#### NEVADA COUNTY, CALIFORNIA PROPOSED MITIGATED NEGATIVE DECLARATION NOTICE OF AVAILABILITY FOR PUBLIC REVIEW

<ul> <li>To: Nevada County Building Department Calif Dept of Fish &amp; Wildlife Nevada County Public Works Dept Central Valley RWQCB Nevada County Surveyor Nevada County Assessor's Office Nevada Co Environmental Health Dept Native American Heritage Commission Agricultural Commissioner BLM North San Juan Fire District United Auburn Indian Community Twin Ridges School District US Fish &amp; Wildlife Service Nevada Joint Union High School Dist San Juan Ridge Taxpayers Assn</li> </ul>		Oak Tree Park & Recreation District Federation of Neighborhoods Northern Sierra Air Quality Mgt. District District 4 Supervisor Nevada County Fire Protection Planner Sierra Nevada Group / Sierra Club California Department of Forestry – Timber Rural Quality Coalition AT&T Tyler Barrington, Principal Planner PG&E Caltrans Highways Washoe Tribe County Counsel US Fish and Wildlife Service State Clearinghouse		
Project Name:	Ananda Village Comprehensive Master Plan			
File No:	Z15-001, MIS16-0009, U15-002, MGT15-004, MGT15-005, MGT17-0004, MI15-005, LLA16-0008, LLA16-0014 & EIS15-003			
Assessor's Parcel Number(s):	61-170-12, -16, -23, -32, -34; 61-180-02, -03; 61-210-04, -19, -20; 61- 230-06, -08; 61-240-02, -33, -34, -35 & -36			
Applicant/Owner:	Attn: Peter Goering, Village Manager Ananda Church of Self-Realization of Nevada County 14618 Tyler Foote Road #174 Nevada City, CA 95959 (530) 478-7639			
Project Location:	14618 Tyler Foote Ci Route 49.	e Crossing Road, approximately 5 miles east of State		

**Project Description:** The project would allow additional residential and non-residential development consistent with the density allowed under the General Plan designation. Entitlements include:

1) **Rezone** (Z15-001) to alter the boundaries of the existing 9-acre Rajarshi Park PD-SP zoning area to fit the existing disturbed area but not alter the PD-SP size, and to rezone a 1.1-acre AG-PD-SP area adjacent to the Village Center to PD-SP.

2) **Development Agreement** (MIS16-0009) proposing an extended development timeline of 15 years with the potential for two 5-year extensions, phasing flexibility, customized sewage disposal inspection fees, and a customized administrative process for development of the residential units. Public benefits include an easement for a Sages Road re-alignment on Ananda property to improve fire safe access for neighbors and construction of a fire engine garage for the North San Juan Fire District.

3) Use Permit for a Comprehensive Master Plan (U15-002) to allow the following, with attendant road and infrastructure improvements:

- (a) Increase the residential cap from 87 units to the General Plan maximum density of 195 units within 8 existing clusters and up to 9 new clusters;
- (b) Add new non-residential uses within the Village Center (1600 sf maintenance building, 1120 sf vehicle repair shop, 1500 sf office building, 864 sf fire engine garage, and 536 sf market kitchen remodel/expansion), Rajarshi Business Park (4800 sf office/warehouse building); Expanding Light Retreat Center (11,000 sf temple, 4300 sf yoga hall and offices, 1000 sf yoga classroom/hall, 1200 sf dormitory lodge, 1500 sf administrative office, 20 guest cabins totaling

8300 sf, 2 shower houses totaling 1000 sf, 4 guest houses totaling 4,800 sf, RV campground totaling 21,700 sf, 2826 sf dining pavilion, and 700 sf memorial area and pergola); and

(c) Allow events which have been ongoing within the Village Center (annual Harvest Festival, a Halloween event, and a Fourth of July celebration), Expanding Light Retreat Center (classes, concerts, lectures, dramatic performances, and Sunday services), amphitheater (concerts, lectures, dramatic performances, and Sunday services), and Crystal Hermitage (weddings, wedding receptions, and tulip garden open house).

4) **Petition for Exceptions** (MI15-005) to the Nevada County Road Standards to allow a 100-foot section of the proposed extension of Village Drive to exceed the 16% standard, up to 18% road grade.

5) Wetland Habitat Management Plan (MGT15-004) for potential impacts to onsite wetlands.

6) Oak Habitat Management Plan (MGT15-005) for potential impacts to the oak woodlands areas. Mitigation areas are proposed to offset the loss of oaks.

7) Steep Slopes Management Plan (MGT17-0004) for impacts to slopes over 30 percent for the construction of an approximately 400-foot section of Brindaban Way to access Cluster M.

8) Lot Line Adjustments (LLA16-0008, LLA16-0014) (two non-concurrent) to reconfigure parcel boundaries to meet applicable building setbacks and site development standards for individual lots.

This Notice of Availability serves as public notice that the County of Nevada has prepared a Mitigated Negative Declaration for the project identified above. As mandated by Public Resources Code § 21091, the minimum public review period for this document is 30 days. The public review period for the proposed project is from March 13 to April 11, 2017. Comments must be received by 5 p.m. on the last day of the comment period, April 11, 2017. Send comments to Jessica Hankins, Senior Planner, at Jessica.Hankins@co.nevada.ca.us, or mail comments to:

Jessica Hankins, Senior Planning Nevada County Planning Department 950 Maidu Avenue, Suite 170 Nevada City, CA 95959

Prior to approval of the project, the Planning Commission will consider comments received on this Initial Study. The Planning Commission will hold a public hearing before it considers certification of the Initial Study and approval of the proposed project.

The Initial Study prepared for this project and the documents used in preparation of this Study can be reviewed online at **www.mynevadacounty.com/nc/cda/planning/Pages/Ananda-Village-CMP.aspx** or at the Nevada County Planning Department, 950 Maidu Ave., Nevada City, California. Pursuant to the State of California Public Resources Code and the "Guidelines for Implementation of the California Environmental Quality Act of 1970," as amended to date, a Draft Mitigated Negative Declaration has been prepared because no substantial evidence exists, as indicated in the attached Initial Study, that the proposed project may have a significant environmental effect.

Prepared by

Jessica Hankins, Senior Planner

3/8/17

# NEVADA COUNTY, CALIFORNIA

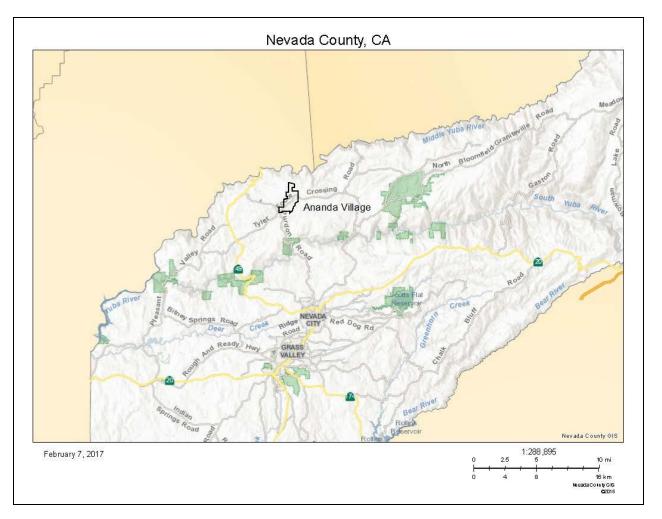
# **REVISED** INITIAL STUDY

To: Nevada County Building Department CA Fish & Wildlife Nevada County Public Works Dept Central Valley RWQCB Nevada County Surveyor Nevada County Assessor's Office Nevada Co Environmental Health De Native American Heritage Commissi Agricultural Commissioner BLM North San Juan Fire District United Auburn Indian Community Twin Ridges School District US Fish & Wildlife Service Nevada Joint Union High School Dis San Juan Ridge Taxpayers Assn		Idlife y Public Works Dept RWQCB y Surveyor y Assessor's Office vironmental Health Dept an Heritage Commission ommissioner h Fire District h Indian Community chool District Idlife Service Jnion High School Dist	Oak Tree Park & Recreation District Federation of Neighborhoods Northern Sierra Air Quality Mgt. District District 4 Supervisor Nevada County Fire Protection Planner Sierra Nevada Group / Sierra Club California Department of Forestry – Timber Rural Quality Coalition AT&T Tyler Barrington, Principal Planner PG&E Caltrans Highways Washoe Tribe County Counsel US Fish and Wildlife Service State Clearinghouse		
Date:		March 10, 2017Revised April 1	4, 2017		
Projec	t Title:	Ananda Village Comprehensive	Ananda Village Comprehensive Master Plan		
		Z15-001, MIS16-0009, U15-002, MGT15-004, MGT15-005, MGT17-0004, MI15-005, LLA16-0008, LLA16-0014 & EIS15-003			
<b>Project location:</b> 14618 Tyler Foote Crossing Road, approximate		ad, approximately 5 miles east of Hwy 49			
Assessor's Parcel Numbers: 61-170-12, -16, -23, -32, -34; 61-180-02, -03; 61-210-04, -19, -20; 61-230-06, -08; 61-240-02, -33, -34, -35 & -36					
Lead Agency: Nevada County		Nevada County			
Prepa	Prepared by:Jessica Hankins, Senior Planner Nevada County Planning Department 950 Maidu Avenue, Suite 170 Nevada City, CA 95959 (530) 265-1254 Jessica.Hankins@co.nevada.ca.us				
Owner	<b>Owner/Applicant:</b> Ananda Church of Self-Realization of Nevada County		tion of Nevada County		
Zoning	oning Districts: Agricultural with Planned Development and Site Performance combining distr (AG-PD-SP) (694 acres); Neighborhood Commercial with PD and SP combin districts (C1-PD-SP) (3 acres); Planned Development with SP combining dist (PD-SP) (9 acres)				
General Plan Designations: Planned Development (PD): Estate (EST) 195 dwelling units (683 acres);					

General Plan Designations: Planned Development (PD): Estate (EST) 195 dwelling units (683 acres); Rural Commercial (RC) (6 acres); Planned Development-Site Performance (PD-SP) (17 acres)

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Site Description and Surrounding Land Uses: The proposed project is located on the 706-acre Ananda Village site on the San Juan Ridge near Cherokee and Badger Hill Diggings, between North San Juan and North Columbia. The site takes access from Tyler Foote Road, a County-maintained road, and is approximately five miles east of State Route 49. The Village contains the following uses: residential; commercial; industrial; institutional, including a school and church; agricultural; open space; and recreational, including a recreation center, campgrounds and cabins, trails, and fields. Ananda Village is a largely self-contained community as well as a service, retail, and social hub for the larger San Juan Ridge community. Public participation in events and activities occurs regularly with a retreat center, concerts, seasonal festivals, tulip garden showings, and other events and activities typically open to the public. The Village Center also has a deli/market, thrift store, jewelry store, and gift shop, open to the public. Adjacent land uses are rural residential and agricultural (non-irrigated pasture) within FR-40 and AG-40 zoning. A small Bureau of Land Management parcel abuts the eastern boundary of the project, and Tahoe National Forest lands abut the northern boundary in the Middle Yuba River canyon. In all areas proposed for development, with the exception of a few areas of infrastructure improvements, slopes are gentle to moderate, and elevation ranges from 1,600 to 2,900 feet. Habitat types include black oak woodlands, grasslands, mixed conifer-hardwood forest, ponderosa pine forest, ponds, seep-fed wetlands, riparian vegetation, and seasonal streams. Figure 1 identifies the project location.



### **Figure 1: Project Location**

**Background:** The Ananda community was first established on the project site in 1967, when County records show that the Ananda community began as an organized camp under the jurisdiction of the California Health Department and State Fire Marshal. In January 1974, the County determined that any further development of the site would fall outside the definition of an organized camp and would require County permits as a planned development. After a period of expansion and intensification of residential development, Ananda Village submitted their first Master Plan in 1976, along with a General Plan Amendment and Rezone (GP76-02, Z76-10A, U76-11). The Master Plan encompassed 585 acres and requested approvals for 180 residents and 150 guests, as well as 4 special events per year. In June 1976, the Oak Tree Fire burned through the community, destroying many of the structures and delaying the Master Plan until its approval in 1978. In the following years, Ananda added several features to the village through a series of amended Use Permits, including a temple, kitchen, dining hall, additional residential clusters, a meditation retreat, staff housing, and school facilities. In 1982 Ananda prepared an Environmental Impact Report for a proposed incorporation of their community, which LAFCo subsequently denied.

