	31	vo	VP	P	VP	S/B 7301
128	7315	28	80	F	G	G	
							·

	Table 7- Randomly Assessed Site Surveyed Trees Less than 35" In Diameter Oak Trees Health Assessment												
129	11325	14, 8,20, 28	LOP	Р	Р	VP							
130	10446	33	VO	Р	G	Ρ	KEEP						
131	7312	20	Pine	G	G	G	PINE						
132	9193	35	LO	VP	VP	VP	REMOVE						
133	10643	24	BO	F	F	F	MULTI TRUNK – MEASURE LOW						
134	10642	32	BO	F	F	F	MULTI TRUNK - MEASURE LOW						
135	10624	18	BO	G	F	F							
136	10924	24	Pine	F	F	F	RIPARIAN - REMOVE						
137	10967	MTO	_ ۲	VP	VP	VP	UNSAFE, MULTI TRUNK TREE						
138	11544	35	В	G	G	G	SAVE						
139	10778	30	В	G	G	G	SAVE						
140	6287	31	В	F	F	F	KEEP						
141	11302	32	8	VP	Р	VP							
142	11523	34	В	F	F	F							
143	11532	25	Ĺ	F	F	F							
144	9494	30	Ĺ	Р	P	Р							
145	8917	38	Pine	VP	Р	VP	REMOVE						
	This is a Pi	ne Tree											

			Table	8- 36" In Dia	meter And Larg	er Oak Trees To	Be Removed	
							CROWN	
tem No.	TAG #	DIA	SPP.	STRUCT	HEALTH	0/A	N/E S/W	COMMENTS
1	19212	36	W. C. E. MAR	F.C.	2000 P (2004)	e n person	Sector Sector	
2	10684	57	L	Р	F	F		
3	10237	74	В	P	F	F		PRUNE – SAVE
1.25	10238		in British	¢	Sec. Spaces	Services	Contraction of the second	PRUNE-SAVE ***
5	10259	48	L	F	G	G	35	PRUNE – SAVE 2
6	10258	38	E.	УP	F	VP	36	REMOVE
7	10248	48	В	F	G	G	35	SAVE
	10246		8	e e e e e e e e e e e e e e e e e e e		P	35	PROME SAVE
	1.514	46	8	0	В	P	30	
	10267	11.112		/// P	Part Part and	P	P	Cida Marine M
9-1-0-0-0	- 102012			φ	P	P		CUT
	110230 <i>//</i>	36			F	a se para de	40	NG TRIM - SMALL
	10003		1 (1 () () () () () () () () (////.P////	<u></u>	6		A STATE
LA I	3011	48	60	₩ P	P	VP.	0	REMOVED
15	3245	38	L	F	P	Р	-0-	VERY DEADWOOD
16	10862	36	L	F	G	G	30	6' TRIM FINE – SAVE
17	10582	36	В	P	F	Р		PRUNE – KEEP 4
18	10587	36	1111 N 1111	E	G	P"		SAVE
	1.93	39		VP	P.C.	e present		RIPRAP
20	10451	48	В	Ŵ	i i i	VP		REMOVERED
21	11377	36	В	F	F	F		PRUNE – SAVE
22	11373	36	В	F	F	F		PRUNE – SAVE
23	11370	36	L	P	F	F		PRUNE – SAVE
24	5006	39	B	₩.	R	VP.		REMOVE
25	9931	36	L	Р	F	F		PRUNE – SAVE
26	10817	38	8	Р	F	P		SAVE
27	9342	36	В	Р	Р	Р		PRUNE – SAVE
28	8927	52	В	Р	F	Р		PRUNE – SAVE
20	約28	39	. 8	WR.	P	V2.		neway.
30	9559	56	L	VP	F	Р		PRUNE – SAVE
31	9495	36	9	ter and the second	6			HRUMA - SAVE
32	9638	39	L	G	G	G		PRUNE – SAVE
33	9615	42	L	P	Р	Р		GOOD
34	99905	36		VP.	e de la compañía de l			
-35	9900	36	B					PROPER-PROTO
36	9903	43	W?	G	G	6		ACORNS 10
37	9614	38	В	Р	G	F		PRUNE – SAVE
38	9653	37	В	F	G	G		PRUNE – SAVE
39	9590		B	() () () () () () () () () () () () () (P P			
. 40	9601	37	//// 8 /////	/////p/////		P		
41	7781	36	В	F	F	F		PRUNE – SAVE
42	7780	36	В	F	F	F		PRUNE
43	8608	37	В	F	F	F		
44	11350	43	В	VP	F	F		
45	7269	39		₩P.	УP	VP.		
46	7238	40	В	Р	F	F		PRUNE – SAVE
47	7692	39	В	P	F	F		PRUNE + CABLE 15
48	7685	36	В	F	F	F		
49	5891	36	/////B/////		P	P		
50	\$549	36	6		VP	WP		WWWWWSESSESSESSESSESSESSESSESSESSESSESSE
		Cititise and the second se			_	-		
51	11329	36	LO	Р	F	Р		
51						P no closer than 1	00' from proper	l

Item No.	TAG #	DIA	SPP.	STRUCT	HEALTH	0/A	CROWN N/E S/W	COMMENTS
52	7304	36	VO	F	F	F		
53	11392	40	L	VP	Р	Р		SAVE AS VIEW TREE
50	9589	52		¥Φ	P	VP.		REMOVE
55	11543	39	В	F	F	F		SAVE
56	11524	36	В	F	F	F		TRIM AND BALANCE
57 . 58	10165 10182	39 44:	9 8	e F F	G G	<u> </u>		
50 60	9532 9532		2010 (1919) B	1/P 1/P	en Palit	e verse v Verse verse vers		
61	8928	30		ų.	P	WP		(EM/OV/CORPORATION OF STREET ST
62	10867	36		P	P			REMOVE
63	10124	36	В	F	F	F		PRUNE
64	10275	39		τ. γp	P	VP .		HEMOVE STATES STATES
65	11497	38	VO	G	G	G		PROTECT AND TRIM
66	10267	38	В	F	F	F		TRIM AND SAVE
67 68	10172 10547	36 37	g B	P P	G		CARTON CAPACITAL CONTRACTOR OF CAPACITAL CONTRACTOR CONTRA	REMOVEROR SAMELY SUSSESSESSESSESSESSESSESSESSESSESSESSESS
69	11529	38	В	F	G	G	<u>,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,,</u>	TRIM AND SAVE
70	11527	36	L	P	F	P		TRIM AND BALANCE
OTE: Tre			orist's recom t Are Recomn			no closer than 10	00' from proper	ty line

EAST RIDGE DEVELOPMENT AIR QUALITY AND GREENHOUSE GAS ASSESSMENT



PREPARED BY



JULY 2014

EXHIBIT W

15-0660 D 251 of 288

1.0 INTRODUCTION

1.1 1.2	East Ridge Residential Development Location East Ridge Residential Development Description	
2.0 AIR QUALITY		
2.1	Air Quality Assessment	.3
3.0 GREENHOUSE GAS EMISSIONS		
3.1	Greenhouse Gas Emissions	.9
3.2	Greenhouse Gas Emissions Laws and Regulations	.9
3.3	Greenhouse Gas Emissions Assessment	

4.0 REFERENCES

TABLES

Table 2-1 Table 2-2	Construction-Related Criteria Pollutant & Precursor Emissions (Pounds per Day)4 Valley View Specific Plan Operational-Related Emissions at Buildout (Pounds per Day)
Table 2-3	Operations-Related Criteria Pollutant & Precursor Emissions (Pounds per Day)6
Table 3-1	Estimated Greenhouse Gas Emissions under BAU Operations (Metric Tons per Year)
Table 3-2	GHG Reductions from Appication of Valley View Specific Plan Mitigation & Recent Regulations
Table 3-3	Summary of GHG Reduction

APPENDICES

Appendix A: CalEEMod Output Files – Criteria Air Pollutants Appendix B: CalEEMod Output Files – Greenhouse Gas Emissions

15-0660 D 253 of 288

This report documents the results of both an air quality and greenhouse gas (GHG) assessment completed for the East Ridge residential development, a \pm 735-acre, 701-unit single-family residential development containing \pm 186 acres of open space and \pm 18 acres of parkland, proposed to be located within the El Dorado Hills Valley View Specific Plan area of the El Dorado Hills community.

VALLEY VIEW SPECIFIC PLAN EIR

The El Dorado Hills Valley View Specific Plan EIR was certified by the Board of Supervisors on December 8, 1998 (Specific Plan EIR). The Specific Plan EIR evaluated development on all the properties within the 2,037-acre planning area, and included specific mitigation measures to address both site-specific and cumulative effects of development. The Specific Plan establishes detailed land use and residential density standards, design standards for residential and commercial development, a circulation plan and environmental protection standards for oak woodland and wetlands. The Specific Plan EIR identifies significance thresholds for all project impacts and includes a comprehensive set of mitigation measures to reduce the potential effects of development on air quality, among other issues. Proposed mitigation measures were found to reduce the effects of buildout under the Specific Plan to a less than significant level for all air quality-related issues with the exception of "Regional Air Quality Effects" and "Cumulative Air Quality Effects." The County Board of Supervisors adopted Findings of Fact and a Statement of Overriding Considerations finding the project would have economic, social or other benefits. A Mitigation Monitoring and Reporting Program (MMRP) was prepared and adopted with the Specific Plan. The MMRP is a binding document and would be applicable to the East Ridge residential development.

The specific air pollutant emission reducing measures contained in the Valley View Specific Plan MMRP which the East Ridge residential development is required to implement include the following mitigation measures. An outline of the mitigation measures has been provided below. For the entire summary of each measure refer to the MMRP.