In 1990 the Master Plan was comprehensively updated to increase the Planned Development acreage to 620 acres, consolidate previous permits, establish residential unit densities rather than population densities (1 unit/5.51 acres), and include a square-footage cap in the commercial and industrial zones. Ananda Village currently operates as a Planned Development under this approved Comprehensive Master Plan (CMP) Use Permit (U89-059).

One year later in 1991, with the onset of the Nevada County General Plan update process, Ananda requested and was subsequently approved for a density increase to 195 units on 655 acres (1 unit/3.35 acres), 3 acres of commercial, and 20 acres of industrial. However, the CMP was not simultaneously updated, and the previous CMP approval of 87 single-family dwelling units remained in place. In 2009 a General Plan Amendment and Rezone were approved for Ananda Village which established a PD base designation and consistent zoning for the site, as well as minor changes to the amounts of commercial and industrial uses. As established by those approvals, the current allowable General Plan density is 195 units on 683 acres (1 unit/3.5 acres). The current proposal was submitted in 2015 and proposes, among other things, to bring the CMP density into conformance with the General Plan density.

**Project Description:** The current project is a comprehensive update to the 1990 CMP and would replace it in its entirety, uniting all facilities that have been added under various amendments over the intervening years as well as all uses that exist on the site. The primary project objective is to update the CMP in order to allow additional residential and non-residential development consistent with the density allowed under the General Plan designation. Figure 2 shows the overall CMP with existing and proposed development, trails, septic areas, environmental constraints and resources, and proposed rezoning. Figure 3 is a simplified version of the overall site plan and shows only existing and proposed structures. The circulation plan shown in Figure 4 identifies existing and proposed roads for the master plan area. Project components are described in detail below:

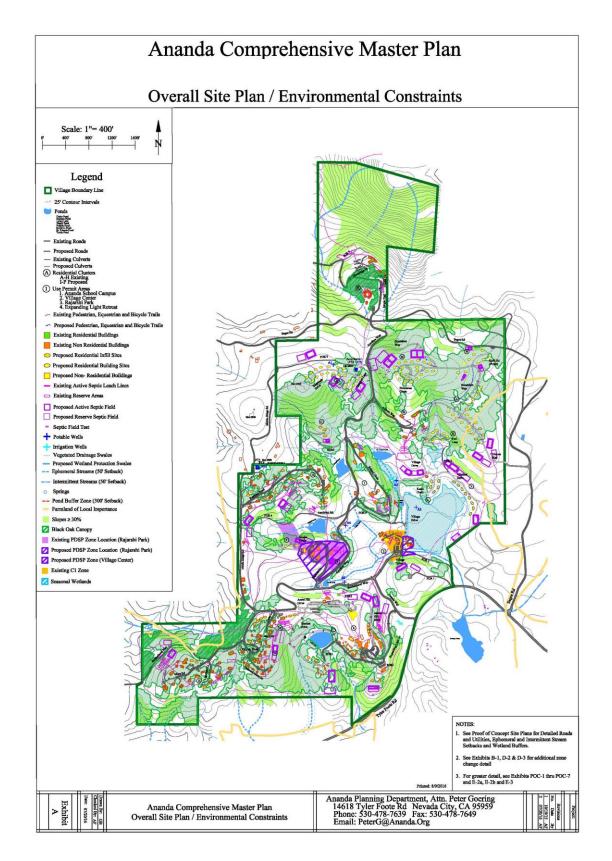
A <u>Rezone (Z15-001) proposing to alter the boundaries of the existing Rajarshi Park PD-SP zone to fit the existing disturbed area and to correct a zoning map error in the location and size of the zoning boundaries; to alter the boundaries of the existing Village Center C1-PD-SP zone to correct a zoning map error in location, size, and configuration of the zoning area; and to rezone 1.16 acres of AG-PD-SP zoning to PD-SP adjacent to the existing Village Center. proposing to alter the boundaries of the existing 9-acre Rajarshi Park PD SP zoning area to fit the existing disturbed area but not alter the 9-acre size, and to locate a new 1.1 acre PD SP zone area adjacent to the existing C1 PD SP zone boundaries to accommodate existing and planned development that consists of maintenance and equipment storage areas, recycling and solid waste storage, and vehicle repair. The current General Plan designation allows up to 17 acres of PD-SP. Figure 2, Comprehensive Master Plan, shows the location of the rezones within the overall plan area, and Figures 5 and 6 show the rezone areas enlarged and overlaid on aerial images.</u>

A <u>Development Agreement</u> (MIS16-0009) proposing an extended development timeline of 15 years with the potential for two 5-year extensions, phasing flexibility, customized sewage disposal inspection fees, and a customized administrative process for development of the residential units. These elements are proposed and have not yet been accepted by the County at this time. Benefits to the County and public provided by the Development Agreement include but are not limited to the following:

- <u>An agreement with the North San Juan Fire Protection District for Ananda to provide a fire engine garage or other fire protection benefit reasonably satisfactory to the District;</u> Construction of a fire engine garage in the Village Center for lease to the North San Juan Fire District;
- The maintenance of fire protection and preparedness features onsite such defensible space, a helicopter landing site, and the maintenance of water storage to maintain current ISO ratings;
- Maintenance of the Village Center as a Red Cross emergency/evacuation and shelter-in-place center for the community;
- Construction of an emergency access route extending Almora Way to Sages Road prior to any residential development;
- The dedication through deed restriction of 54 acres of open space preserve managed for oak woodland habitat;
- Maintenance of a recycling drop-off point for the community;

- Continued public access to the market and café; and
- Offer of an easement to neighbors to reroute Sages road north of the intersection of Salmon Mine Road across Ananda land to allow an alignment that meets Fire Safe Standards.

#### Figure 2: Comprehensive Master Plan



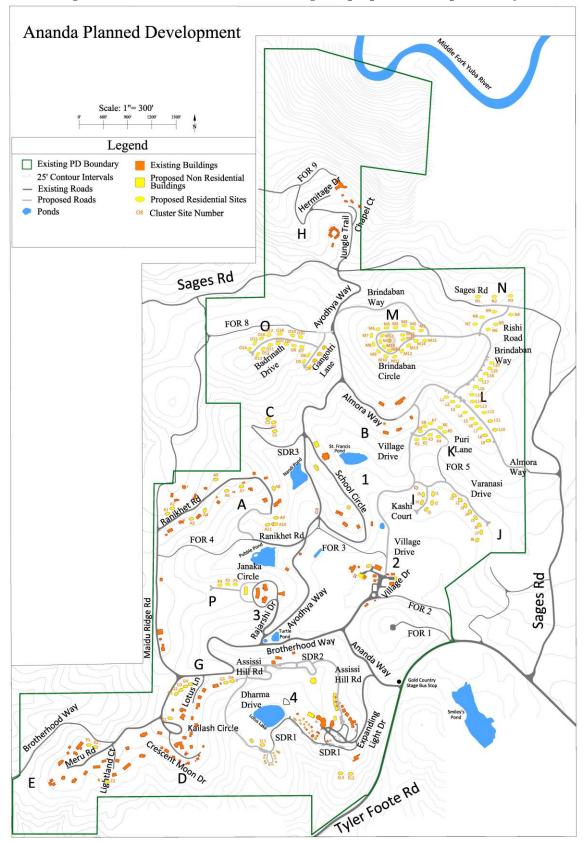


Figure 3: Overall Site Plan (with existing and proposed development only)

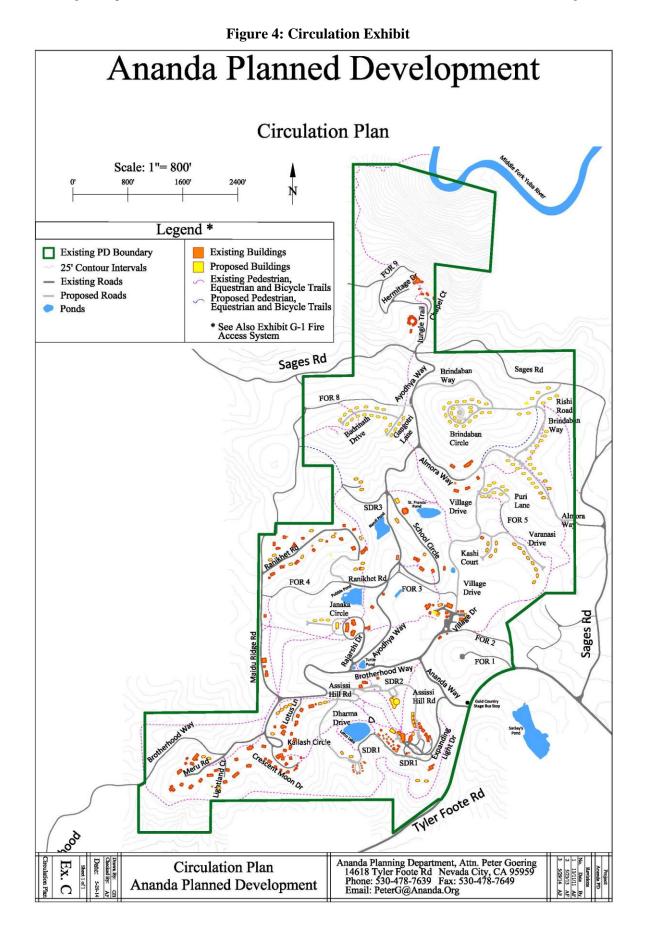




Figure 5: Rajarshi Park Rezone Exhibit

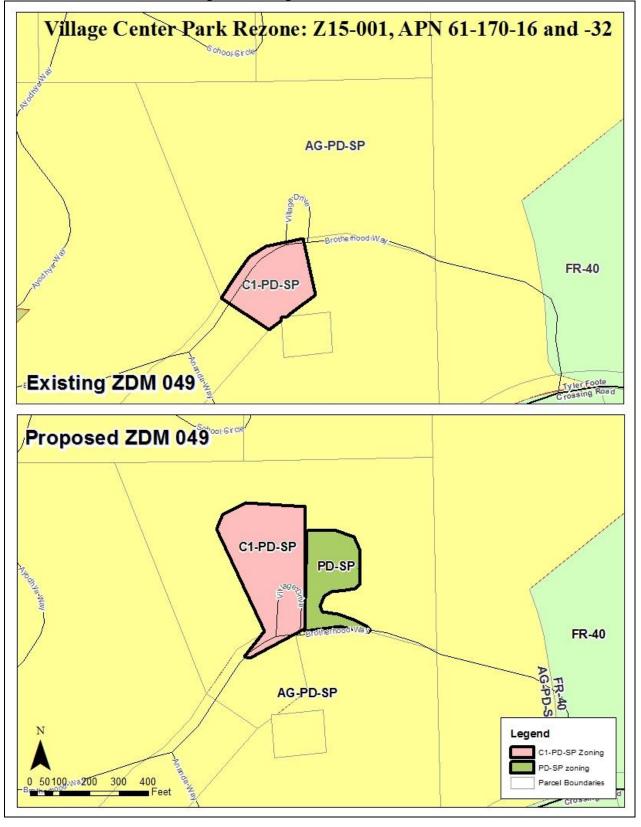


Figure 6: Village Center Rezone Exhibit

A <u>Comprehensive Master Plan</u> (U15-002) to allow multiple dwelling clusters and non-residential development, including office, industrial, and commercial uses as follows:

*Residential uses*: Increase the residential cap from 87 units to the General Plan maximum density of 195 units. Additional dwellings would be a combination of infill units within the 8 existing clusters (Clusters A-H) and up to 9 new clusters (Clusters C and I through P) within the existing village boundaries. Each housing cluster, which could be comprised of attached or detached units, would be served by the community water system, and would have multiple community sewage disposal areas, access to fire flow, and circulation in conformance with the Fire Safe Road standards. Infrastructure and access roads would be extended to residential clusters or the applicable portion of the cluster, as needed for construction of the individual residences. A connection to Sages Road would also be provided for secondary access purposes. Each dwelling unit would retain the right to construct accessory structures, but the applicant has agreed that no second dwelling units would be permitted.