- Valley View Specific Plan EIR Mitigation Measure AQ-1(a); Dustfall Control Measures: Require implementation of dust control measures by project construction contractors during all phases of construction.
- Valley View Specific Plan EIR Mitigation Measure AQ-1(b); Exhaust Emissions: Require that heavy-duty construction equipment meet 1997 emission standards for this type of vehicle.
- Valley View Specific Plan EIR Mitigation Measure AQ-1(c); Dustfall Control Measures: Require that development conform to all El Dorado County Air Quality Management District (EDCAQMD) Best Available Fugitive Dust Control Measures and Best Available Fugitive Dust Control Measures for High Wind Conditions as described in Appendix C-1 of the EDCAQMD Guide to Air Quality Assessment (2002).
- Valley View Specific Plan EIR Mitigation Measure AQ-1(d): All architectural coating activities associated construction of the proposed project shall be required to use interior and exterior coatings that contain less than 100 grams of volatile organic compounds (VOC) per liter of coating.
- Valley View Specific Plan EIR Mitigation Measure AQ-2: Require the applicant to incorporate feasible land use, energy, and transportation measures into the project. these measures can include:

- Development of a bikeway and pedestrian trail system along major roadways to connect residences to the Village Center and existing commercial centers and a park-and-ride lot north of the site.
- Require the installation of secure bicycle parking facilities at project schools, commercial areas, and parks.
- Require that residential garages have electrical service that would allow installation of electric car recharge outlets at a later date.
- Wire each housing unit to allow use of emerging electronic communication technology.
- o Do not allow wood-burning open-hearth fireplaces.
- Require outdoor outlets at residences to allow use of electrical lawn and landscape maintenance equipment.
- Valley View Specific Plan EIR Mitigation Measure AQ-3: Only natural gas fueled fireplaces are permitted.
- Valley View Specific Plan EIR Mitigation Measure AQ-4; Odor and Land Use Compatibility: In order to reduce land use compatibility impacts between the project and the treatment plant, require the applicant to provide a 300-foot-wide open space, buffer and proper noticing of potential future project occupants from the existing wastewater treatment plant.

1.1 EAST RIDGE RESIDENTIAL DEVELOPMENT LOCATION

The East Ridge development site is located in an area known as the East Ridge Village portion of the Valley View Specific Plan area, within the El Dorado Hills community in unincorporated El Dorado County. The development area is located approximately 0.5 mile south of US Highway 50 and 0.3 mile east of the existing El Dorado Hills Wastewater Treatment Plant and El Dorado Hills Specific Plan area. To the south and east of the site are rural residential uses and open space.

1.2 EAST RIDGE RESIDENTIAL DEVELOPMENT DESCRIPTION

The East Ridge development would span \pm 735 acres containing \pm 528 acres of residential land uses, \pm 186 acres of open space, and \pm 18 acres of developed parkland. This land use mix is consistent with the Valley View Specific Plan. Access to the residential neighborhood will occur via White Rock Road to Valley View Parkway and from the Latrobe Road to Blackstone Parkway.

2.1 AIR QUALITY ASSESSMENT

The resultant air pollutant emissions of the East Ridge residential development were calculated by PMC using the California Emissions Estimator Model (CalEEMod), version 2013.2.2, computer program (see **Appendix A**). CalEEMod is a statewide land use emissions computer model designed to provide a uniform platform for the use of government agencies, land use planners, and environmental professionals. This model is the most current emissions model approved for use in California by various other air districts.

CONSTRUCTION EMISSIONS

Construction-generated emissions are temporary and short term but have the potential to represent a significant air quality impact. The construction activities result in the temporary generation of emissions resulting from site grading and excavation, paving, and motor vehicle exhaust associated with construction equipment and worker trips, as well as the movement of construction equipment, especially on unpaved surfaces. Emissions of airborne PM are largely dependent on the amount of ground disturbance associated with site preparation activities.

The EDCAQMD has adopted guidelines for determining potential adverse impacts to air quality in the region. The EDCAQMD guidelines state that construction activities are considered a potentially significant adverse impact if such activities generate total emissions in excess of EDCAQMD established thresholds. According to the *Guide to Air Quality Assessment* (EDCAQMD 2002, Chapter 4, p. 3), if identified ROG and NO_x emissions are under the construction emissions threshold of 82 pounds generated per day and thus considered less than significant, then emissions of CO and PM₁₀ would also be considered less than significant.

The previous analysis prepared in the Valley View Specific Plan EIR found that construction activities associated with the development of the Specific Plan area would contribute to regional pollutants, such as ROG, NOx, and PM10, to a level that is less than significant with the implementation of several mitigation measures that reduce the Specific Plan's construction impact. These measures (listed above) include the requirement to implement dust control measures by all construction contractors building in the Specific Plan area as well as the requirement that all heavy-duty construction equipment meet emissions standards that result in the reduction of NOx emissions. As previously stated a MMRP was prepared and adopted with the Specific Plan and the MMRP is a binding document and would be applicable to the East Ridge residential development. Therefore, the construction of the East Ridge residential development would be required to implement appropriate dust control measures and meet emissions standards for all heavy-duty construction equipment. Furthermore, the East Ridge development consists of a land use mix that is consistent with the Valley View Specific Plan and no Specific Plan amendment is required. Therefore the East Ridge residential development would not result in an increase in the severity of construction-related air quality impacts, and there is not a new or substantially more severe significant impact compared with the significance determination contained in the Specific Plan EIR.

In addition, **Table 2-1** illustrates the specific construction-related criteria and precursor emissions that would result from construction of the East Ridge residential neighborhood and as demonstrated in **Table 2-1**, construction of the East Ridge development would not result in the exceedance of EDCAQMD thresholds for daily air pollutant emissions during construction activities.

2.0 AIR QUALITY

Construction Activities	Reactive Organic Gases (ROG)	Nitrogen Oxide (NOx)	Carbon Monoxide (CO)	Sulfur Dioxide (SO2)	Coarse Particulate Matter (PM10)	Fine Particulate Matter (PM2.5)
nanninger – <u>annar asking d</u> unnar ser <i>angen kunne</i> r (södd	Summe	er Emissions –	Pounds per [Day		an an a talayan an a
Year One	6.40	69.60	47.70	0.06	11.03	7.04
Year Two	30.11	61.10	100.81	0.17	10.22	4.63
Year Three	28.48	55.23	96.00	0.17	9.85	4.28
Year Four	27.46	49.54	92.21	0.17	9.56	4.02
Year Five	26.70	44.09	88.87	0.17	9.29	3.76
Year Six	24.47	39.23	85.52	0.17	9.02	3.51
Year Seven	24.85	36.05	82.61	0.17	9.02	3.51
Year Eight	24.30	34.20	80.64	0.17	8.71	3.22
Year Nine	23.60	32.04	78.35	0.17	8.57	3.08
Year Ten	23.24	31.86	76.63	0.17	8.57	3.08
Year Eleven	22.91	31.74	75.17	0.17	8.57	3.08
Year Twelve	22.67	31.63	74.17	0.17	8.57	3.09
Year Thirteen	22.30	31.52	73.13	0.17	8.58	3.09
Year Fourteen	22.40	25.18	73.46	0.18	8.08	2.66
Year Fifteen	22.17	25.11	72.83	0.18	8.08	2.66
Year Sixteen	21.96	25.05	72.27	0.18	8.08	2.66
	Winte	r Emissions –	Pounds per D	lay	·	
Year One	6.45	69.61	47.63	0.06	11.03	7.04
Year Two	32.49	63.00	115.44	0.16	10.22	4.64
Year Three	30.71	57.00	110.25	0.16	9.85	4.29
Year Four	29.60	51.10	106.12	0.16	9.56	4.02
Year Five	28.78	45.47	102.24	0.16	9.30	3.77
Year Six	27.42	40.51	97.50	0.16	9.03	3.51
Year Seven	26.73	37.23	93.36	0.16	8.84	3.34
Year Eight	26.13	35.33	91.06	0.16	8.71	3.22
Year Nine	25.34	33.12	87.71	0.16	8.57	3.08
Year Ten	24.90	32.92	85.03	0.16	8.57	3.08
Year Eleven	24.50	32.77	82.76	0.16	8.57	3.09
Year Twelve	24.23	32.63	81.67	0.16	8.57	3.09
Year Thirteen	23.81	32.49	80.58	0.16	8.58	3.09

TABLE 2-1 CONSTRUCTION-RELATED CRITERIA POLLUTANT AND PRECURSOR EMISSIONS (POUNDS PER DAY)

East Ridge Project Air Quality & Greenhouse Gas Assessment PMC July 2014

Construction Activities	Reactive Organic Gases (ROG)	Nitrogen Oxide (NOx)	Carbon Monoxide (CO)	Sulfur Dioxide (SO2)	Coarse Particulate Matter (PM10)	Fine Particulate Matter (PM25)
Year Fourteen	23.88	26.13	80.73	0.17	8.06	2.66
Year Fifteen	23.62	26.04	80.14	0.17	8.08	2.66
Year Sixteen	23.37	25.96	79.61	0.17	8.09	2.66
EDCAQMD Potentially Significant Impact Threshold	82 pounds/day	82 pounds/day	_	-	-	-
Exceed EDCAQMD Threshold?	No	No	-	-	-	_

Source: CalEEMod version 2013.2.2. See Appendix A for emission model outputs.

Notes: Building construction, paving, and painting assumed to occur simultaneously. Emissions projections account for Valley View Specific Plan EIR mitigation measure AQ-1(a).

OPERATIONAL EMISSIONS

The analysis under the Specific Plan EIR estimates operational air pollutant emissions associated with buildout of the entire 2,037-acre Specific Plan area. According to the Specific Plan EIR, buildout of the Specific Plan would result in 287.20 pounds per day of ROG, 386.30 pounds per day of NO_X, and 1,171.50 pounds per day of PM₁₀, as shown in **Table 2-2**.

TABLE 2-2 VALLEY VIEW SPECIFIC PLAN OPERATIONAL-RELATED EMISSIONS AT BUILDOUT (POUNDS PER DAY)

Operations	Reactive Organic Gases (ROG)	Nitrogen Oxide (NOx)	Coarse Particulate Matter (PM10)
Valley View Specific Plan Buildout	287.20	386.30	1,171.50

Source: EDC 1998a, p. IV.I-12

The analysis under the Specific Plan EIR found that the long-term increase of criteria air pollutants resulting from implementation of the Valley View Specific Plan would be a significant and unavoidable impact. This was concluded despite implementation of air quality mitigation requiring the development of a bikeway and pedestrian trail system along the major roadways of the Specific Plan area, the installation of secure bicycle parking facilities and electric car recharge outlets, the prohibition of wood-burning fireplaces, and other measures (Specific Plan EIR mitigation measure AQ-2). As stated previously, the East Ridge development would be subject to the MMRP adopted for the Specific Plan EIR, including mitigation measures AQ-2 and AQ-3 (listed above), in order to reduce long-term air quality impacts.

Projected daily emissions from operations of the East Ridge residential development are summarized in **Table 2-3**. As shown, emissions resulting from operations of the East Ridge residential development would not exceed the maximum projected operation-source emissions for the Valley View Specific Plan as identified in the Specific Plan EIR (287.20 lbs/day of ROG, 386.30 lbs/day of NO_X, and 1,171.50 lbs/day of PM₁₀).

Operational Activities	Reactive Organic Gases (ROG)	Nitrogen Oxide (NOx)	Carbon Monoxide (CO)	Sulfur Dioxide (SO ₂)	Coarse Particulate Matter (PM10)	Fine Particulate Matter (PM2.5)
Summer Emissions – Pound	s per Day (Maxi	mum)	<u></u>			e constantina and and and and and and and and and a
Proposed Project	138.07	51.92	309.20	0.57	40.32	12.21
Winter Emissions – Pounds	per Day (Maxin	num)				
Proposed Project	146.97	58.46	311.84	0.52	40.32	12.22
EDCAQMD Potentially Significant Impact Threshold	82 pounds/day	82 pounds/day	-	-	_	-
Exceed EDCAQMD Threshold?	Yes	No	No	No	No	No

TABLE 2-3
OPERATIONS-RELATED CRITERIA POLLUTANT AND PRECURSOR EMISSIONS
(POUNDS PER DAY)

Source: CalEEMod version 2013.2.2. See Appendix A for emission model outputs.

Notes: Emissions projections account for Valley View Specific Plan EIR mitigation measure AQ-2.

As shown in **Table 2-3**, the East Ridge development operational emissions would exceed EDCAQMD significance thresholds for operational air pollutant emissions. However, the East Ridge development consists of a land use mix that is consistent with the Valley View Specific Plan. In addition, emissions resulting from operations of the East Ridge residential development would not exceed the maximum projected operation-source emissions for the entire Valley View Specific Plan as identified in the Specific Plan EIR. Therefore, since the East Ridge development is consistent with the land uses analyzed under the Specific Plan EIR, air quality pollutants associated with the East Ridge development would be the same as analyzed in the Specific Plan EIR and there would not be an increase in the severity of operational-related air quality impacts. There would not be a new or substantially more severe significant impact compared with the significance determination contained in the Specific Plan EIR.

AIR TOXICS

Sensitive land uses are generally defined as locations where people reside or where the presence of air emissions could adversely affect the use of the land. Typical sensitive receptors include residents, schoolchildren, hospital patients, and the elderly. Residential land uses currently exist in the vicinity of the development site. Construction activities would involve the use of a variety of gasoline- or diesel-powered equipment that emits exhaust fumes. Surrounding residents would potentially be exposed to nuisance dust and heavy equipment emission odors (e.g., diesel exhaust) during construction. However, the duration of exposure would be short and exhaust from construction equipment dissipates rapidly.

As previously stated, the Valley View Specific Plan area includes 2,037 acres predominately planned for residential, school, park, and commercial land uses. Such land uses do not generally emit toxic pollutants as a byproduct. In addition, any uses of toxic substances that could involve an air release would be subject to regulatory control under the permitting authority of the EDCAQMD. The Specific Plan EIR identified woodsmoke from fireplaces and woodstoves as a potential source of concentrated pollutants and imposed mitigation measures AQ-2 and AQ-3 (listed above), which prohibit fireplaces and woodstoves, in order to reduce this potential

impact to a level that is less than significant. As stated previously, the East Ridge development would be subject to the mitigation measures adopted under the Specific Plan EIR, including mitigation measures AQ-2 and AQ-3.

CARBON MONOXIDE HOTSPOTS

Typically, substantial pollutant concentrations of CO are associated with mobile sources (e.g., vehicle idling time). Localized concentrations of CO are associated with congested roadways or signalized intersections operating at poor levels of service (LOS E or lower). High concentrations of CO may negatively affect local sensitive receptors (e.g., residents, schoolchildren, or hospital patients). The Specific Plan EIR found that the operations of the entire Specific Plan would contribute to concentrations of CO to a level that is less than significant. The East Ridge development consists of a land use mix that is consistent with the Valley View Specific Plan. Therefore the East Ridge residential development would not result in an increase in the severity of CO-related impacts, and there is not a new or substantially more severe significant impact compared with the significance determination contained in the Specific Plan EIR.

ODORS

Residential developments are not considered to be an emission source that would result in objectionable odors. Future construction activities could result in odorous emissions from diesel exhaust associated with construction equipment. However, because of the temporary nature of these emissions and the highly diffusive properties of diesel exhaust, exposure of sensitive receptors to these emissions would be limited. In addition, the EDCAQMD has adopted a nuisance rule that addresses the exposure of nuisance discharges such as unpleasant odors. Rule 205 states that no person shall discharge from any source whatsoever such quantities of odors or other material which cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public.

The previous analysis prepared in the Valley View Specific Plan EIR found that future residents of the Specific Plan area could be exposed to odors from the El Dorado Irrigation District Wastewater Treatment Plant, yet such a potential impact would be mitigated to a less than significant level with the implementation of mitigation measure AQ-4, which requires a minimum 300-foot buffer between any residential units in the Specific Plan area and the wastewater treatment plant. As previously stated, a MMRP was prepared and adopted with the Specific Plan and the MMRP is a binding document and would be applicable to the East Ridge residential development. As previously stated, the East Ridge residential development is located 0.3 mile east of the existing El Dorado Hills Wastewater Treatment Plant, which is equal to 1,584 feet and therefore complies with Valley View Specific Plan EIR mitigation measure AQ-4 (described above).

CUMULATIVE AIR QUALITY AND AIR QUALITY PLAN CONCURRENCE

The analysis under the Specific Plan EIR found that the cumulative increase of criteria air pollutants resulting from implementation of the Valley View Specific Plan would be a significant and unavoidable impact. As shown in **Table 2-3**, emissions resulting from operations of the East Ridge residential development would not exceed the maximum projected operation-source emissions for the entire Valley View Specific Plan as identified in the Specific Plan EIR. Furthermore, the East Ridge development consists of a land use mix that is consistent with the Valley View Specific Plan. Therefore the East Ridge residential development would not result in an increase in the severity of cumulative air quality impacts, and there is not a new or substantially more severe significant impact compared with the significance determination

contained in the Specific Plan EIR. Furthermore, since the East Ridge development is consistent with the land uses analyzed under the Specific Plan EIR, it would not conflict with implementation of the applicable EDCAQMD air quality plans.

CONCLUSION

The El Dorado Hills Valley View Specific Plan EIR evaluated development on all the properties within the 2,037-acre planning area at the program level, and included specific mitigation measures to address both site-specific and cumulative effects of development. The Specific Plan establishes detailed land use and residential density standards, design standards for residential and commercial development, a circulation plan and environmental protection standards for oak woodland and wetlands. The Specific Plan EIR identifies significance thresholds for all project impacts and includes a comprehensive set of mitigation measures to reduce the potential effects of development on air quality, among other issues. A MMRP was prepared and adopted with the Specific Plan. The MMRP is a binding document and would be applicable to the East Ridge residential development.

The East Ridge development consists of a land use mix that is consistent with the Valley View Specific Plan and no Specific Plan amendment is required. Therefore, since the East Ridge development is consistent with the land uses analyzed under the Specific Plan EIR, air quality pollutants associated with the East Ridge development would be the same as analyzed in the Specific Plan EIR and there would not be an increase in the severity of air quality impacts. There would not be a new or substantially more severe significant impact compared with the significance determination contained in the Specific Plan EIR.

3.1 GREENHOUSE GAS EMISSIONS

Since the early 1990s, scientific consensus holds that the world's population is releasing GHGs faster than the earth's natural systems can absorb them. These gases are released as byproducts of fossil fuel combustion, waste disposal, energy use, land use changes, and other human activities. This release of gases, such as carbon dioxide (CO₂), methane (CH₄), and nitrous oxide (N₂O), creates a blanket around the earth that allows light to pass through but traps heat at the surface, preventing its escape into space. While this is a naturally occurring process known as "the greenhouse effect," human activities have accelerated the generation of GHGs beyond natural levels. The overabundance of GHGs in the atmosphere has led to a warming of the earth and has the potential to severely impact the earth's climate system.

While often used interchangeably, there is a difference between the terms "climate change" and "global warming." According to the National Academy of Sciences, climate change refers to any significant, measurable change of climate lasting for an extended period of time that can be caused by both natural factors and human activities. Global warming, on the other hand, is an average increase in the temperature of the atmosphere caused by increased GHG emissions. The use of the term "climate change" is becoming more prevalent because it encompasses all changes to the climate, not just temperature.

To fully understand global climate change, it is important to recognize the naturally occurring greenhouse effect and to define the GHGs that contribute to this phenomenon. Various gases in the earth's atmosphere, classified as atmospheric GHGs, play a critical role in determining the earth's surface temperature. Solar radiation enters the earth's atmosphere from space and a portion of the radiation is absorbed by the earth's surface. The earth emits this radiation back toward space, but the properties of the radiation change from high-frequency solar radiation, are effective in absorbing infrared radiation. As a result, this radiation that otherwise would have escaped back into space is now retained, resulting in a warming of the atmosphere. This phenomenon is known as the greenhouse effect. Among the prominent GHGs associated with land use development that are contributing to the greenhouse effect are CO₂, CH₄, and N₂O.

Each GHG differs in its ability to absorb heat in the atmosphere based on the lifetime, or persistence, of the gas molecule in the atmosphere. For instance, methane traps over 21 times more heat per molecule than CO₂, and N₂O absorbs 310 times more heat per molecule than CO₂. Often, estimates of GHG emissions are presented in carbon dioxide equivalents (CO₂e), which weighs each gas by its global warming potential (GWP). Expressing GHG emissions in CO₂e takes the contribution of all GHG emissions to the greenhouse effect and converts them to a single unit equivalent to the effect that would occur if only CO₂ were being emitted.