Home sites were selected using several criteria, including solar capability, existing access and infrastructure, and avoidance of sensitive resources and environmental constraints. Specifically, residential site criteria are as follows:

- Have southerly aspect for active and passive solar design
- Ideally be located on 0-12 percent slope but not more than 20 percent slope
- No placement within drainages, waterways and wet areas
- Avoid heavily forested areas
- Ideally have existing fire-safe access; if not, allow for economical extension of existing roads and infrastructure
- Avoid visibility from internal viewpoints and County roads
- Be located over 100 feet from Village boundaries

As shown in Figures 2 and 3, there are 120 sites fitting these criteria that have been identified within new and existing clusters as potential building sites. At the time of detailed site plan review for specific sites, it is anticipated that other factors such as underground rock formations, large trees, septic capability, and aesthetics could reduce the number of available sites. Allowing for unknown constraints, the proposal for 100 new units within 120 identified sites will allow for more flexibility as the project develops. No more than 195 total dwelling units total are proposed. Currently, 85 of the 87 allowable dwelling units have been built, leaving the potential for 2 more dwelling units within existing clusters under the existing approved Master Plan. However, Ananda is proposing to include several existing structures that were not previously included in the residential unit count toward the overall residential unit count, as follows, leaving only 100 new units proposed:

	Type of unit	Number	
Existing approved number	Existing residences		
of units	Allowable number of additional units under existing Master Plan	2	
Previously constructed or	Existing "pods" (freestanding bedroom/sitting room structures	5	
included in village but not	without full kitchens)		
counted toward residential	Existing staff/guest housing	1	
unit total	Existing residences incorporated into community after existing	2	
	Master Plan approved		
New units proposed	New residences, including staff housing	100	
Total unit count proposed (per General Plan)			

**Table 1: Residential Unit Count** 

All new and existing staff housing would be included in the residential unit count. Guest units, tent/tent cabin camping, and RV camping with overnight stays for the Expanding Light Retreat center, which include a mix of private and shared bathrooms and no kitchens, would not be included in the total permanent residential unit count.

Proof of concept plans for each new area of substantial residential development (Clusters I-P) are also part of the project application and can be found on the County's website at www.mynevadacounty.com/nc/cda/planning/Pages/Ananda-Village-CMP.aspx.

*Non-residential uses*: The CMP includes Design Guidelines to ensure new construction is consistent with existing development within the community. Four Use Permit Areas (UPAs) cluster the non-residential development:

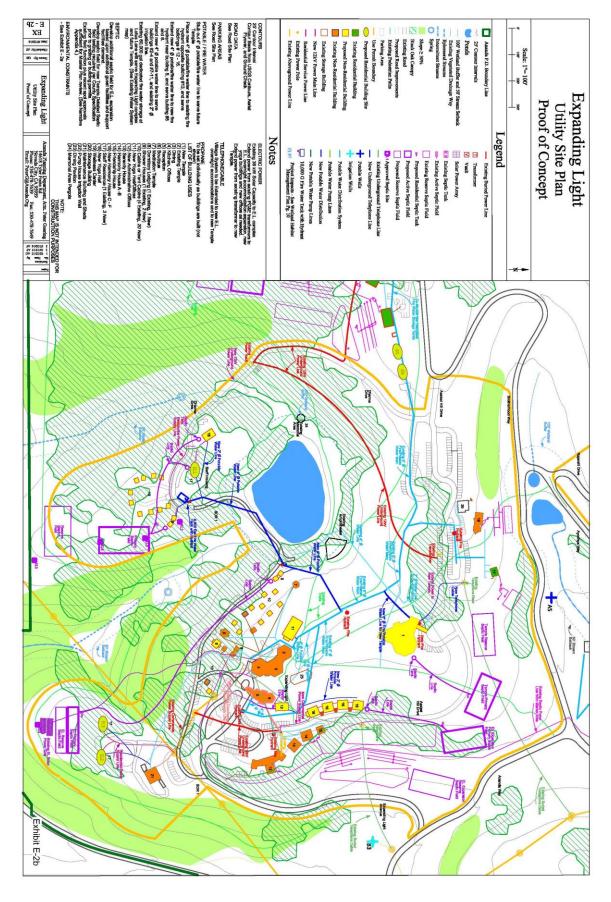
- <u>Living Wisdom School</u>: Incorporate the recent use permit for the school into the overall CMP (U08-013). No new buildings proposed beyond what was approved under U08-013
- <u>Village Center</u>: New buildings include a maintenance building (1,6800 sf) and vehicle repair shop (1,12056 sf), both located under and as part of a solar shade structure (12,000 sf); an office building (1,500 sf); a fire engine garage (864 sf); and market kitchen remodel/expansion (536 sf).
- <u>Rajarshi Park</u>: New office/warehouse building (4,800 sf)
- Expanding Light Retreat: New temple (11,000 sf), yoga hall and offices (4,300 sf), yoga classroom/hall (1,000 sf), dormitory lodge (1,200 sf), administrative office (1,500 sf), 20 tent platfoms/tent cabins for guests (415-150 sf each for a total of 8,300-3,000 sf), 4 guest houses (1,200 sf each for a total of 4,800 sf), 2 shower houses (500 sf each for a total of 1,000 sf), 10 RV campground with dump station (approx. 21,700 sf)parking spaces, dining pavilion (2,826 sf), and memorial area/pergola (approx. 700 sf)

Figures 7 and 8 show the two non-residential use areas with the most substantial development proposed, Expanding Light Retreat and Village Center, respectively. Floor plans and elevations for new proposed non-residential structures are also part of the project application and can be found on the County's website for the project.

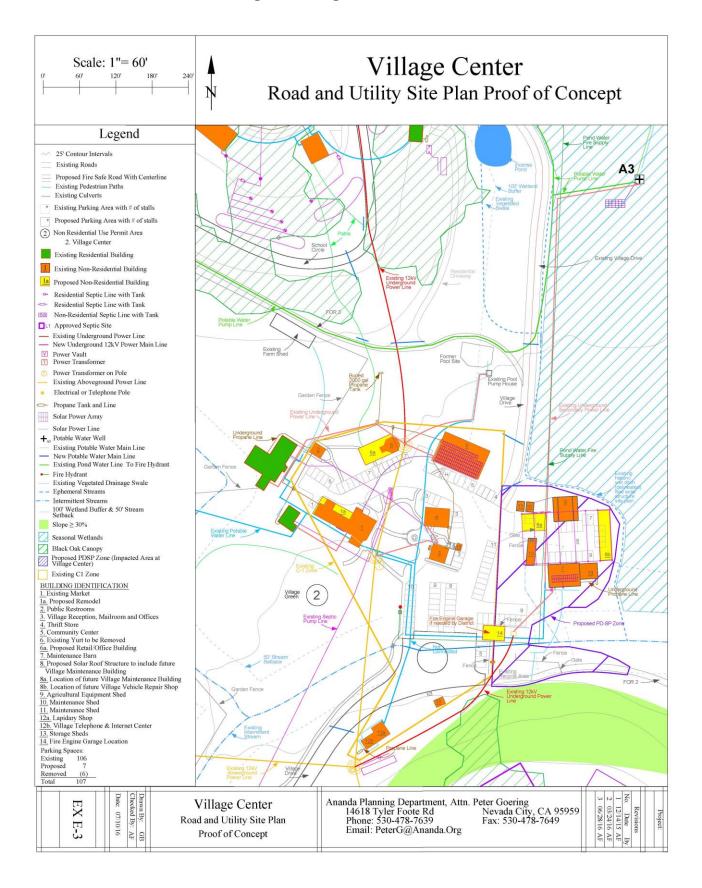
*Events*: Ananda Village currently hosts a number of events that would continue under the new CMP. Although the 1978 Use Permit allowed up to four special events per year, the 1990 Use Permit under which the Village currently operates does not provide for any special events. The following events which have been ongoing would also be covered under the current Use Permit application:

Village Center: The Village Center is the primary commercial and public hub of Ananda Village and is located near the entrance to the community. Village Center events are held on the green outside the Master's Market. Parking is located in the Village Center parking lot, with overflow in the field north of the corner of Ananda Way and Brotherhood Way. Restrooms are behind Master's Market and include five toilets. Attendance at Village Center events ranges from approximately 50 to 200 people. When amplified music is desired, a PA system is set up outside Master's Market with two speakers facing the green. Events are generally open to the public and include:

# Figure 7: Expanding Light Site Plan



#### Figure 8: Village Center Site Plan



- A Harvest Festival, which occurs one day in the autumn from 11 am to 6 pm and features local business booths, arts and crafts, a pumpkin patch, blacksmith demonstration, games, music, contra dancing, food, etc.
- A Halloween event oriented to families of those attending Ananda Living Wisdom School occurs annually from 4:00 pm to 8:30 pm and includes a picnic dinner, costume parade, themed booths and displays, trick or treating, and storytelling.
- A Fourth of July celebration open to the public and featuring a parade, games, music, food, and contra dancing, from 4:30 pm to dusk.

Expanding Light Retreat Center: Summer programs specified below are held at the Expanding Light Retreat Center ("Retreat Center") unless capacity exceeds the indoor limitation, in which case the events are moved to the amphitheater. The Retreat Center has numerous toilet facilities including a central shower house with separate facilities for men and women. The total number of guests at any given time is proposed at up to 200.

- Yoga, meditation, and personal wellness and health classes; yoga teacher training and meditation teacher training classes; yoga therapy classes for health professionals.
- Occasional summer programs, including concerts, lectures, and dramatic performances. The largest program is an annual retreat called Spiritual Renewal Week that takes place in mid-August. This program includes daily lectures (10:00 am to 12:00 pm) and evening programs (7:00 to 9:30 pm) that may include music performances, dramatic performances, or group chanting.
- Weekly Sunday services open to the public, 11:00 am to 12:30 pm between June and September.

<u>Amphitheater</u>: The amphitheater is used by village residents, guests at the Retreat Center, and to a much lesser extent (approximately 5-30) non-resident, non-guest visitors during the summer months, when indoor capacity is exceeded at the Retreat Center. The amphitheater can seat 400 or more in moveable chairs. Parking for the amphitheater is provided in the lots adjacent to the Retreat Center, and an additional large graveled parking area to the north of the amphitheater, accessed off Brotherhood Way. Portable toilets are placed near the amphitheater for the entire summer season. Events include the same shown above under the Retreat Center, with the exception of classes. The amphitheater has a sound system comprised of four speakers and a mixing station that can accommodate multiple microphones as needed.

<u>Crystal Hermitage</u>: The Crystal Hermitage buildings and gardens at the north end of the village were the home of Ananda's founder Swami Kriyananda, and more recently have become the resting place of Kriyananda with a mausoleum addition. Many informal events such as pot lucks, meetings, baby blessings, and group meditations occur at the Crystal Hermitage. Parking is in two lots at the top and bottom of the gardens. Additional parking is located along Jungle Trail. Overflow parking for large events is in the parking lot of the nearby residential cluster, and in a graveled lot at the high point of Ayodyha Way several hundred yards to the south. More formal events open to the public include the following:

- Weddings and wedding receptions, with guest accommodations for weddings at the Crystal Hermitage Guest House, the Gaia House, and the Expanding Light Retreat. The small chapel on the grounds and the gardens are available for weddings for community members and the public. Weddings are small, and often the receptions occur offsite as Ananda does not allow meat or alcohol on the grounds. Weddings usually employ a portable sound system with speakers to amplify the spoken ceremony and music.
- Springtime at Ananda Tulip Garden Open House. In 2016 the tulip garden was open over a 5-week period in the spring, <u>76</u> days a week, 8-9 hours per day. Visitors totaled around 8,000. The peak number of visitors per day was approximately 800. Visitors typically arrive in groups of 2 to 5 people per vehicle, and stay for 30 minutes to 2 hours. The

gardens are open to the public with an entry fee, and many visitors come from outside Nevada County. During this event, guests are shuttled from the remote parking lots in a bus or golf carts, and supplemental portable toilets are provided to supplement the 3 bathrooms available at the Crystal Hermitage.

A <u>Petition for Exceptions</u> (MI15-005) to the Nevada County Road Standards to allow a 100-foot section of the proposed extension of Village Drive to exceed the 16% standard, up to 18% road grade.

A <u>Wetland Habitat Management Plan</u> (MGT15-004) for the potential impacts to onsite wetlands. The proposed plan includes Best Management Practices to offset the impacts from encroachment within the 100-foot wetland setback areas and within 50-feet of the seasonal stream areas. Mitigation is proposed to require the marking of the Environmentally Sensitive Areas prior to construction and the establishment of guidelines to minimize impacts during construction.

An <u>Oak Habitat Management Plan</u> (MGT15-005) for the potential impacts to the oak woodlands areas. Multiple areas within the Village include black oak stands that may be impacted by the expansion of the building areas. Mitigation areas are proposed to offset the loss of oaks, and additional mitigation is proposed to educate Village residents on the preservation of those oak woodland areas.

A <u>Steep Slopes Management Plan</u> (MGT17-0004) to minimize impacts to an approximately 400-foot section of Brindaban Way that would be constructed through intermittent areas of slopes over 30 percent in order to access Cluster M.