3.2 GREENHOUSE GAS EMISSIONS LAWS AND REGULATIONS

California has adopted various administrative initiatives and also enacted a variety of legislation relating to climate change, much of which sets aggressive goals for GHG emissions reductions within the state. The most important initiative is the California Global Warming Solutions Act of 2006 (AB 32) (Health and Safety Code Sections 38500, 38501, 28510, 38530, 38550, 38560, 38561–38565, 38570, 38571, 38574, 38580, 38590, 38592–38599), which was signed into law in September 2006 after considerable study and expert testimony before the legislature. The law instructs the California Air Resources Board (CARB) to develop and enforce regulations for the reporting and verifying of statewide GHG emissions. The act directed CARB to set a GHG emission limit based on 1990 levels, to be achieved by 2020. The adoption of AB 32 provided a clear mandate that

climate change should be included in the environmental review process for development proposals.

3.3 GREENHOUSE GAS EMISSIONS ASSESSMENT

GHG emissions associated with the East Ridge development would occur over the short term from construction activities, consisting primarily of emissions from equipment exhaust. There would also be long-term regional emissions associated with new vehicular trips, stationary source emissions such as natural gas used for heating, and indirect source emissions such as electricity usage for lighting. Preliminary guidance from the Office of Planning and Research (OPR) and letters from the Attorney General critical of CEQA documents that have taken different approaches indicate that lead agencies should calculate, or estimate, emissions from vehicular traffic, energy consumption, water conveyance and treatment, waste generation, and construction activities. The calculation presented below includes construction and long-term operational emissions in terms of annual CO₂e.

Addressing GHG generation impacts requires an agency to make a determination as to what constitutes a significant impact. The amendments to the CEQA Guidelines specifically allow lead agencies to determine thresholds of significance that illustrate the extent of an impact and are a basis from which to apply mitigation measures. This means that each agency is left to determine if a development's GHG emissions will have a "significant" impact on the environment. The guidelines direct that agencies are to use "careful judgment" and "make a good-faith effort, based to the extent possible on scientific and factual data, to describe, calculate or estimate" the development's GHG emissions (14 CCR Section 15064.4[a]).

In its Final Statement of Reasons for Regulatory Action accompanying the CEQA Amendments (FSOR), the California Natural Resources Agency (CNRA) (2009) explains that quantification of GHG emissions "is reasonably necessary to ensure an adequate analysis of GHG emissions using available data and tools" and that "quantification will, in many cases, assist in the determination of significance." However, as explained in the FSOR, the revised Section 15064.4(b) assigns lead agencies the discretion to determine the methodology to quantify GHG emissions. The FSOR also notes that CEQA case law has long stated that "there is no iron-clad definition of 'significance.' Accordingly, lead agencies must use their best efforts to investigate and disclose all that they reasonably can concerning a project's potential adverse impacts."

Determining a threshold of significance for climate change impacts poses a special difficulty for lead agencies. Much of the science in this area is new and is evolving constantly. At the same time, neither the State nor local agencies is specialized in this area, and there are currently no local, regional, or State thresholds for determining whether a residential development has a significant impact on climate change. The CEQA Amendments do not prescribe specific significance thresholds but instead leave considerable discretion to lead agencies to develop appropriate thresholds to apply to development projects within their jurisdiction.

As noted earlier, AB 32 is a legal mandate requiring that statewide GHG emissions be reduced to 1990 levels by 2020. In adopting AB 32, the legislature determined the necessary GHG reductions for the State to make in order to sufficiently offset its contribution to the cumulative climate change problem to reach 1990 levels. AB 32 is the only legally mandated requirement for the reduction of GHGs. As such, compliance with AB 32 is the adopted basis on which the agency can base its significance threshold for evaluating GHG impacts.

Therefore, the East Ridge development is compared to the emissions reductions goals of AB 32. As previously stated, on December 11, 2008, CARB adopted the Scoping Plan to achieve the

goals of AB 32, which determined that achieving the 1990 emission level would require a reduction of GHG emissions of approximately 29 percent below what would otherwise occur in 2020 in the absence of new laws and regulations (referred to as "business as usual" or BAU).¹ However, in August 2012 CARB released revised estimates of the expected 2020 emissions reductions which were updated to account for the economic downturn since 2008 as well as reduction measures already approved and put in place. This reduced the projected 2020 emissions and thereby revised the BAU reduction necessary to achieve AB 32's goal of reaching 1990 levels by 2020 to 21.7 percent. (CARB also provided a lower 2020 inventory forecast which took credit for certain State-led GHG emission reduction measures already in place. When this lower forecast is considered, the necessary reduction from BAU needed to achieve the goals of AB 32 is approximately 16 percent.)

For the purposes of this assessment, the East Ridge residential development is compared to the achievement of at least a 21.7 percent reduction in GHG emissions as compared to BAU in order to provide a conservative assessment. In order to ascertain the achievement of a 21.7 percent reduction compared to BAU, quantification of development-specific GHG emissions is required. Developments demonstrated to have reduced or mitigated its GHG emissions by at least 21.7 percent compared to BAU, consistent with GHG emissions reduction targets established in the CARB AB 32 Scoping Plan, would be determined to have a less than significant individual and cumulative effect on global climate change. To be conservative, total construction-generated GHG emissions were amortized over the estimated life of the residential development and included with operational emissions for comparison to the significance thresholds. A life of 50 years was assumed for the East Ridge residential development.

The resultant GHG emissions of the East Ridge residential development were calculated using the California Emissions Estimator Model (CalEEMod), version 2013.2, computer program (see **Appendix B**). CalEEMod is a statewide land use emissions computer model designed to provide a uniform platform for the use of government agencies, land use planners, and environmental professionals. This model was developed in coordination with the South Coast Air Quality Management District (SCAQMD) and is the most current emissions model approved for use in California by various other air districts, including EDCAQMD.

GREENHOUSE GAS EMISSION GENERATION

GHG emissions associated with the East Ridge residential development would occur over the short term from construction activities, consisting primarily of emissions from equipment exhaust. There would also be long-term regional emissions associated with new vehicular trips and indirect source emissions, such as electricity usage for lighting. As shown in **Table 3-1**, the East Ridge residential development could produce 12,150 metric tons of CO₂e annually under BAU conditions, primarily from motor vehicles that travel to and from the site. For purposes of this assessment, the total emissions of 12,150 metric tons of CO₂e per year are considered the BAU figure.

¹ Business as usual (BAU) is the project's projected GHG emissions level in 2020 under the assumption that consumption patterns and efficiencies are maintained at their 2005 levels. Under a BAU scenario, state, regional, and project-level efforts to reduce GHG emissions are not taken into consideration; rather, the BAU assumes the Year 2005 status quo.

Emissions Source,	Carbon Dioxide (CO2)	Methane (CH4)	Nitrous Oxide (N2O)	.CO2e
	East Ridge Develop	oment – BAU		
Construction Amortized over 50 Years	556	0	0	556
Area Source (landscaping, hearth)	1,036	1	0.1	1,068
Energy	1,794	0.1	0	1,803
Mobile	8,325	1	0	8,342
Waste	102	6	0	229
Water	109	1	0	152
Total	11,922	9.1	0.1	12,150

 Table 3-1

 Estimated Greenhouse Gas Emissions under BAU Operations (Metric Tons per Year)

Source: CalEEMod version 2013.2.2. See Appendix B for emission model outputs.

Notes:

BAU emissions projections account for development-generated emissions <u>without</u> any greenhouse gas reduction measures; i.e., emissions presented are not adjusted for future improved CAFÉ standards (Pavley I) and Low Carbon Fuel Standards, or the 2011 Renewables Portfolio Standard. The Pacific Gas & Electric Year 2005 emissions factor of 489 pounds of CO₂ per megawatt of energy generated (PG&E 2014) was used to account for energy-related BAU GHG emissions. Traffic generation (6,323 average daily trips) is derived from the traffic operations analysis prepared for the project.

There are several State-led GHG emissions-reducing regulations have recently taken effect, and changes to regulations will continue to take effect in the near future that will substantially reduce GHG emissions. For instance, implementation of Assembly Bill 1493 (the Pavley Standard) (Health and Safety Code Sections 42823 and 43018.5) will significantly reduce the amount of GHGs emitted from passenger vehicles. The Pavley Standard is aimed to reduce GHG emissions from noncommercial passenger vehicles and light-duty trucks of model years 2009–2016 by requiring increased fuel efficiency standards of automobile manufacturers. The program combines the control of smog, soot, and GHG emissions with requirements for greater numbers of zero-emission vehicles. By 2025, when the rules will be fully implemented, new automobiles will emit 34 percent fewer global warming gases and 75 percent fewer smog-forming emissions. As passenger vehicles represent the single largest source of GHGs associated with the East Ridge residential development, the anticipated reduction associated with State-led GHG emissions-reducing regulations represents 1,984 fewer metric tons per year of GHGs attributed to the East Ridge development (see **Table 3-2**).

The electricity provider for El Dorado Hills, Pacific Gas and Electric (PG&E), is subject to California's Renewables Portfolio Standard (RPS). The RPS requires investor-owned utilities, electric service providers, and community choice aggregators to increase procurement from eligible renewable energy resources to 33 percent of total procurement by 2020, which will have the effect of reducing GHG emissions generated during energy production. For example, from 2005 to 2012, PG&E increased its purchase of renewable source-generated electricity to levels that currently account for just over half of its total power mix (PG&E 2014). Largely due to this strategy, PG&E's reduction of its CO₂ emission intensity factor between BAU and the development of the East Ridge residential neighborhood would result in 110 fewer metric tons per year of GHGs (9 fewer metric tons per year attributed to water conveyance) as shown in **Table 3-2**.