Two non-concurrent Lot Line Adjustments (LLA16-0008, LLA16-0014) to reconfigure parcel boundaries to meet applicable building setbacks and site development standards for individual lots. These are proposed as follows:

Expanding Light Area and Existing Residential Clusters D, E, and G (southern area)					
APN	Zoning	Existing Area	Proposed Area		
61-170-12	AG-PD-SP	3.96 ac	99.06 (ptn 61-170-12, 61-170-34, 61-180-02, and		
			61-180-03)		
61-170-34	AG-PD-SP	178.12 ac	95.42 (ptn 61-170-34)		
61-180-02	AG-PD-SP	40.00 ac	32.93 (ptn 61-180-02)		
61-180-03	AG-PD-SP	40.00 ac	34.67 (ptn 61-180-02 and 61-180-03)		
TOTALS		262.08	262.08		

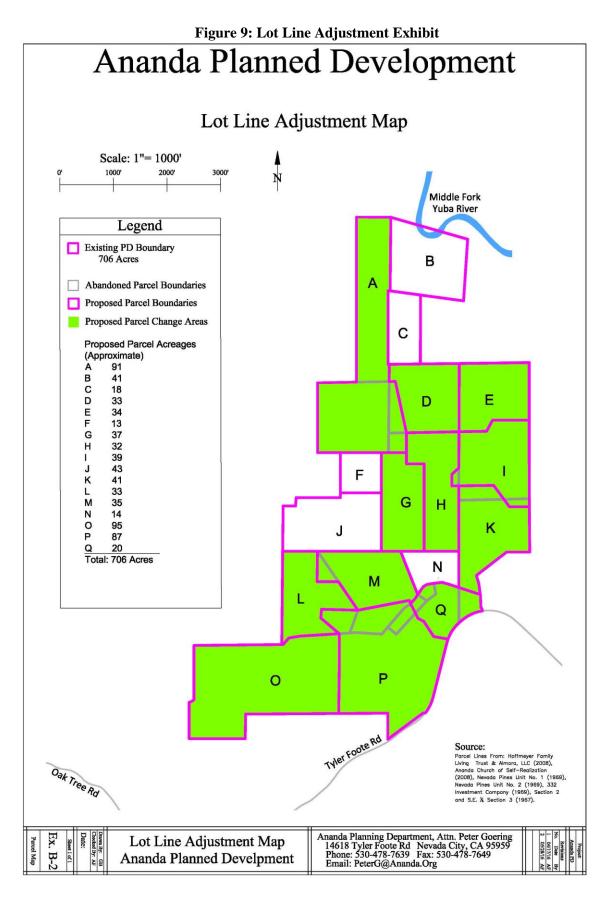
 Table 2: Lot Line Adjustment #1

 Danding Light Area and Existing Residential Clusters D. E. and G (southern area)

Table 3: Lot Line Adjustment #2	
Duan and Davidantial Chustomy VI MNO (northann and	( ~ .

Proposed Residential Clusters K, L, M, N, O (northern area)				
APN	Zoning	Existing Area	Proposed Area	
61-210-19	AG-PD-SP	38.40 ac 38.00 ac (ptn 61-210-19 and 61-210-20)		
61-210-20	AG-PD-SP	76.62 41.11 (ptn 61-210-20)		
			31.00 ac (ptn 61-210-20)	
61-230-06	AG-PD-SP	43.09	88.00 ac (ptn 61-180-02)	
61-240-02	AG-PD-SP	40.00 ac	- (proposed ptn of 88 acres above)	
TOTALS		198.11 ac	198.11 ac	

These boundary line adjustments and likely at least one other in the vicinity of proposed residential Clusters I and J would be recorded as development occurs in order to maintain site development standards for individual parcels. No more than one would be recorded at any given time. Figure 9 shows the ultimate parcel configurations planned. The number of lots would remain the same after all adjustments are completed, and no additional density would occur.



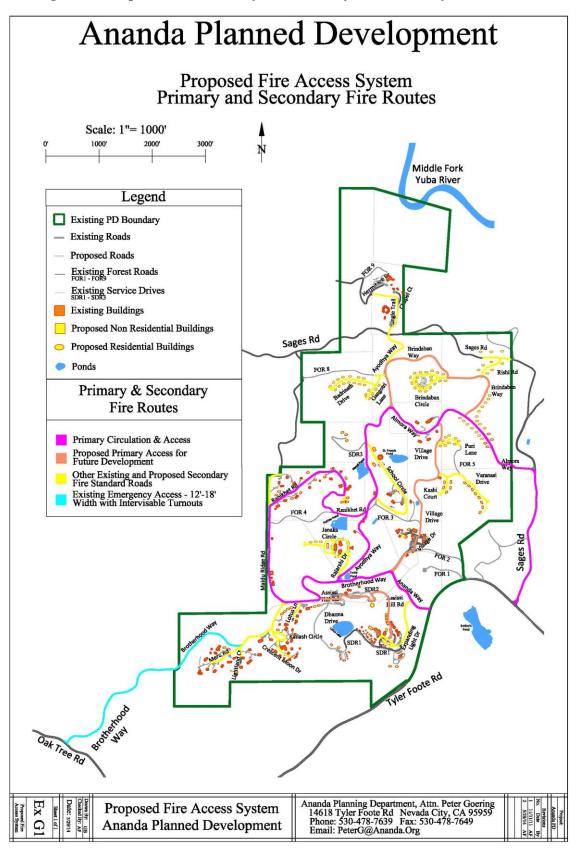


Figure 10: Proposed Fire Access System: Primary and Secondary Fire Routes

In addition, the project application includes a Fire Protection Plan, and Ananda has a CalFire-certified Forest Management Plan to provide additional management resources for the management of fire fuels on the property. Figure 10 shows the fire access circulation as it exists today and as proposed.

**Other Permits Required:** Based on initial comments received, the following permits <u>may</u> be required from the designated agencies:

- 1. Grading and building permits Nevada County Building Department
- 2. Sewage disposal, community water system, hazardous waste, and retail food facility permits Nevada County Environmental Health Department
- 3. Storm Water Pollution Prevention Plan (SWPPP) and National Pollutant Discharge Elimination System (NPDES) Permits Central Valley Regional Water Quality Control Board
- 4. Dust Control and Operations Permits Northern Sierra Air Quality Management District

Relationship to Other Projects: This project is not related to any other known projects in the area.

# SUMMARY OF IMPACTS and PROPOSED MITIGATION MEASURES

**Environmental Factors Potentially Affected:** All of the following environmental factors have been considered. Those environmental factors checked below would be potentially affected by this project, involving at least one impact that is "Less Than Significant with Mitigation" as indicated by the checklist on the following pages.

<u>~</u>	1. Aesthetics	<u>~</u>	2. Agriculture / Forestry Resources	<u>~</u>	3. Air Quality
<u>~</u>	4. Biological Resources	<u>~</u>	5. Cultural Resources	<u>~</u>	6. Geology / Soils
<u>~</u>	7. Greenhouse Gas Emissions	<u>~</u>	8. Hazards / Hazardous Materials	<u> </u>	9. Hydrology / Water Quality
	10. Land Use / Planning		11. Mineral Resources	<u>~</u>	12. Noise
_	13. Population / Housing		14. Public Services		15. Recreation
	16. Transportation / Circulation	<u>~</u>	17. Utilities / Service Systems	<u>~</u>	<ol> <li>Mandatory Findings of Significance</li> </ol>

#### **Recommended Mitigation Measures:**

1. <u>AESTHETICS</u>: To offset the potential aesthetic impacts associated with the project, the following mitigation measures shall be required:

Mitigation Measure 1A. Add Visual Resource Protections to the Comprehensive Master Plan **Design Guidelines:** Prior to issuance of any grading or improvement permits, the following shall be added to the Comprehensive Master Plan Design Guidelines to provide visual resource protections:

- 1. All outdoor light fixtures for both residential and non-residential uses shall be fully shielded and downward-facing to prevent the light source or lens from being visible from offsite properties and roadways. Fixtures shall have high-efficiency lamps. Mercury vapor light fixtures, floodlights and spotlights shall be prohibited. Lighting shall be turned off between 11 p.m. and sunrise except for the following: security lighting which operates with the use of motion or heat sensors, those businesses operating during these hours, and lighting at the Village Center and Rajarshi Park which has a demonstrated safety and security need. Security lighting fixtures shall be shielded and aimed so that illumination is directed only to the designated area. Improvement plans for non-residential structures shall depict the location, height and positioning of all light fixtures and shall provide a description of the type and style of lighting proposed.
- 2. Residential buildings within Clusters L, M, N, and O shall be subdued earth tone colors. High visibility or reflective colors and materials, such as bright white body color or shiny metal roofing, are prohibited.
- 3. Non-residential buildings (with the exception of the new temple) shall be subdued colors similar to the tones found on nearby buildings. High visibility or reflective colors and materials are prohibited.
- 4. Clearing of trees for building site views shall be limited to a 30-degree corridor as measured from the edges of the building.

The Final Comprehensive Master Plan and Design Guidelines shall be kept on file in the Planning Department for future reference in site plan reviews.

**Timing:** Prior to issuance of grading and improvement permits **Reporting:** Revision of CMP and Design Guidelines prior to approval of any permits **Responsible Agency:** Planning Department

- 2. <u>AGRICULTURAL/FORESTRY RESOURCES</u>: See Mitigation Measures 4I-4L.
- **3.** <u>AIR QUALITY</u>: To offset the potential air quality impacts associated with the project construction activities, the following mitigation measures shall be required:

**Mitigation Measure 3A. Reduce Emissions during Construction:** The following measures shall be included as notes on all plans prior to issuance of all grading, improvement, and building permits. In addition to these measures, all statewide air pollution control regulations shall be followed, including diesel regulations (which may be accessed at www.arb.ca.gov/diesel/diesel.htm).

- 1. Alternatives to open burning of vegetative material shall be used to dispose of site-cleared vegetation. Among suitable alternatives are chipping, mulching, or conversion to biomass fuel.
- 2. Grid power shall be used (as opposed to diesel generators) for job site power needs where feasible during construction.
- 3. At least 50% of the mobile off-road construction equipment in use at any time on the project shall be equipped with Tier 1 engines (or cleaner).
- 4. All architectural coatings shall comply with the California Air Resources Board's 2007 Suggested Control Measure for Architectural Coatings (available at www.arb.ca.gov/coatings/arch/Approved\_2007\_SCM.pdf).
- 5. Construction equipment idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to 5 minutes (as required by the California airborne toxics control measure Title 13, Section 2485 of California Code of Regulations [CCR]) and all construction equipment shall also be maintained and properly tuned in accordance with manufacturer's specifications." Clear signage shall be provided for construction workers at all access points.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval grading, improvement, and building permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3B. Implement a Dust Control Plan:** Prior to issuance of any grading or improvement permits proposing disturbance of topsoil, the applicant shall submit a dust control plan for the review and approval of the Air Pollution Control Officer. For the purpose of this regulation, the disturbance of topsoil includes any clearing, grubbing or grading. The Dust Control Plan requirement shall be fulfilled by clearly phrased and enforceable conditions included on the project grading and improvement plans with their own descriptive heading, such as "Dust Control." The following set of dust control measures would constitute an approvable Plan:

- 1. The applicant (or other responsible party, which should be indicated) shall be responsible for ensuring that all adequate dust control measures are implemented in a timely manner during all phases of project development and construction.
- 2. All material excavated, stockpiled, or graded shall be sufficiently watered, treated, or covered to prevent fugitive dust from leaving the property boundaries and causing a public nuisance or a violation of an ambient air standard. Watering shall occur at least twice daily in active areas during dry weather, including once before initial morning disturbance.
- 3. All areas with vehicle traffic shall be watered or have dust palliative applied as necessary for minimizing dust emissions.
- 4. All on-site vehicle traffic shall be limited to a speed of 15 mph on unpaved roads.
- 5. All land clearing, grading, earth moving, or excavation activities on a project shall be suspended as necessary to prevent windblown dust from leaving the property boundary when winds are expected to exceed 20 mph.
- 6. All inactive portions of the development site shall be covered, seeded, or watered until a suitable cover is established. Alternatively, the applicant shall be responsible for applying County-approved non-toxic soil stabilizers (according to manufacturers' specifications) to all inactive construction areas (previously graded areas which remain inactive for 96 hours) in accordance with the local grading ordinance.
- 7. All material transported off-site shall be either sufficiently watered or securely covered to prevent public nuisance, and there must be a minimum of six (6) inches of freeboard in the bed of the transport vehicle.
- 8. Paved streets adjacent to the project shall be swept or washed at the end of each day, or more frequently if necessary to remove excessive accumulations of silt and/or mud which may have resulted from activities at the project site.
- 9. Prior to final occupancy, the applicant shall re-establish ground cover on the site through seeding and watering in accordance with the local grading ordinance.