Table 3-2

GHG Reductions from Application of Valley View Specific Plan Mitigation and Recent Regulations

Reduction Source	CO2e Emissions Reductions (metric tons/year)
Valley View Specific Plan EIR mitigation measure AQ-2 (prohibition of wood-burning hearths)	-559
Construction Equipment Efficiencies from Engine Modernization	-72
State-Led GHG Reducing Regulations	
AB 1493 (Pavley) and Low Carbon Fuel Standard ¹	-1,984
2011 Renewables Portfolio Standard ²	-110
Total	-2,725

Notes:

¹ Emissions reductions from AB 1493 and Low Carbon Fuel Standard are derived from the difference between 2005 automobile emissions factors and 2020 automobile emissions factors contained in CalEEMod version 2013.2.

 2 Emissions reductions from the RPS are derived from the difference between PG&E's BAU CO₂ emission intensity factor of 489 pounds of CO₂ per megawatt of energy generated (PG&E 2014) and PG&E's most current (2012) CO₂ emission intensity factor of 445 pounds of CO₂ per megawatt of energy generated (PG&E 2014).

Data output is included as Appendix B.

As previously stated a MMRP was prepared and adopted with the Specific Plan and the MMRP is a binding document and would be applicable to the East Ridge residential development. Therefore, the East Ridge residential development would be required to implement Specific Plan EIR mitigation measure AQ-2. Implementation of Valley View Specific Plan EIR mitigation measure AQ-2 in conjunction with State-led GHG reduction measures such as Pavley, the Low Carbon Fuel Standard, and the State RPS would reduce project GHG emissions by 22.4 percent compared with BAU, which is beyond the 21.7 percent reduction threshold. **Table 3-3** provides a summary of project GHG reductions attributable to state regulations enacted subsequent to CARB determining the 21.7 percent reduction needed to achieve compliance with AB 32.

Table 3-3 Summary of GHG Reductions

Emissions Reduction Summary	CO ₂ Emissions (Metric Tons/Year)
Total Business-as-Usual (BAU) Emissions	12,150
State-Led Regulatory Reduction	-2,094
Valley View Specific Plan EIR mitigation measure AQ-2	-559
Construction Equipment Efficiencies from Engine Modernization	-72
Project Emissions After Reductions	9,425
Percentage Reduction from Business as Usual	22.4
Percentage Reduction Threshold for Less than Significant Determination	21.7

The GHG emissions from implementation of the East Ridge residential development are projected to result in 9,425 metric tons of CO₂e per year (**Table 3-3**). As projected, BAU emissions would be reduced by 22.4 percent from BAU, which is greater than the 21.7 percent threshold, so the development is considered consistent with the State of California's ability to meet its GHG reduction goals.

3.0 GREENHOUSE GAS EMISSIONS

GREENHOUSE GAS REDUCTION PLAN

California has adopted several policies and regulations for the purpose of reducing GHG emissions. AB 32 was enacted in 2006 to reduce statewide GHG emissions to 1990 levels by 2020. As identified under Issue a) above, the East Ridge development would reduce GHG emissions from the BAU condition by 22.4 percent, which is greater than the 21.7 percent reduction goal contained in AB 32. Therefore, the project complies with the requirements of AB 32. As the East Ridge residential development would not conflict with either AB 32.

CONCLUSION

The East Ridge residential development BAU emissions would be reduced by 22.4 percent from BAU due to the required implementation of Valley View Specific Plan EIR mitigation measure AQ-2 in conjunction with State-led GHG reduction measures such as the Pavley Standard, the Low Carbon Fuel Standard, and the State RPS. Valley View Specific Plan EIR mitigation measure AQ-2 prohibits the installation of wood-burning fireplaces in the residential units of the East Ridge development. The State-led GHG reduction measures are measures adopted and implemented by the State in order to achieve the State's GHG reduction targets. The development would not conflict with the State goals listed in AB 32 or in any preceding State policies adopted to reduce GHG emissions.

REFERENCES

CNRA (California Natural Resources Agency). 2009. Final Statement of Reasons for Regulatory Action, Amendments to the State CEQA Guidelines Addressing Analysis and Mitigation of Greenhouse Gas Emissions Pursuant to SB 97. http://ceres.ca.gov/ceqa/docs /Final_Statement_of_Reasons.pdf.

EDC (El Dorado County). 1998a. Valley View Specific Plan ElR. June 30, 1998.

——. 1998b. Valley View Specific Plan. 1998.

- EDCAQMD (El Dorado County Air Quality Management District). 2002. Guide to Air Quality Assessment.
- PG&E (Pacific Gas and Electric). 2014. Website: New Numbers Confirm PG&E's Energy Among the Cleanest in Nation. (Accessed June 23, 2014). http://www.pgecurrents.com/2014/02/06/new-numbers-confirm-pge%E2%80%99senergy-among-the-cleanest-in-nation/

Environmental Noise Assessment

East Ridge at Valley View Residential Development

El Dorado County, California BAC Job #2014-057

Prepared For:

Westland Capital Partners, LP

Mr. William B. Bunce 3907 Park Drive, Suite 235 El Dorado Hills, CA 95762

Prepared By:

Bollard Acoustical Consultants, Inc.

au

Paul Bollard, President

April 17, 2015



3551 Bankhead Road > Loomis, CA 95650 > Phone: (916) 663-0500 > Fax: (916) 663-0501 > BACNOISE.COM

EXHIBIT X

Introduction

The East Ridge at Valley View Residential Development (Project) site is located in western El Dorado County, California, approximately 1.5 miles south of US Highway 50, east of Latrobe Road. This noise analysis was prepared to evaluate the potential noise impacts upon future residential uses developed within the project site pursuant to El Dorado County noise standards. Specifically, this analysis has been prepared to assess the following noise sources:

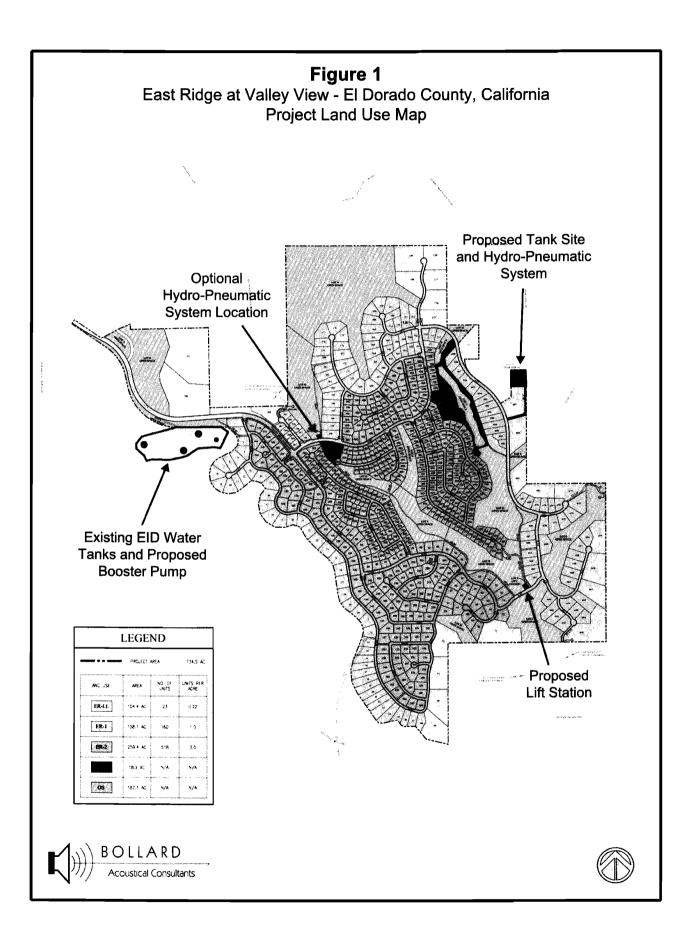
- Traffic on Valley View Parkway and East Ridge Collector roads.
- The existing water tanks & booster pumps located adjacent to (west of) the project site.
- A proposed new booster pump system at the existing water tank area.
- A new water tank (with hydro-pneumatic system), near the northeastern site boundary.
- A proposed lift station.

Bollard Acoustical Consultants, Inc. (BAC) was retained by the project developer to complete this study. Figure 1 shows the project site plan, the location of the El Dorado Irrigation District (EID) water tanks, proposed water tank location, optional hydro-pneumatic system location, and proposed lift station.

Noise Fundamentals and Terminology

Noise is often described as unwanted sound. Sound is defined as any pressure variation in air that the human ear can detect. If the pressure variations occur frequently enough (at least 20 times per second), they can be heard, and thus are called sound. Measuring sound directly in terms of pressure would require a very large and awkward range of numbers. To avoid this, the decibel scale was devised. The decibel scale allows a million-fold increase in pressure to be expressed as 120 dB. Another useful aspect of the decibel scale is that changes in levels (dB) correspond closely to human perception of relative loudness. Appendix A contains definitions of Acoustical Terminology. Table 1 shows common noise levels associated with various sources.

The perceived loudness of sounds is dependent upon many factors, including sound pressure level and frequency content. However, within the usual range of environmental noise levels, perception of loudness is relatively predictable, and can be approximated by weighing the frequency response of a sound level meter by means of the standardized A-weighing network. There is a strong correlation between A-weighted sound levels (expressed as dBA) and community response to noise. For this reason, the A-weighted sound level has become the standard tool of environmental noise assessment. All noise levels reported in this section are in terms of A-weighted levels in decibels.



Community noise is commonly described in terms of the "ambient" noise level, which is defined as the all-encompassing noise level associated with a given noise environment. A common statistical tool to measure the ambient noise level is the average, or equivalent, sound level (L_{eq}) over a given time period (usually one hour). The L_{eq} is the foundation of the Day-Night Average Level noise descriptor, L_{dn} , and shows very good correlation with community response to noise.

The Day-Night Average Level (L_{dn}) is based upon the average noise level over a 24-hour day, with a +10 decibel weighing applied to noise occurring during nighttime (10:00 p.m. to 7:00 a.m.) hours. The nighttime penalty is based upon the assumption that people react to nighttime noise exposures as though they were twice as loud as daytime exposures. Because L_{dn} represents a 24-hour average, it tends to disguise short-term variations in the noise environment. L_{dn} -based noise standards are commonly used to assess noise impacts associated with traffic, railroad and aircraft noise sources.

Table 1 Typical A-Weighted Sound Levels of Common Noise Sources					
Loudness Ratio	dBA	Description			
128	130	Threshold of pain			
64	120	Jet aircraft take-off at 100 feet			
32	110	Riveting machine at operators position			
16	100	Shotgun at 200 feet			
8	90	Bulldozer at 50 feet			
4	80	Diesel locomotive at 300 feet			
2	70	Commercial jet aircraft interior during flight			
1	60	Normal conversation speech at 5-10 feet			
1/2	50	Open office background level			
1/4	40	Background level within a residence			
1/8	30	Soft whisper at 2 feet			
1/16	20	Interior of recording studio			

Criteria for Acceptable Noise Exposure

El Dorado County Noise Standards

The Noise Element of the El Dorado County General Plan contains policies to ensure that County residents are not subjected to noise beyond acceptable levels.

Policy 6.5.1.1 of the County Noise Element requires an acoustical analysis for new residential developments located in potentially noise-impacted areas.

Policy 6.5.1.3 of the County Noise Element states that where noise mitigation measures are required to achieve the County's exterior noise standards, the emphasis of such measures shall be placed upon site planning and project design. The use of noise barriers shall be considered a means of achieving the noise standards only after all other practical design-related noise mitigation measures have been integrated into the project and the noise barriers are not incompatible with the surroundings.

Policy 6.5.1.8 of the County Noise Element establishes 45 and 60 dB L_{dn} as being acceptable interior and exterior noise levels, respectively, for new residential uses affected by transportation noise sources. Where it is not possible to reduce noise in outdoor activity areas to 60 dB L_{dn} or less using a practical application of the best available noise reduction measures, an exterior noise level of up to 65 dB L_{dn} may be allowed provided that available exterior noise reduction measures have been implemented and interior noise levels are in compliance with the 45 dB L_{dn} standard.

Policy 6.5.1.7 of the County Noise Element provides performance standards for residential uses affected by non-transportation noise sources such as the EID water tanks and lift station operations. Those standards are provided below in Table 2 [Table 6-2 of the General Plan].

Table 2 Exterior Noise Level Performance Standards Non-Transportation (Stationary) Noise Sources Affecting Residential Uses					
Noise Level Descriptor	Daytime 7 a.m 7 p.m.	Evening 7 p.m 10 p.m.	Night 10 p.m 7 a.m.		
Hourly L _{eq} , dB	55	50	45		
Maximum level, dB	70	60	55		

Valley View Specific Plan 2013 Update Noise Mitigation Measures

The environmental mitigation measures shown below have been incorporated into the Valley View Specific Plan 2013 Update in order to mitigate identified environmental impacts. The Mitigation Measures which are related to noise are reproduced below. Following each mitigation measure is a brief discussion as to the applicability of the mitigation measure to the East Ridge at Valley View Development.

N-1: Noise attenuation such as earth berms or combination earth berm/wall shall be installed at the time of development of project residential structures within the affected Latrobe Road frontage area (i.e., within the projected 60 dBA L_{dn} contour) and shall be designed according to the recommendations of an acoustical engineer, subject to the approval of the County. Special noise abatement measures and specifications in the architectural design of single- and multi-family residential structures shall also be implemented within

the affected frontage area. Single- and multi-family housing shall incorporate noise abatement measures as necessary to achieve an interior noise level of 45 dBA L_{dn} or less. Multi-family housing, which is subject to the requirement of Title 24, Part 2, of the State Building Code, shall be reviewed and an Acoustical Report submitted to the County prior to issuance of a building permit.

Because the East Ridge project is not located adjacent to Latrobe Road, this mitigation measure is not directly applicable to this project. However, because MM N-1 is referenced in MM N-2, it is indirectly applicable.

N-2: Implement measures recommended under *Mitigation Measure N-1* above. Roadside noise barriers, i.e., either a berm soundwall, or combination berm/wall of approximately 6-foot height, would be effective along affected major collectors. The specific height, length, and location of such barriers would depend upon the final internal traffic distribution, individual tentative map, site plans, and grading plans.

Pursuant to this mitigation measure, this report includes an analysis of noise generated by the major collectors located within the East Ridge Development. As determined by this analysis, which is presented later in this report, future traffic noise levels generated by the collectors affecting the East Ridge Residential Development are not predicted to exceed the County's exterior noise standards. As a result, the construction of berms or noise barriers adjacent to internal roadways located within the East Ridge Development would not be required.

N-3 Incorporate a 300-foot buffer on the project site adjacent to the wastewater treatment plant where residential land uses are proposed. Prior to development of this area, require an Acoustical Study to analyze collector road traffic noise impacts, and an assessment of noise from the wastewater treatment plant. The Acoustical Study shall recommend measures to ensure that the County's Noise Level Performance Standards are met. It is anticipated that the 300-foot buffer will be sufficient to mitigate noise impacts from the wastewater treatment plant on adjacent residential development, subject to confirmation by the Acoustical Study. The possibility of additional specific equipment noise control improvements funded by the project shall also be evaluated and implemented, if necessary.

> Pursuant to this mitigation measure, this report includes an analysis of collector road traffic noise impacts. As determined by this analysis, which is presented later in this report, future traffic noise levels generated by the collectors affecting the East Ridge Residential Development are not predicted to exceed the County's exterior noise standards. As a result, no additional noise mitigation measures relative to collector road traffic were determined to be necessary.

This analysis also evaluated potential noise impacts associated with the water treatment plant and water storage tank operations to the west of the East Ridge Development. Because the wastewater treatment plant is located over 2,800 feet from the nearest proposed residences within the East Ridge Development, noise from that facility was both inaudible from the project site during BAC field inspections. As a result, it was concluded that the East Ridge Development is not adversely affected by noise generated at the wastewater treatment plant.

Noise generated by operations of the water tanks located immediately adjacent to the East Ridge Development Area was also evaluated as part of this study, and found to be well within compliance with El Dorado County noise standards. As a result, no additional noise mitigation measures were determined to be required for the water tank operations, as presented later in this report.

N-4 Incorporate traffic noise mitigation measures such as earthen berms, soundwalls or combination berm/walls and setback restrictions as part of the overall program of roadway widening improvements already planned along White Rock Road to accommodate anticipated cumulative traffic increases. Incorporate fair-share funding for these noise mitigation components into the overall White Rock Road improvement program (see Mitigation Measure T-14). This traffic noise mitigation measure shall be designed to comply with the maximum allowable noise exposure standards set forth in Table 6-1 of the EI Dorado County General Plan (i.e., an L_{dn}, of 60 dB in outdoor activity areas at residential receptors).

The White Rock Road Widening (2-4 Lanes) – Monte Verde Drive to US 50 / Silva Valley Parkway Interchange (Project #72374) includes noise mitigation measures as described above. East Ridge is included in the TIM fee program therefore, its fair share is the payment of TIM fees at the time of building permit issuance. No additional mitigation of White Rock Road traffic noise levels would be required of the East Ridge Development.

- N-5: For all construction within the specific plan area, implement the following measures pertaining to construction scheduling, public notification, and equipment maintenance and use:
 - (a) Construction Scheduling. Limit noise-generating construction activities near sensitive land uses to the hours of 7:00 AM to 7:00 PM, Monday through Saturday. Prohibit construction on Sundays.
 - (b) Construction Equipment. Properly muffle and maintain all construction equipment powered by internal combustion engines.
 - (c) Idling Prohibitions. Prohibit unnecessary idling of internal combustion engines near sensitive receptors.

- (d) Equipment Location. Locate all stationary noise-generating construction equipment, such as air compressors and portable power generators, as far as practical from noise-sensitive land-uses.
- (e) Quiet Equipment Coordinator. Select quiet construction equipment whenever possible.
- (f) Noise Disturbance Coordinator. Designate a project Noise Disturbance Coordinator (such as a County staff person or a superintendent already working at the construction site) responsible for responding to local complaints regarding construction noise. Include the name and the phone number of the disturbance coordinator on the construction schedule notification mailed to nearby residents. Post a related sign at the main entry points to the portion(s) of the project under construction.

This mitigation will be implemented during project construction.

N-6 Implement Mitigation Measure N-4

Because the East Ridge Development will be required to contribute its fair-share funding for the White Rock Road mitigation components, Mitigation Measure N-4 is being complied with, and no additional mitigation of White Rock Road traffic noise levels would be required of the East Ridge Development.

N-7 All second floor windows of the residences adjacent to Latrobe Road from which Latrobe Road is visible shall be upgraded to an STC rating from 30 to 33, as determined by the Acoustical Consultant. The Acoustical Consultant shall determine the appropriate rating for the widows and provide verification to Planning Services prior to issuance of a Building Permit.

> Although residences constructed within the East Ridge Development will not be located adjacent to Latrobe Road, this analysis evaluated interior noise levels within residences generated by the major collector roadways located within the East Ridge Development. That analysis concluded that, due to the low projected future traffic volumes on those collector roadways, the County's interior noise level standard would be achieved without the need for upgraded window assemblies.

N8: Mechanical Ventilation (air conditioning) shall be provided for all residences in this development to allow the occupants to close doors and windows as desired to achieve compliance with the applicable interior noise level criteria.

The East Ridge developer is proposing to include air conditioning in all residences. As a result, this mitigation measure has been satisfied.

Evaluation of Future Traffic Noise Levels

Traffic Noise Prediction Methodology

The Federal Highway Administration Highway Traffic Noise Prediction Model (FHWA-RD-77-108) was used to predict traffic noise levels at the project site. The model is based upon the CALVENO noise emission factors for automobiles, medium trucks and heavy trucks, with consideration given to vehicle volume, speed, roadway configuration, distance to the receiver, and the acoustical characteristics of the site. The FHWA Model was developed to predict hourly L_{eq} values for free flowing traffic conditions, and is considered to be accurate within 1.5 dB in most situations.

Predicted Future Exterior Traffic Noise Levels at the Project Site

The FHWA Model was used with future traffic data to predict future traffic noise levels at the proposed noise outdoor activity areas of the East Ridge at Valley View Residential Development. Future average daily traffic was obtained from the project engineer. The FHWA Model inputs and predicted future traffic noise levels at the project site are shown in Appendix B. The predicted future traffic noise levels and contours are summarized in Table 3.