*Timing:* Prior to issuance of grading or improvement permits *Reporting:* Approval of grading or improvement permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3C. Limit Wood Stoves:** The project shall include no more than one wood-fired heat source in any residential unit, which may be a pellet stove or an EPA-certified wood stove, and open fireplaces shall not be permitted within this project. Each residence shall also be equipped with a non-woodburning source of heat. This mitigation shall be implemented prior to the issuance of residential building permits.

*Timing:* Prior to issuance of residential building permits *Reporting:* Agency approval of building permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3D. Mitigate any Asbestos Discovered during Construction:** If serpentine, ultramafic rock or naturally occurring asbestos are discovered during construction or grading, the applicant shall notify the Northern Sierra Air Quality Management District within 24 hours and comply with specific requirements contained in Section 93105 of Title 17 of the California Code of Regulations. *Timing: During construction* 

#### **Reporting:** As needed

Responsible Agency: Northern Sierra Air Quality Management District

4. <u>**BIOLOGICAL RESOURCES:**</u> To offset the potential impacts to biological resources associated with the project, the following mitigation measures shall be required:

**Mitigation Measure 4A. Avoid and Reduce Impacts to Nesting Raptors and Migratory Birds:** If tree removal is proposed outside the nesting season (August 1-February 28), no further mitigation is required. If tree removal is proposed during the nesting season (March 1- July 31) for any project construction, including road and infrastructure improvements, a Nevada County-approved qualified biologist shall conduct a pre-construction survey to verify that the construction and potential disturbance zones do not support nesting migratory birds. The surveys shall incorporate the following procedures:

- 1. Tree removal shall not take place during the breeding season (March 1 July 31), unless supported by a report from a qualified biologist verifying that birds, including raptors, are not nesting in the trees proposed for removal or disturbance.
- 2. An additional survey may be required if periods of construction inactivity (e.g., gaps of activity during grading, tree removal, road building, or structure assembly) exceed two weeks, an interval during which bird species, in the absence of human or construction-related disturbances, may establish a nesting territory and initiate egg laying and incubation.
- 3. Surveys shall be conducted no more than two weeks prior to the initiation of construction activities or other site disturbances.
- 4. Should any active nests or breeding areas be discovered, a buffer zone (protected area surrounding the nest, the size of which is to be determined by a qualified biologist) and monitoring plan shall be developed for the review and approval of CDFW. Nest locations shall be mapped and submitted, along with a report stating the survey results, to the Nevada County Planning Department within one week of survey completion.

A qualified wildlife biologist shall monitor the progression of reproductive stages of any active nests discovered during the preconstruction survey until a determination is made that nestlings have fledged and that a sufficient time for fledgling dispersal has elapsed; construction activities shall be prohibited within the buffer zone until such determination is made.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4B. Avoid and Reduce Impacts to Special-status Bat Species:** If removal of trees 24 inches dbh or larger ("potential roost trees") is conducted between September 16 and March 31, or if trees to be removed at any time are smaller than 24 inches dbh, acoustical surveys for bats are not required. If trees 24 inches dbh or larger are to be removed for project construction between April 1 to September 15, acoustical surveys for the presence or absence of Yuma myotis and Pale Townsend's bigeared bat shall be performed by a biologist with experience in this type of survey. If these bat species are not detected within the project site, then no further mitigation is required. If these bat species are detected acoustical surveys demonstrate that the bats are no longer foraging within the site; or each potential roost tree that is either designated to be removed or is located within a 50-foot radius of a tree to be removed is determined definitively not to contain a hollow suitable for bat roosting use; or until the period of September 16 to March 30, during which trees of any size may be removed without impacts to bats.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4C. Establish Non-disturbance Buffers (Wetland Habitat Management Plan):** Establish non-disturbance buffers around sensitive wet areas as follows:

- 1. Prior to the start of construction, the applicant shall establish the seasonal wetlands, riparian areas, and ponds that occur in close proximity to project-related work activities as non-disturbance buffers during construction. These include areas mapped as "SW", "P", and "R" in Figures 3 and 4 of the Wetland Habitat Management Plan prepared by Beedy Environmental Consulting (dated April 2016) that occur within 100 feet of development, including road widening and road improvements. Work shall not begin until the buffers are delineated on the ground with orange safety netting or signage under the supervision of a qualified biologist. The buffer area signs shall be installed wherever activity will occur within 100 feet of these resources and remain in place for the entire duration of construction. Staging areas as well as fueling and maintenance activities shall be a minimum of 66 feet from onsite ponds (St Francis, Nandi, Pubble, Dairy, Incense, Turtle, and Lotus). Spoil areas, staging areas, access roads, parking, and equipment refueling & maintenance areas shall be located a minimum of 30 feet from the upstream or upslope side of the wetlands, ponds, riparian areas, and upland swales. Any construction activity that occurs within 20 feet of any water resource shall be marked with orange safety netting. No earth-moving activities, vegetation removal, vehicles, heavy equipment, material storage, equipment maintenance or refueling, or other construction activities shall be permitted within the ESA buffers. The boundaries of all work areas shall be clearly marked on all final grading and construction drawings.
- 2. Prior to issuance of the first occupancy permit, the applicant shall install signage at points around the perimeter of areas mapped as seasonal wetland, ponds, or riparian areas in the Biological Inventory, where these areas share a boundary with roads, trails, or development. The signage shall inform residents about the potential presence of nesting migratory birds and other sensitive wildlife in these areas during the breeding season (March 1 through July 31).

*Timing:* Prior to issuance of grading and improvement permits and prior to first occupancy permit *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4D. Implement Best Management Practices (Wetland Habitat Management Plan):** To protect water quality, habitat values, and wildlife in the wetlands, ponds, streams, and riparian areas, the project work shall implement BMPs during and after construction as described in the Wetland Habitat Management Plan prepared by Beedy Environmental Consulting (April 2016). These include areas mapped as "SW", "P", and "R" in Figures 3 and 4 of the Wetland Habitat Management Plan that occur within 100 feet of development, including road widening and road improvements, as well as the reaches of upland "swales" that would be directly affected by road crossings or widening in development clusters "L" and "K". These standard BMPs include but are not limited to the following, which are summarized here. More detailed specifications are provided in the Wetland Habitat Management Plan:

- 1. <u>Pre-Construction Planning</u>. These measures shall be implemented prior to the start of any earthwork activities.
  - a. Minimize the amount of soil and vegetation disturbance to the minimum necessary through site design and construction practices.
  - b. Prior to the start of work that will disturb soil within 50 feet of wetlands, ponds, or riparian areas, including any vegetation removal, install silt-fencing, straw bales, sediment catch basins, straw or coir logs or rolls, or other sediment barriers to keep erodible soils and other pollutants from entering the adjacent wetlands, ponds, or riparian areas outside the permitted work area.
  - c. Prior to the start of construction, medium to large and/or dense infestations of Scotch broom, goat grass, and yellow star thistle within or adjacent to the 100-foot non-disturbance buffers shall be marked with signage and/or temporary safety netting.

- d. Provide copies of "After the Storm: A Citizen's Guide to Understanding Stormwater" (Appendix B of the Wetland Habitat Management Plan) to residents living within or near the construction area.
- e. Prevent alteration of the surface drainage patterns that support streams, wetlands, ponds, and riparian areas by maintaining existing drainage patterns in the design of road ditches, culverts, and development runoff drainage plans.
- 2. <u>Construction Measures</u>. These measures shall be implemented and shown as notes on all grading and improvement plans.
  - a. Construction activity within 100 feet of the wet areas shall occur only during dry weather.
  - b. All ESAs and work areas, including spoil areas, staging areas, access roads, parking, and equipment refueling and maintenance areas, shall be clearly marked on all final grading and construction drawings. The applicant shall prepare a spill prevention and clean-up plan.
  - c. Before the first heavy rains and prior to removing the barriers, soil or other sediments or debris that accumulates behind the barriers shall be removed.
  - d. The contractor shall exercise every reasonable precaution to protect the wetlands, ponds, and riparian areas from accidental pollution with fuels, oils, bitumen, and other harmful materials. The contractor shall immediately contain and clean up any petroleum or other chemical spills with absorbent materials such as sawdust or cat litter.
  - e. All disturbed areas shall be graded or smoothed to minimize surface erosion and siltation; disturbed and bare soils shall be stabilized as soon as possible after the soil disturbance is completed and before any rain event. Specific measures apply to Lotus Lake.
  - f. Bare soils shall be stabilized with a combination of locally native grass seed and/or plugs or tightly woven fiber netting or similar material biodegradable mats to anchor the seeding and mulch on any steeper faces. Plastic sheeting and plastic mono-filament matting may not be used for erosion control due to the possibility of California red-legged frog entrapment. This limitation shall be communicated to the contractor through use of special provisions included in the bid solicitation package.
  - g. On slopes greater than 3:1, heavy erosion control blankets shall be used and installed according to manufacturer's directions.
  - h. If straw is used for mulch or for erosion control, only certified weed-free straw shall be used to minimize the risk of introducing noxious weeds.
  - i. Contractors shall be instructed to wash or otherwise remove any seed or stolons from the tires, tracks and undercarriage of heavy equipment and any other vehicles entering the project site.
  - j. Sediment and other pollutant control measures, and erosion control measures shall be inspected regularly, and repaired and/or installed no less than 24 hours before a forecast storm or rain event.
  - k. Extra sediment, pollutant, and erosion control materials shall be stockpiled onsite to address any unanticipated rain events, problems and emergencies.
- 3. <u>Operational Measures</u>. These measures shall be implemented on an ongoing basis after construction and for the life of project operations, except as noted.
  - a. Prevent the direct discharge of development runoff into ponds, wetlands, and riparian areas by pre-treating the runoff in constructed vegetated swales upstream of these features. These swales shall be constructed as part of the grading and improvement plans for the applicable areas and shall be maintained for the life of the project.
  - b. Protect water quality in the seasonal wetlands and riparian areas surrounding the proposed Village Center PD-SP zone during ongoing operations by insuring that all operations involving petroleum based products (refueling, lubrication, engine maintenance etc.) or other chemicals take place on covered cement pads or indoors to prevent any potential contamination of runoff.

*Timing:* Prior to issuance of the grading and improvement permits and during operation of the project *Reporting:* Agency approval of permits

Responsible Agency: Planning Department

Mitigation Measure 4E. Maintain an Educational Program for Village Residents and Visitors (Wetland Habitat Management Plan): In order to minimize impacts to wildlife and habitat values, the applicant shall maintain an educational program for Village residents and visitors that focuses on the following during the ongoing operation of the project:

- 1. Any dogs brought onto the property by neighbors, visitors, and guests shall be kept on a leash at all times. Residents and visitors shall not walk dogs in areas mapped as seasonal wetland, ponds or riparian areas.
- 2. Educate residents about the impacts of human disturbance to wildlife ("flushing," light pollution, etc.) and about cat predation on wildlife, especially ground-nesting species, and encourage spaying and neutering of cats. Homeowners shall be encouraged to keep their cats indoors at night.
- 3. Educate residents about the impacts of night-time lighting to wildlife and the CMP requirements to shield light fixtures to direct lighting away from natural areas; use the proper amount of light for the job (don't overlight); and turn off lights (either manually or with motion sensors) when there is no one around to use them. Advocate to residents how these simple steps will also result in both reduction of light pollution and conservation of energy.
- 4. Prohibit the dumping of private yard trash, landscape maintenance trash (including grass clippings), or littering; require residents to keep trash cans and compost bins in fenced areas to avoid attracting wildlife and to prevent nuisance wildlife.
- 5. Educate residents on how to deter brown-headed cowbirds by the following measures: use feeders that are made for smaller birds, such as tube feeders that have short perches, smaller ports, and no catch basin on the bottom. Avoid platform trays, and do not spread food on the ground; avoid using cowbirds preferred feed (sunflower seeds, cracked corn, and millet) and instead offer nyjer seeds, suet, nectar, whole peanuts, or safflower seeds; clean up seed spills on the ground below feeders, and avoid searching for or visiting a nest if cowbirds are in the area.
- 6. Implement fuels management guidelines in the Ananda Village Forest Management Plan (Whitlock 2013).
- 7. Locate trails and other recreational facilities away from seasonal wetland, pond, and riparian areas and other Environmentally Sensitive Areas, maintaining a buffer of 25 feet or more from the perimeter of these habitats.