Table 3 Predicted Future Traffic Noise Levels and Contour Distances ¹ East Ridge at Valley View Residential Development – El Dorado County, California						
		Distance From		Distance to L _{dn} Noise Contour (feet) ³		
Roadway	Description	Roadway Centerline (feet)	L _{dn} (dB)	70 dB	65 dB	60 dB
Valley View Parkway	OAA ²	100	58	16	35	75
East Ridge Collector	OAA ²	85	57	11	25	53

Notes:

1. A complete listing of FHWA Model inputs and results are provided in Appendix B.

2. OAA = Outdoor Activity Area.

3. Distance to future traffic noise contours are measured from the centerline of project roadways.

Source: Bollard Acoustical Consultants, Inc. (2014)

The Table 3 data indicate that future traffic noise levels at the proposed outdoor activity areas of the nearest proposed residences to Valley View Parkway and the Eat Ridge Collector are predicted to be 57-58 dB L_{dn}. This range of predicted future traffic noise levels at proposed outdoor activity areas would satisfy the El Dorado County 60 dB L_{dn} exterior noise level standard. Therefore, no traffic noise impacts are identified and no additional noise mitigation would be warranted for exterior traffic noise levels.

Predicted Future Interior Traffic Noise Levels at the Project Site

The worst-case exposure to future traffic noise would occur at the building façades of the residences nearest to Valley View Parkway. As indicated in Table 3, the predicted future L_{dn} at the first-floor facades would be approximately 58 dB. Due to reduced ground absorption of sound at elevated locations, traffic noise levels are expected to be approximately 2 dB higher at second floor facades (60 dB L_{dn}). Given a future worst-case exterior noise level of 60 dB L_{dn} , a building facade noise reduction of 15 dB would be required to achieve an interior noise level of 45 dB L_{dn} .

Standard residential construction (wood siding, STC-27 windows, door weather-stripping, exterior wall insulation, composition plywood roof), results in an exterior to interior noise reduction of at least 25 dB with windows closed and approximately 15 dB with windows open. Therefore, standard construction would be acceptable for both shielded first-floor facades and unshielded second-floor facades provided mechanical ventilation is included in the project design. No additional noise mitigation measures would be warranted for this aspect of the project.

Evaluation of Existing and Proposed Stationary Noise Sources

El Dorado County Wastewater Treatment Plant

The wastewater treatment plant is located approximately 2,800 feet west of the nearest proposed residences within the East Ridge development. During a site inspection conducted by BAC staff on August 7, 2014, it was observed that the wastewater treatment plant was completely inaudible from the East Ridge project area. As a result, this analysis concludes that noise generated by the wastewater treatment plant is within compliance with County noise standards and does not represent an adverse noise impact to residences constructed within the East Ridge Development.

El Dorado County Irrigation District Water Tanks

The location of the existing EID water tanks relative to the project area is illustrated on Figure 1. To generally quantify the noise generation associated with the EID water tanks and associated pumping equipment, a noise survey was conducted at the locations shown on Figure 2 on the afternoon of August 7, 2014. The measurement results, as summarized in Table 4, are assumed to be representative of typical water tank noise generation, and are used for subsequent comparison to the County's hourly noise exposure criteria to determine compatibility.

A Larson Davis Laboratories (LDL) Model 824 precision integrating sound level meter and realtime analyzer was used to complete the noise level measurement survey. The meter was calibrated before use with an LDL Model CA250 acoustical calibrator to ensure the accuracy of the measurements. The equipment used meets all pertinent specifications of the American National Standards Institute for Type 1 sound level meters (ANSI S1.4). The measurement microphone was placed on a tripod approximately 5 feet above the ground.

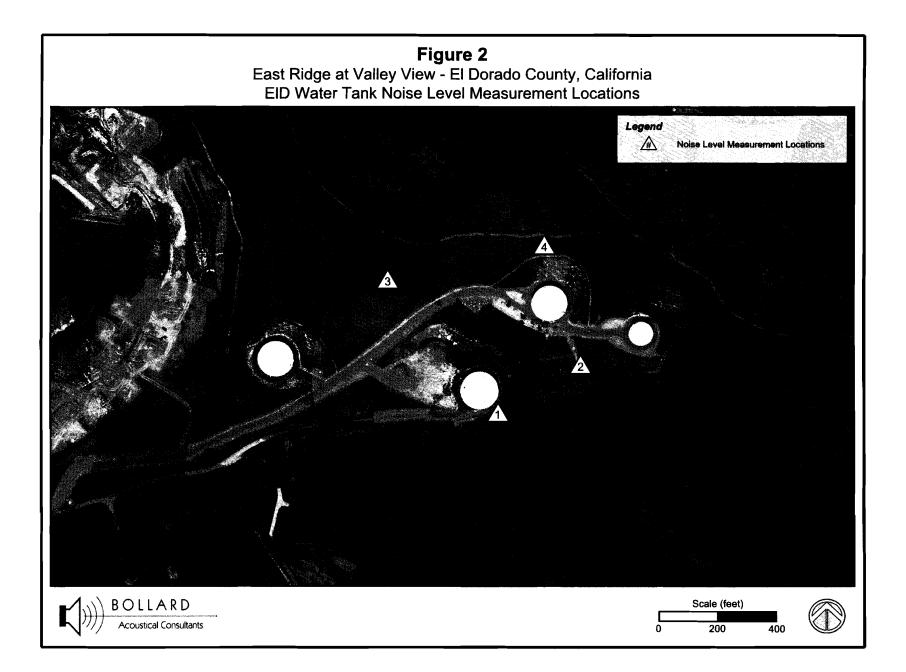


Table 4

Summary of Water Tank Noise Level Measurements – August 7, 2014 East Ridge at Valley View Residential Development – El Dorado County, California

	Measured Sound Level, dB		
Site ¹	Average (L _{eq})	Maximum (L _{max}) ²	
1	40	48	
2	48	69	
3	46	56	
4	48	57	

Notes:

1. Noise level measurement locations are illustrated on Figure 2.

 The measured maximum noise levels were caused by sources of noise other than the water tanks and associated equipment. The noise generation of the water tank area equipment was observed to be below 45 dB.

Source: Bollard Acoustical Consultants, Inc. (2014)

As noted in footnote 2 of Table 4, the maximum noise generation of the water tank area operations was observed to be below 45 dBA a the project site. As shown in Table 4, the noise generation of the EID water tanks are all in compliance with the County's daytime and nighttime noise level standards at the project site. As a result, no noise impacts are identified for the EID water tank operations and no additional noise mitigation measures would be required for this aspect of the project.

Proposed Booster Pump at Existing Water Tank Area

According to the project applicant, a new booster pump would be installed within a pump house at the existing water tank area shown on Figure 1. The purpose of this pump would be to direct water to the proposed water tank to be located within the northeastern area of the project site (see figure 1 for proposed tank location). The new pump equipment would reportedly be similar to equipment currently located within the water tank area shown on Figure 2. As a result, a modest increase in noise levels would result from the operation of the new booster pump, but those noise levels are not anticipated to exceed County noise standards at either existing or proposed residences in the immediate vicinity of the proposed booster pump house.

Proposed El Dorado County Irrigation District Water Tank & Hydro-Pneumatic Pump Equipment

As indicated in Figure 1, the project also includes a new EID water tank and hydro-pneumatic pump equipment in the northeastern quadrant of the project site. To generally quantify the noise generation associated with the proposed water tank, the noise survey data described above for the existing EID tanks was used. Specifically, average noise levels near the existing water tanks were observed to be below 45 dB Leq. Similar noise exposure is expected from the proposed water tank and pumping equipment to be located near the northeast corner of the project provided

the new tank is similarly constructed and operated as the tanks described above. As a result, noise generated by the new tank and pumping equipment is similarly predicted to be satisfactory relative to both daytime and nighttime noise level standards of El Dorado County.

Optional (alternate) Hydro-Pneumatic Pump Equipment Location

The hydro-pneumatic pump equipment associated with the new water tank may, as an alternative to the proposed location near the new tank, be located as indicated in Figure 1. As noted above, the noise generation of this pump equipment is reported to be similar to the noise generation of the existing pump equipment located near the existing water tank area. As a result, noise generated by the hydro-pneumatic pump equipment at the alternate location is similarly predicted to be satisfactory relative to both daytime and nighttime noise level standards of El Dorado County. In the event that the noise emissions of this equipment vary relative to the noise level data reported in Table 4, implementation of additional noise control measures may be required.

Proposed Lift Station

The location of the proposed lift station relative to the project area is illustrated on Figure 1. To predict noise levels associated with the proposed lift station, BAC consulted reference noise level data collected at the Business Park #3 Lift Station, located adjacent to the Carson Creek Unit #2 development. At the time of the noise level measurements, BAC identified the emergency generator as the dominant noise producing component at the lift station facility. The emergency generator was housed in a roofed masonry enclosure with two louvered panels for air intake and air exhaust, and an exit port for engine exhaust, a standard door, and a roll up door. Accordingly, sound pressure level (SPL) measurements of the emergency generator were conducted at each side of the generator enclosure, and the levels were noted as being constant. Pump equipment was operating during the noise level measurements; however, it is located in an underground enclosure and pump noise was not audible over the generator noise. The lift station emergency generator noise level measurement results are summarized in Table 5.

	Table 5 erence Noise Level Measureme t Station – El Dorado County, (
Location	Distance (Feet)	SPL (dB) ²
Northern Facade	20	83
Eastern Facade	20	89
Southern Facade	20	74
Western Facade	20	78

Notes:

1. Noise level measurements conducted on June 14, 2007 as part of the Carson Creek Unit 2 Environment Noise Assessment (BAC Report #2007-026, 1/21/09).

2. Emergency generator was dominant noise source at lift station.

Source: Bollard Acoustical Consultants, Inc. (2014)

As the Table 5 data indicate, the highest noise levels measured were on the eastern facade, which was where the generator exhaust ports were located. No significant change in the overall equipment noise level was measured with the generator under load (i.e., with pump).