*Timing:* Prior to issuance of the grading and improvement permits and during project operation *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4F. Provide Copies of Mitigation Measures to Contractors:** To ensure the proper and timely implementation of all mitigation measures contained in this report, as well as the terms and conditions of any other required permits, the applicant shall distribute copies of the project mitigation measures and any other permit requirements to the contractors and to members of the Ananda Village Board of Directors prior to grading and construction. These measures shall also be included as notes on all plans and permits.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4G. Minimize Impacts to California Red-legged Frogs:** Prior to any construction activities and issuance of any grading or improvement permits on the property, the following shall be completed as noted. The term "construction activities" refers to all construction activities, including road improvements and road construction, anything that requires ground disturbance such as campground expansion, septic-field construction, parking-lot construction, stone-wall construction, etc., and anything that requires use of heavy equipment anywhere within 300 feet of a pond. Restrictions apply to all or specified ponds regardless of whether they are inundated at the time of construction.

- 1. <u>Pre-Construction Planning</u>. These measures shall be implemented prior to the start of any earthwork activities.
  - a. Resumes of all biologists proposed to capture or handle red-legged frogs or to provide construction monitoring and training shall be submitted to the Service for approval no fewer than 30 days prior to the start of construction.
  - b. For all projects that take place within 300 feet of any pond, a qualified biologist approved by the U.S. Fish and Wildlife Service (Service-approved biologist) shall train all project staff, contractors, and other work crews regarding habitat sensitivity, identification of California red-legged frogs and their breeding and non-breeding habitats, and required practices before the start of any construction activity taking place within 300 feet of any pond. The training shall include the general measures that are being implemented to conserve this species, the penalties for non-compliance, and the boundaries of the project area. A fact sheet or other supporting materials containing this information shall be prepared and distributed. Upon completion of training, employees shall sign a form stating that they attended the training and understand all of the conservation and protection measures. The training shall be effective for one year and must be retaken after one year.
  - c. For all construction activities taking place within 150 feet of any pond, a pre-construction survey for California red-legged frogs shall be conducted within 24 hours prior to the beginning of construction. The Service-approved biologist shall carefully search all obvious potential hiding spots for red-legged frogs, such as large downed woody debris, the perimeter of pond or wetland habitat, and the riparian corridor associated with streams and drainages. Any red-legged frog found shall be captured by a Service-approved biologist and held for the minimum amount of time necessary to release it in suitable habitat outside of the project area. All project construction access areas and routes shall be included in preconstruction surveys and, to the maximum extent possible, shall be established in locations disturbed by previous activities to prevent adverse effects.
  - d. A buffer of 150 feet shall be flagged as a non-disturbance buffer during all construction activities around Lotus Lake, Nandi Pond, Incense Pond, and Pubble Pond. Sensitive habitat areas shall be delineated with high visibility flagging or fencing to prevent encroachment of construction personnel and equipment into any sensitive areas during project work activities.
  - e. Where construction activities will take place more than 150 feet from pond edges, such as at the residence east of School Circle (west of St Francis Pond), the parking area south of Turtle Pond, the septic field southwest of Pubble Pond, the single residence west of Nandi Pond, and any peripheral structures around Lotus Lake, the boundaries of the construction site itself shall be flagged, outside of which construction activities may not take place.
- 2. <u>Construction Measures</u>. These measures shall be implemented and shown as notes on all grading and improvement plans.
  - a. Within the 150-foot buffer, construction activities shall not take place without the presence of a Service-approved biologist. The Service-approved biologist shall monitor all ground-disturbing activity. After ground-disturbing activities are complete, the Service-approved biologist shall train an individual to act as the on-site construction monitor. The onsite construction monitor shall have attended the required red-legged frog training. Both the Service-approved biologist and the construction monitor shall have the authority to stop and/or redirect project activities if any of the requirements associated with these terms and conditions are not being fulfilled and to ensure protection of California red-legged frogs. The Service-approved biologist and construction monitor shall complete a daily log summarizing activities and environmental compliance. The construction monitor shall not have authority to capture or handle California red-legged frogs.
  - b. If a California red-legged frog is encountered during construction work, activities shall cease immediately until the animal is removed and relocated by a Service-approved biologist. California red-legged frogs found within construction areas shall be captured and released well away from construction. California red-legged frogs shall not be captured or handled by anyone other than a Service-approved biologist. Suitable release sites for any captured California red-legged frogs

shall be approved by the Service prior to the start of construction activities. Nets or bare hands may be used to capture red-legged frogs. Service-approved biologists will not use soaps, oils, creams, lotions, repellents, or solvents of any sort on their hands within two hours before and during periods when they are capturing and relocating red-legged frogs. To avoid transferring disease or pathogens between aquatic habitats during the course of surveys or handling of redlegged frogs, Service-approved biologists will follow the Declining Amphibian Populations Task Force's "Code of Practice." Service-approved biologists shall limit the duration of handling and captivity of red-legged frogs. While in captivity, individuals of these species shall be kept in a cool, moist, aerated environment, such as a bucket containing a damp sponge. Containers used for holding or transporting adults will not contain any standing water.

- c. All construction activities shall be conducted outside the "wet season," which in the Sierra begins with the first frontal system that results in at least 0.25 inches of precipitation after October 15 (as measured from the closest published location and elevation by the National Weather Service) and continues until April 15.
- d. All construction within 300 feet of aquatic sites will be completed as quickly as possible. For any lapses longer than one week on construction within 150 feet of a pond edge, a new preconstruction survey for the presence of CRLFs shall be completed prior to the re-initiation of construction.
- e. Permanent and temporary construction disturbances and other types of project-related disturbance to red-legged frog habitat shall be minimized to the maximum extent possible and confined to the project site. To minimize temporary disturbances, all project-related vehicle traffic shall be restricted to established roads, construction areas, and other designated areas. These areas shall be established in locations disturbed by previous activities to prevent further adverse effects.
- f. A vehicle speed limit of 10 miles per hour shall be posted and enforced on all non-public access roads during construction. Construction crews shall be given weekly tailboard instruction to travel only on designated and marked existing, cross country, and project-only roads.
- g. Because dusk and dawn are often the times when red-legged frogs and tiger salamanders are most actively foraging and dispersing, all construction activities shall cease one-half hour before sunset and shall not begin prior to one-half hour before sunrise.
- h. Tightly woven fiber netting or similar material shall be used for erosion control or other purposes at the project site to ensure that the red-legged frogs do not get trapped. This limitation shall be communicated to the contractor through use of special provisions included in the bid solicitation package. Coconut coir matting is an acceptable erosion-control material. No plastic mono-filament matting will be used for erosion control.
- i. The Sacramento Fish and Wildlife Office (SFWO) shall be notified within one working day of the finding of any dead listed species or any unanticipated take of the California red-legged frog.
- j. Staging areas as well as fueling and maintenance activities shall be a minimum of 66 feet from riparian or aquatic habitats. The applicant shall prepare a spill prevention and clean-up plan.
- k. To prevent inadvertent entrapment of wildlife, all excavated, steep-walled holes or trenches will be covered at the end of each work day with plywood or similar materials. If this is not possible, one or more escape ramps constructed of earth fill or wooden planks will be established in the hole. These holes will be inspected for trapped animals prior to the start of construction each day. Before such holes or trenches are filled, they will be thoroughly inspected for any animals. If at any time a red-legged frog is found trapped or injured in these holes, work will cease until the Service is contacted for further guidance.

**Timing:** Prior to issuance of the grading and improvement permits and during project operation **Reporting:** Agency approval of permits **Responsible Agency:** Planning Department

Responsible Agency: Planning Department

**Mitigation Measure 4H. Minimize Impacts to Resident and Migratory Deer Populations:** The project applicant shall enforce existing guidelines for protecting resident and migratory deer populations, as follows:

- 1. Cluster development to concentrate access and services and preserve open space
- 2. Preserve standing oaks and oak groves to the extent possible
- 3. Maintain open meadows and clear brush within forests for fire safety
- 4. Remove old agricultural fences and discourage installation of new fencing (except to protect gardens from deer)
- 5. Enforcing the rule against dogs (generally, no resident dogs, visiting dogs must be on a leash) and hunting within Ananda Village.

These measures shall be incorporated into the Comprehensive Master Plan narrative for the project, which shall be updated prior to the issuance of any grading or improvement permits for the property.

*Timing:* Prior to issuance of the grading and improvement permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

Mitigation Measure 4I. Protect Landmark Oaks and Other Large Diameter Trees from Accidental Harm during Construction (Oak Habitat Management Plan): To ensure that no accidental harm comes to landmark oaks and other trees that have been designated as trees to be left undisturbed, the following measures shall be implemented with the timing shown. The measures shall be incorporated into the grading and construction plans and specifications for all new construction projects, including individual structure construction, septic system construction, and road and driveway construction.

- 1. Prior to issuance of any grading, improvement, or building permits for the project, the applicant shall submit a final Comprehensive Master Plan map that identifies the location of all landmark oak trees and groves as mapped in the project biological reports, and identifies the location of the potential Sages Road re-alignment for the benefit of the neighbors to the east.
- 2. Prior to any tree or vegetation removal, grading, or construction activities, the applicant shall survey the development areas and flag landmark oak trees, large diameter snags, and acorn granary trees that will be left undisturbed. Other large diameter trees (e.g., greater than 18 inches diameter) shall be flagged and preserved wherever possible, with preference for the larger diameter trees. Whenever possible, landmark oak trees and other trees 36 inches diameter or greater shall not be removed and impacts to them minimized.
- 3. Precise surveyed locations of the trees to be left undisturbed shall be shown on improvement, grading, and building plans, and identified within non-disturbance buffers. The boundary of the non-disturbance buffer for landmark oak groves shall be established at the dripline of the protected groves. The boundary of the non-disturbance buffer for landmark oak trees shall be established at a distance that is equal to 1.5 times the radius of the dripline. No soil grading, placement of fill, soil compaction, paving or hardscaping, irrigation, or changes in drainage patterns shall occur within that non-disturbance area. Only non-irrigated plantings shall be permitted within that buffer.
- 4. Where buffers occur within 50 feet of any work activity, they shall be delineated on the ground, prior to construction, with temporary orange construction fencing or flagging spaced at 20-foot intervals and signage.
- 5. Soil surface removal greater than one foot located within the driplines of groves and trees, fill placement within five feet of their trunks, impervious paving (asphalt, concrete, etc.) laid within the dripline of groves and trees shall be considered as disturbances, and the impact will require mitigation as specified in Mitigation Measure 4J. Underground utility line trenching shall not be placed within the dripline of non-mitigated trees. If necessary to install underground utilities within the driplines of oak trees, the trench shall not be placed within five feet of the trunk.
- 6. The applicant is encouraged to implement these or similar measures for trees that they wish to preserve but that may be indirectly impacted by encroachment within the designated non-disturbance buffers; however, any trees that may be impacted by buffer encroachment must be compensated for potential long-term, indirect impacts, under Mitigation Measure 4J.

- 7. A qualified professional biologist shall periodically monitor onsite construction and grading activities occurring near all identified oak tree protection zones to ensure that damage to the protected oak trees does not occur. Prior to final inspection, the biologist shall provide a memo to the Planning Department indicating whether any oaks were damaged during construction that need to be added to the compensation totals.
- 8. Contractors shall stay within designated work areas. No vehicles, construction equipment, mobile offices, or materials shall be parked or located within the established non-disturbance buffers.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4J. Provide Compensation for Impacted Landmark Oaks and Oak Groves** (**Oak Habitat Management Plan**): For all oak woodlands and landmark oaks and madrones that are impacted either directly or indirectly by new development and ground disturbance, including road and infrastructure construction, compensation shall be provided in the following ratios. In currently undeveloped woodlands: 1.5:1 ratio; infill development areas and leach field construction: 0.5:1 ratio. Compensation shall be provided prior to the finalization of any grading, improvement, or building permits. Compensation shall be implemented by the enhancement and restoration of oak woodlands as described in the Oak Habitat Management Plan, including retaining a Registered Professional Forester to conduct the management prescriptions outlined in Appendix B of the Oak Habitat Management Plan. The management prescriptions are summarized below:

- 1. Conduct all large-scale tree and shrub removal in the non-breeding season (August 1-February 28).
- 2. Promote growth of larger trees through thinning and fuels reduction.
- 3. Preserve representations of all tree species present on the site.
- 4. Encourage structural diversity; retain a variety of size and age classes of understory trees; and retain a variety of habitat types, including large and small patches of shrubby species, small trees, dense patches of conifers, and existing open areas and canopy openings.
- 5. Leave Himalayan blackberry patches along streams for wildlife cover and foraging.
- 6. Protect the mitigation area streams (including ephemeral headwater reaches) and riparian habitat (including Himalayan blackberry scrub) as Environmentally Sensitive Areas during construction and fuels management activities.
- 7. Construct trails away from stream corridors and riparian vegetation.
- 8. Preserve large standing dead trees and leave some large logs on the ground.
- 9. Remove and control existing medium to large Scotch broom infestations from the forest understory.
- 10. Implement measures to minimize the introduction of new weed species or the spread of weeds into new areas on infested vehicles and equipment.

*Timing:* Prior to finalization of grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

Mitigation Measure 4K. Educate Residents and Guests on Oak Habitat Management (Oak Habitat Management Plan): On an ongoing basis following approval of the Comprehensive Master Plan, the applicant shall implement the following:

- 1. Educate residents about the goals and objectives of the Oak Habitat Management Plan.
- 2. Enforce dog leash policy and requirements to discourage wildlife from garbage feeding.
- 3. Educate residents about permitted and prohibited activities in mitigation areas and infill areas.
- 4. Encourage residents' participation in the management of oak mitigation areas and commons.
- 5. Educate residents in oak woodland management for maintaining the health of adjacent oaks, managing for fire-safety, and minimizing disturbance to wildlife.

Timing: On an ongoing basis

**Reporting:** Enforced through code compliance process **Responsible Agency:** Planning Department and Code Compliance Division

Mitigation Measure 4L. Preserve the Oak Habitat Mitigation Areas in Perpetuity (Oak Habitat Management Plan): Prior to issuance of any grading or building permits, the applicant shall designate 54 acres of oak mitigation areas as identified in the Oak Habitat Management Plan as non-disturbance and non-buildable areas on the Comprehensive Master Plan, with a note that these are areas are to be preserved in perpetuity. No uses requiring grading or building permits shall be allowed within these areas. Commercial harvesting may not occur in the Oak Mitigation Areas (except as forest products are produced in the course of performing prescribed mitigation treatments) and will be guided only by the overall goals listed in the Oak Habitat Management Plan (Beedy 2016). This condition shall run with the land and shall be noted on the face of the final approved Comprehensive Master Plan map and within the Comprehensive Master Plan narrative.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

5. <u>CULTURAL RESOURCES</u>: To offset the potential impacts to cultural resources associated with the project, the following mitigation measures shall be required:

Mitigation Measure 5A. Halt Work and Contact the Appropriate Agencies if Human Remains or Cultural Materials Are Discovered during Project Construction: All equipment operators and persons involved in any form of ground disturbance at any phase of project improvements shall be advised of the possibility of encountering subsurface cultural resources. If such resources are encountered or suspected, work shall be halted immediately within 200 feet of the suspected resource and the Nevada County Planning Department shall be contacted. A professional archaeologist shall be retained by the developer and consulted to access any discoveries and develop appropriate management recommendations for archaeological resource treatment. If bones are encountered and appear to be human, California Law requires that the Nevada County Coroner and the Native American Heritage Commission be contacted and, if Native American resources are involved, Native American organizations and individuals recognized by the County shall be notified and consulted about any plans for treatment. A note to this effect shall be included on the grading and construction plans for each phase of this project.

Timing: Prior to issuance of the grading and improvement permits

**Reporting:** Agency approval of permits

**Responsible Agency:** Planning Department

6. <u>GEOLOGY/SOILS</u>: To offset the potential geology and soils impacts associated with project, the following mitigation measures shall be required:

Mitigation Measure 6A: Implement the Recommendations of a Geotechnical Evaluation for Project Grading and Structural Work: Prior to issuance of grading, improvement, and building permits, a design-level geotechnical report shall be prepared by a licensed engineer and submitted to Nevada County and recommendations therein followed for all subsequent grading and structural work. The final report shall provide recommendations that ensure that any highly erodible soils, if present, are accounted for in the grading design and structural specifications for the site. Performance standards shall include the following:

- 1. All grading and structural work shall meet the performance standards of applicable CBC regulations;
- 2. Construction methods shall be used which minimize risks to structures and do not increase the risk to the site, or to adjacent properties and their structures, from the geologic hazard;
- 3. Development shall not increase instability or create a hazard to the site or adjacent properties, or result in a significant increase in sedimentation or erosion;

- 4. Site planning shall minimize disruption of existing topography and vegetation;
- 5. Excavation and grading shall be minimized to the greatest extent practicable; and
- 6. Any limitations to site disturbance, such as clearing restrictions, imposed as a condition of development approval shall be marked in the field and approved by the county prior to undertaking the project.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Approval of permits *Responsible Agency:* Building Department

**Mitigation Measure 6B: Prepare and Implement an Erosion and Sediment Control Plan.** Prior to issuance of grading and improvement permits for all project-related grading, said permits or plans shall incorporate, at a minimum, the following erosion and sediment control measures:

- 1. During construction, Best Management Practices (BMPs) for temporary erosion control shall be implemented to control any pollutants that could potentially affect the quality of storm water discharges from the site. A Storm Water Pollution Prevention Plan (SWPPP) shall be prepared in accordance with California State Water Resources Control Board (SWRCB) requirements. This SWPPP includes the implementation of BMPs for Erosion Control, Sediment Control, Tracking Control, Wind Erosion Control, Waste Management and Materials Pollution Control.
- 2. If applicable, topsoil shall be removed and stockpiled for later reuse prior to excavation activities. Topsoil shall be identified by the soil-revegetation specialist who will identify both extent and depth of the topsoil to be removed.
- 3. Upon completion of grading, stockpiled topsoil shall be combined with wood chips, compost and other soil amendments for placement on all graded areas. Revegetation shall consist of native seed mixes only. The primary objectives of the soil amendments and revegetation is to create site conditions that keep sediment on site, produce a stable soil surface, resist erosion and are aesthetically similar to the surrounding native forest ecosystem.

4. Geo-fabrics, jutes or other mats may be used in conjunction with revegetation and soil stabilization. *Timing: Prior to issuance of grading and improvement permits Reporting: Approval of grading and improvement permits Responsible Agency: Building Department* 

**Mitigation Measure 6C: Limit the Grading Season.** Grading plans shall include the time of year for construction activities. No grading shall occur after October 15 or before May 1 unless the Chief Building Inspector or his/her authorized agent determines project soil conditions to be adequate to accommodate construction activities. This condition shall be noted on all grading plans.

*Timing:* Prior to issuance of grading permits *Reporting:* Approval of grading permits *Responsible Agency:* Building Department

**Mitigation Measure 6D: Physically Close any Encountered Mine Features.** Mining features such as open or partially-collapsed shafts, tunnels or pits may present physical hazards and may not be suitable for support of structures, roads or other improvements. Therefore, if mining features are encountered near proposed development areas, they shall be physically closed in accordance with recommendations developed as part of a design-level geotechnical investigation, which may include recommendations for shallow mining excavations such as excavation to reveal the underlying, competent native soil and rock, and then backfilling with engineered fill; and for deeper features, plugging with concrete or foam in accordance with an engineered plan and under the oversight of the local building department.

*Timing:* If encountered during construction *Reporting:* Agency approval of permits *Responsible Agency:* Environmental Health Department **Mitigation Measure 6E: Characterize the Chemical Properties of any Encountered Mine Waste.** Mine waste (including soil and rock in exploratory spoils piles, mine waste rock, and processed mine tailings) may contain heavy metals and metalloids such as mercury, lead and arsenic that present a health hazard in the case of dust inhalation, ingestion or dermal contact. Therefore, if mine waste is encountered, soil sampling and analysis shall be conducted to determine whether the mine waste presents a potential health risk. Exposure to mine waste shall be avoided, and mine waste shall not be disturbed without prior permitting and approval of the Nevada County Environmental Health Department (NCDEH). If mine waste is found to present a potential health risk, neutralization, removal, or encapsulation shall be conducted as determined appropriate by NCDEH, to levels that do not represent a potential health or other environmental risk.

*Timing:* If encountered during construction *Reporting:* Agency approval of permits *Responsible Agency:* Environmental Health Department

**Mitigation Measure 6F: Minimize Impacts to Steep Slopes.** The following mitigation measures shall be implemented for disturbance of all slopes 30 percent and greater, according to the timing noted in each item. The following shall also be shown as notes on all grading and improvement plans:

- 1. Soil disturbance is strictly prohibited within steep slopes during the wet season, between October 15 and April 15 of each year.
- 2. Roadway fills shall be compacted to minimum 90 percent relative compaction and surfaced with 4 inches aggregate base (or asphalt if over 16 percent grade). Roadside ditches shall be lined with 8 inches minus riprap in areas over 12 percent slope.
- 3. Best management practices shall be used for site development. Soil disturbance to graded areas shall be limited. Sediment traps such as straw bale barriers or fiber rolls shall be properly installed downhill of soil disturbance areas. The applicant shall implement periodic cleanup of work areas. All sediment devices shall be maintained until a vegetative ground cover is established.
- 4. A fiber roll or barrier (or a row of straw bales) shall be installed on an even contour (barrier may be staggered with about 5 feet of horizontal overlap) as close to the limit of activity as practical (the road area plus about 10 feet for circulation and access, plus any additional length to stay on an even contour). The erosion barrier shall be located on the fall line downhill from the construction activity and shall be wider than the construction area by about 5 feet.
- 5. Both temporary and permanent erosion control measures shall be used. Vegetative ground covers shall be established on all disturbed areas prior to October 15 of each year. A minimum of 10 pounds per acre of creeping wild rye (*Leymus triticoides*), California brome (*Melica californica*), red fescue (*Festuca rubra*), and California melic (*Melica californica*) shall be applied, and cover shall be watered until established. Seed shall be reapplied as necessary to establish a cover for disturbed areas, and the ground cover shall be maintained on a permanent basis.
- 6. The applicant shall inspect erosion control measures on a regular basis and after the first rains and shall remedy any areas which develop erosion by appropriate measures as listed in this mitigation measure.
- 7. Interceptor drains with 8 inches minus riprap lining shall be incorporated above all cut and fill slopes where the ditch slope is 12 percent or greater, to direct drainage around such slopes.
- 8. All slopes created shall be 2:1 or less in steepness.
- 9. Road cross slope shall direct runoff away from fill slopes.
- 10. In areas of 30 percent slope disturbance, it may be necessary to reduce the slope height by using a retaining wall. This will be determined on a case-by-case basis with an onsite inspection by the project engineer to make the final determination.

11. Construction shall be completed within 24 months.

*Timing: Prior to issuance of grading and improvement permits* 

Reporting: Approval of grading and improvement permits

#### **Responsible Agency:** Building Department

7. <u>GREENHOUSE GAS EMISSIONS</u>: For construction impacts, see Mitigation Measure 3A. To reduce long-term operational impacts related to GHG emissions, the following mitigation measure shall be required:

**Mitigation Measure 7A. Provide Energy-efficient Utilities:** Residential improvement plans shall include documentation that they comply with the following measures prior to issuance of building permit:

- 1. The project shall use energy efficient lighting (includes controls) and process systems beyond Title 24 requirements where practicable (e.g. water heating, furnaces, boiler units, etc.)
- 2. The project shall utilize water heating featuring low-NOx water heating burners if electric water heating is not used.
- 3. The project shall use energy efficient, automated controls for air conditioning beyond Title 24 requirements where practicable.

*Timing:* Prior to issuance of the residential building permits *Reporting:* Agency approval of building permits *Responsible Agency:* Northern Sierra Air Quality Management District

- 8. HAZARDS/HAZARDOUS MATERIALS: See Mitigation Measures 6D and 6E.
- **9.** <u>**HYDROLOGY/WATER QUALITY:**</u> See Mitigation Measures 4C, 4D, and 4F. To reduce additional impacts associated with increased stormwater runoff and the increased use of groundwater, the following measures shall apply:

**Mitigation Measure 9A. Avoid Increased Stormwater Runoff:** Prior to issuance of permits for each development area, the applicant shall provide a drainage report prepared by a registered civil engineer that demonstrates no net stormwater runoff from the proposed project. The drainage report shall include an analysis of net runoff from the project site and design for 1-year, 10-year, and 100-year storms. All stormwater drainage shall be designed by a registered civil engineer, and the designer shall utilize County standard plans and specifications. No additional net stormwater runoff offsite shall be permitted. *Timing: Prior to issuance of grading, improvement, and building permits Reporting: Permit approval* 

Responsible Agency: Nevada County Building Department

**Mitigation Measure 9B. Provide Adequate Water Supply for New Development:** Prior to issuance of building permits for each phase as specified below, the applicant shall provide adequate water storage and sustainable well capacity as required by State Waterworks standards. Storage and capacity requirements may change if system maximum daily demand (MDD)/unit changes.