Noise during emergency operation of the lift station generator would be exempt under the County's standards. However, noise during routine maintenance and testing of the generator would be required to comply with County noise standards. Therefore, the lift station generator noise levels are predicted to exceed the County's daytime noise level standard at the nearest residences within the East Ridge development. Therefore, noise mitigation for the lift station generator would be required.

In order to ensure that the emergency generator noise levels at the nearest residential property lines do not exceed the County's 55 dB L_{eq} daytime noise level criterion, acoustic upgrades to the emergency generator building would be required. Upgrades to the generator building would be more complicated, and would require the use of acoustically absorptive materials at the interior of the generator building, silencers at both cooling air inlet and exhaust ports, and upgraded doors. Such upgrades require an analysis of specific lift station design plans, which should be undertaken when such plans are available.

Noise Generated During Project Construction

During the construction phases of the project, noise from construction activities would add to the noise environment in the immediate project vicinity. Activities involved in construction would generate maximum noise levels, as indicated in Table 6, ranging from 70 to 90 dB at a distance of 50 feet. This noise increase would be of short duration, and would likely occur primarily during daytime hours.

It should be noted that there are no existing residences or other noise-sensitive land uses in the immediate project vicinity, so construction noise impacts at offsite locations are predicted to insignificant. As residences are constructed within the project development, noise from ongoing construction-related activities will be audible at completed residences, but is not expected to be significant provided construction activities are limited to daytime hours.

The project applicant has stated that a portable aggregate crushing plant may be utilized during project site grading but that it is likely the on-site crushing will be completed prior to any new residences being occupied. Nonetheless, if a portable crushing plant is utilized during project construction, and if that plant remains in operation as new residences become occupied, then it may be necessary to implement practical noise mitigation measures to ensure the County's noise standards are satisfied at the occupied residences. Such measures would include the use of setbacks, limitations on hours of crushing, and construction of temporary barriers around the crushing plant. Additional analysis would be required to identify more specific details pertaining to mitigation.

Table 6 Typical Construction Equipment Noise				
Equipment Description	Maximum Noise Level at 50 feet, dBA			
Auger drill rig	85			
Backhoe	80			
Bar bender	80			
Boring jack power unit	80			
Chain saw	85			
Compactor (ground)	80			
Compressor (air)	80			
Concrete batch plant	83			
Concrete mixer truck	85			
Concrete pump truck	82			
Concrete saw	90			
Crane (mobile or stationary)	85			
Dozer	85			
Dump truck	84			
Excavator	85			
Flatbed truck	84			
Front end loader	80			
Generator (25 kilovoltamperes [kVA] or less)	70			
Generator (more than 25 kVA)	82			
Grader	85			
Hydra break ram	90			
Jackhammer	85			
Mounted impact hammer (hoe ram)	90			
Paver	85			
Pickup truck	55			
Pneumatic tools	85			
Pumps	77			
Rock drill	85			
Scraper	85			
Soil mix drill rig	80			
Tractor	84			
Vacuum street sweeper	80			
Vibratory concrete mixer	80			
Welder/Torch	73			
Source: Federal Highway Administration 2006.				

Conclusions

Traffic noise levels within the East Ridge at Valley View Residential Development project site are expected to satisfy the El Dorado County exterior and interior (60 dB and 45 dB L_{dn}) noise level standards for new residential developments. In addition, the El Dorado Irrigation District water towers are expected to satisfy the El Dorado County non-transportation noise level standards at the nearest proposed residences. However, the proposed lift station has the potential to exceed the County's non-transportation noise level criteria. As a result, the developer is proposing to conduct a review of lift station plans at such time as they are being developed to ensure that appropriate engine cooling air inlet and exhaust silencers, and appropriate engine muffler, are specified.

These conclusions are based on the Valley View Parkway and East Ridge Collector traffic assumptions cited in Appendix B and on noise reduction data for standard residential dwellings. Deviations from the Appendix B data, or the project site plan shown in Figure 1, could cause future traffic noise levels to differ from those predicted in this analysis. In addition, Bollard Acoustical Consultants, Inc. is not responsible for degradation in acoustic performance of the residential construction due to poor construction practices, failure to comply with applicable building code requirements, or for failure to adhere to the minimum building practices cited in this report.

This concludes our environmental noise assessment for the East Ridge at Valley View Residential Development. Please contact BAC at (916) 663-0500 or <u>paulb@bacnoise.com</u> with comments or questions regarding this evaluation.

Appendix A Acoustical Terminology

	Acoustics	The science of sound.
	Ambient Noise	The distinctive acoustical characteristics of a given space consisting of all noise sources audible at that location. In many cases, the term ambient is used to describe an existing or pre-project condition such as the setting in an environmental noise study.
	Attenuation	The reduction of an acoustic signal.
	A-Weighting	A frequency-response adjustment of a sound level meter that conditions the output signal to approximate human response.
	Decibel or dB	Fundamental unit of sound, A Bell is defined as the logarithm of the ratio of the sound pressure squared over the reference pressure squared. A Decibel is one-tenth of a Bell.
	CNEL	Community Noise Equivalent Level. Defined as the 24-hour average noise level with noise occurring during evening hours (7 - 10 p.m.) weighted by a factor of three and nighttime hours weighted by a factor of 10 prior to averaging.
	Frequency	The measure of the rapidity of alterations of a periodic signal, expressed in cycles per second or hertz.
	Ldn	Day/Night Average Sound Level. Similar to CNEL but with no evening weighting.
	Leq	Equivalent or energy-averaged sound level.
	Lmax	The highest root-mean-square (RMS) sound level measured over a given period of time.
	Loudness	A subjective term for the sensation of the magnitude of sound.
	Masking	The amount (or the process) by which the threshold of audibility is for one sound is raised by the presence of another (masking) sound.
	Noise	Unwanted sound.
	Peak Noise	The level corresponding to the highest (not RMS) sound pressure measured over a given period of time. This term is often confused with the Maximum level, which is the highest RMS level.
	RT _®	The time it takes reverberant sound to decay by 60 dB once the source has been removed.
	Sabin	The unit of sound absorption. One square foot of material absorbing 100% of incident sound has an absorption of 1 sabin.
	SEL	A rating, in decibels, of a discrete event, such as an aircraft flyover or train passby, that compresses the total sound energy of the event into a 1-s time period.
	Threshold of Hearing	The lowest sound that can be perceived by the human auditory system, generally considered to be 0 dB for persons with perfect hearing.
	Threshold of Pain	Approximately 120 dB above the threshold of hearing.
Ľ		Dustical Consultants

Project Info	rmation:						
	Job Number:	2014-057					
	Project Name:						
	Roadway Name:	Valley View	Parkway				
raffic Data:							
	Year	Future					
	Average Daily Traffic Volume:	6,700					
	Percent Daytime Traffic:	85					
	Percent Nighttime Traffic:	15					
	Percent Medium Trucks (2 axle):	1					
	Percent Heavy Trucks (3+ axle):	1					
In	Assumed Vehicle Speed (mph): tervening Ground Type (hard/soft):	35 Soft					
	tervening Ground Type (nard/solt).	5011					
raffic Noise	e l'evels						
Fraffic Noise	e Levels:				L _{dn} , (dB	
raffic Noise	e Levels:				L _{dn} , d Medium	dB Heavy	
	e Levels: Description	Distance	Offset (dB)	Autos			Tota
		Distance 100	Offset (dB) 0	Autos 57	Medium	Heavy	<u>Tota</u> 58
<u>-ocation:</u> 1	Description Nearest Backyards	100	· · ·		Medium Trucks	Heavy Trucks	
<u>-ocation:</u> 1	Description Nearest Backyards e Contours (No Calibration Offset	100	· · ·		Medium Trucks	Heavy Trucks	
<u>-ocation:</u> 1	<u>Description</u> Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB	100):	0 ance from Cel	57	Medium Trucks 46	Heavy Trucks	
<u>.ocation:</u> 1	<u>Description</u> Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75	100):	0 ance from Cel 8	57	Medium Trucks 46	Heavy Trucks	
<u>.ocation:</u> 1	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70	100):	0 ance from Cer 8 16	57	Medium Trucks 46	Heavy Trucks	
<u>.ocation:</u> 1	<u>Description</u> Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75	100):	0 ance from Cel 8	57	Medium Trucks 46	Heavy Trucks	
<u>-ocation:</u> 1 Fraffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>-ocation:</u> 1 Fraffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>ocation:</u> 1 Traffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>ocation:</u> 1 Traffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>ocation:</u> 1 Traffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>ocation:</u> 1 Traffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
<u>-ocation:</u> 1 Fraffic Noise	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	
	Description Nearest Backyards e Contours (No Calibration Offset L _{dn} Contour, dB 75 70 65	100):	0 ance from Cel 8 16 35	57	Medium Trucks 46	Heavy Trucks	

Project Informa	ation						
Project informa	Job Number:	2014-057					
	Project Name:		at Valley View				
	Roadway Name:	East Ridge (Collector				
raffic Data:							
	Year:	Future					
	Average Daily Traffic Volume:	4,000					
	Percent Daytime Traffic:	85					
	Percent Nighttime Traffic:	15					
	ercent Medium Trucks (2 axle):	1					
	Percent Heavy Trucks (3+ axle):	1					
	Assumed Vehicle Speed (mph):	35 Soft					
Interv	/ening Ground Type (hard/soft):	Soft					
raffic Noise L	avale:						
	54613.				L _{dn} ,	dB	
					Medium	Heavy	
ocation:	Description	Distance	Offset (dB)	Autos	Trucks	Trucks	Total
1	Nearest Backyards	85	0	55	45	50	57
raffic Noise C	ontours (No Calibration Offset):					
raffic Noise C	L _{dn} Contour, dB		ance from Ce		(ft)		
raffic Noise C	L _{dn} Contour, dB 75		5		<u>(ft)</u>		
raffic Noise C 	L _{dn} Contour, dB				(ft)		
raffic Noise C	L _{dn} Contour, dB 75 70		5 11		(ft)		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>	·	
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>	1	
_	L _{dn} Contour, dB 75 70 65		5 11 25		(ft)		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		
_	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		
raffic Noise C	L _{dn} Contour, dB 75 70 65		5 11 25		<u>(ft)</u>		