- 1. The thresholds defined in Condition A.7 relate to three "phases" of development, which are defined herein for the purpose of water supply and demand monitoring. Phase 1 is defined as all development up until Threshold 1 is reached. Phase 2 is defined as all development up until Threshold 2 is reached. Phase 3 is defined as all development after Threshold 2 up to full build out.
- 2. Prior to issuance of permits for each phase-threshold of development (defined as 36 new units per phasein Condition C.7), the applicant shall submit a plan check for the review and approval of the Environmental Health Department. Additional sources and/or storage shall not be connected to the potable water system without prior approval. The applicant shall demonstrate that the water system has sufficient source capacity and infrastructure to meet the storage/source requirements, including any dedicated fire storage requirements, prior to initiating development of the nexteach phase of the referenced project per CCR Title 22, Section 64554.

- 23. Prior to issuance of building permits for Phases 2\_and 3, the applicant shall provide monitoring data and documentation to the Environmental Health Department to demonstrate current water use and the resultant need for source capacity and storage required for buildout of that phase. The entire source capacity and storage required for the <u>next pPhase</u> will be permitted and added to the water system prior to occupancy of any building <u>included</u> in the <u>next pPhase</u>. If sufficient water supply does not exist for any units up to the maximum allowed in the respective phase, those units may not be constructed until such time as sufficient supply is permitted by the County.
- 34. The applicant shall keep all wells active, to potable water standards, and perform all the required water quality testing for each well that is used to demonstrate the source capacity for each phase of the project they are currently in and all prior phases.

*Timing:* Prior to issuance of building permits for each phase *Reporting:* Permit approval *Responsible Agency:* Nevada County Environmental Health Department

**Mitigation Measure 9C. Implement an Adaptive Groundwater Management Program:** An Adaptive Groundwater Management Program, as detailed in Section 6.4 of the Source Capacity Planning Study (Knibb 2014) shall be implemented during project operations to provide the data needed to prove adequate water supply prior to each phase of development and to provide adaptive measures as needed during project operations. Measures include the following:

- 1. Manage Monitoring:
  - a. Water levels shall be recorded via pressure transducers and dataloggers at least every 45 minutes (more frequently if warranted). Data from the transducers shall be downloaded at least monthly. In peak irrigation periods, from June 1 to October 31, data shall be downloaded more frequently (twice monthly to weekly), depending on the perceived need for closer monitoring.
  - b. Pumping volumes shall be measured daily at all operating wells.
  - c. Water samples shall be collected from each well and analyzed for general physical properties and mineral and inorganic constituents, as required by the California Department of Public Health for public domestic water supplies.
  - d. Precipitation shall be monitored from the Grass Valley climatological station, as well as from several local, unofficial sources.
  - e. Ananda shall consult annually with a certified hydrogeologist to verify the integrity of monitoring systems and equipment, and to analyze the data described above. The hydrogeologist shall identify trends and recommend adjustments to operating procedures, as needed, to ensure achievement of these goals.
  - f. Raw data shall be sampled for a variety of parameters, including maximum and minimum depthto-water in a 24-hour period, number of daily pumping cycles, recovery levels and rates between pumping cycles, and proximity of water levels to water-producing fractures. Water quality sampling results shall be reviewed for consistency with historical sampling at the same wells.
  - g. Data shall be presented graphically, when appropriate, to allow easy interpretation and comparison, including the display of historical data with current readings. A number of key parameters shall also be generated for each download period to allow a quick check on the water system as shown in sample hydrographs in Appendix 3 of the Source Capacity Planning Study.
  - h. All monitoring data shall be stored in digital files that are backed up to at least two locations.
- 2. Manage Groundwater Pumping:
  - a. Manage pumping to maintain water levels above the fractures identified in the well driller's report for each well. The initial goal for each well will be that the maximum depth-to-water is always at least five feet above a major producing fracture. This goal may be modified as more data becomes available for each well.
  - b. Manage pumping to ensure that recovery patterns and rates remain in the range observed in historical data, which have proven to be sustainable. Daily recovery levels (maximum water level measured in a 24-hour period) shall be compared with previously observed values of this

parameter for that date. Wells that lack historic data will be phased in gradually until a "normal" recovery range is established. In addition, each well shall periodically be taken out of service long enough to allow full water level recovery, while recovery levels and rates are monitored. Deviation from previously observed recovery rates and levels could signal the need for modification of the pumping regime. Pumping shall be managed so water level recovery stays within the ranges established for each well.

- c. Adjust pumping if monitoring shows that water levels have exceeded the depth-to-water threshold for a well, or a change is observed in the behavior or water quality of a well from historic patterns. Management options include redistributing pumping among the wells to reduce demand on the affected well and reducing system demand (for example, coordinating large irrigation uses to avoid unnecessary peaks in demand or instituting the drought contingency plan described below). If monitoring or onsite observations result in a significant change in water quality, water data shall be monitored more frequently until the affected constituents stabilize.
- 3. Manage Supply and Demand:
  - a. When or if additional source capacity is needed, Ananda shall shift summer irrigation demand from potable systems to other known but undeveloped or underutilized sources; and or develop new sources of supply.
  - b. The applicant shall track water consumption within the Village and use the data to manage demand (e.g., managing MDD and implementing drought contingency measures).
  - c. During times of drought, conservation measures shall be used as appropriate and when needed to manage groundwater supply.

# Timing: Ongoing Reporting: As needed Responsible Agency: Nevada County Environmental Health Department

12. <u>NOISE</u>: To offset potentially adverse noise impacts related to construction activities, the following mitigation measure is recommended:

**Mitigation Measure 12A. Limit Exterior Property Line Noise Levels to County Noise Standards:** Exterior property line noise levels generated by the approved discretionary uses shall not exceed the Rural standards of Section L-II 4.1.7 of the Nevada County Land Use and Development Code at the time of the given noise generation. This condition shall be enforced through a complaint-driven process through the Nevada County Code Compliance Division.

*Timing:* During project operation *Reporting:* As needed *Responsible Agency:* Nevada County Code Compliance

**Mitigation Measure 12B. Limit Construction Activities to Reduce Noise Impacts:** Hours of operation for construction activities shall be limited to the hours of 7 a.m. to 7 p.m. Monday through Saturday. These limited hours of operation shall be noted on all grading, improvement, and construction plans, which shall be reviewed and approved by the Planning Department prior to permit issuance.

Timing: Prior to issuance of grading, improvement, and building permits

**Reporting:** Permit issuance

Responsible Agency: Nevada County Planning Department

17. <u>UTILITIES/SERVICE SYSTEMS</u>: To offset potentially adverse impacts related to construction waste, the following mitigation measure is recommended:

Mitigation Measure 17A. Appropriately Dispose of Vegetative and Toxic Waste: Neither stumps nor industrial toxic waste (petroleum and other chemical products) are accepted at the McCourtney Road transfer station and if encountered, shall be properly disposed of in compliance with existing regulations

and facilities. This mitigation measure shall be included as a note on all grading and improvement plans, which shall be reviewed and approved by the Planning Department prior to permit issuance. *Timing: Prior to issuance of grading and improvement permits* 

**Reporting:** Agency approval of permits and plans

Responsible Agency: Nevada County Planning Department

18. <u>MANDATORY FINDINGS OF SIGNIFICANCE</u>: To offset potentially adverse impacts to aesthetics, agricultural/forestry resources, air quality, biological resources, cultural resources, geology and soils, greenhouse gas emissions, hazards and hazardous materials, hydrology and water quality, noise, and utilities/service systems, see Mitigation Measures 1A, 3A-3D, 4A-4L, 5A, 6A-6F, 9A-9C, 12A-10B, and 17A.

## **INITIAL STUDY AND CHECKLIST**

## **Introduction**

This checklist is to be completed for all projects that are not exempt from environmental review under the California Environmental Quality Act (CEQA). CEQA requires a brief explanation for answers to the Appendix G: Environmental Checklist except "No Impact" responses that are adequately supported by noted information sources. Answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts. This Initial Study uses the following terms to describe the level of significance of adverse impacts. These terms are defined as follows.

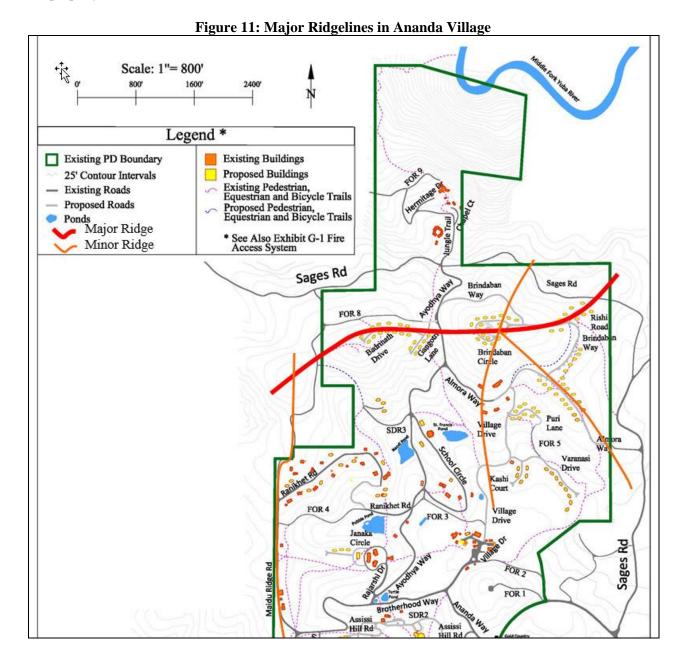
- No Impact: An impact that would result in no adverse changes to the environment.
- Less than Significant Impact: An impact that is potentially adverse but does not exceed the thresholds of significance as identified in the impact discussions. Less than significant impacts do not require mitigation.
- Less than Significant with Mitigation: An environmental effect that may cause a substantial adverse change in the environment without mitigation, but which is reduced to a level that is less than significant with mitigation identified in the Initial Study.
- **Potentially Significant Impact**: An environmental effect that may cause a substantial adverse change in the environment; either additional information is needed regarding the extent of the impact to make the significance determination, or the impact would or could cause a substantial adverse change in the environment. A finding of a potentially significant impact would result in the determination to prepare an EIR.

The baseline conditions for this Initial Study include all uses that have already been approved under previous permits for the site. Not covered under the existing 1990 CMP but that will be evaluated in this Initial Study include uses and events at the amphitheater and Crystal Hermitage (commercial wedding events and tulip festival), and special events at the village green in the Village Center and temple.

# 1. <u>AESTHETICS</u>

**Existing Setting:** Ananda Village is located on the San Juan Ridge, a rural area of the County developed largely with rural residential and agricultural uses. While the Village contains many types of uses – including residential, commercial, industrial, school, agricultural uses, open space areas, and active and passive recreational uses – it is predominately a pastoral setting with open grasslands, managed oak woodlands and forest, and clustered developed areas on gentle to moderate slopes. Developed areas are

buffered from immediately adjoining uses by the surrounding undeveloped acreage. Adjacent land uses are rural residential and non-irrigated pasture. A small Bureau of Land Management parcel abuts the eastern boundary of the project, and Tahoe National Forest lands adjoin the northern boundary in the Middle Yuba River canyon. The 706-acre project area is dominated by four primary plant communities: black oak woodland (237 acres); mixed conifer-hardwood forest (123 acres); open annual grasslands (97 acres); and ponderosa pine (64 acres). Also present are several ponds, seep-fed wetlands, riparian vegetation, and seasonal streams (Beedy 2014a). Figure 11 identifies the general locations of ridgelines on the property.



Ananda Village stretches from Tyler Foote Road on the south at an elevation of approximately 2,200 feet to the top of the Middle Yuba River canyon at the north, at an elevation of approximately 2,900 feet. The 706-acre project site contains a predominant ridgeline trending east to west across the rim of the canyon, which is a part of the San Juan Ridge, as well as several smaller north-south ridges running from the peaks along the canyon ridge south down the site. From these ridges the Sierra crest can be seen to the east, and

the foothills and Central Valley to the west. To the north across the Middle Yuba River canyon the land rises to Lohman Ridge in Yuba County approximately 2.5 miles away. To the south the land drops off to Shady Creek and rises again to Montezuma Ridge at approximately 2,900 feet elevation, 2 miles to the south. Approximately 6.5 miles south of the project site is Harmony Ridge at approximately 3,400 feet elevation. Various peaks are also present in these areas.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Have a substantial adverse effect on a scenic vista or views open to the public?		$\checkmark$			A, D
b. Substantially damage scenic resources, including but not limited to trees, rock outcroppings, and historic buildings within a state scenic highway?				$\checkmark$	A, D
c. Substantially degrade the existing visual character or quality of the site and its surroundings?		$\checkmark$			A, D
d. Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?		$\checkmark$			A, D

*Impact Discussion 1a,c,d:* The vast majority of Ananda Village development as it exists today is not visible from offsite locations with the possible exception of the Crystal Hermitage which is on a north-facing slope on the south side of the Middle Yuba River canyon. All proposed development is at least 100 feet from its boundaries. As shown in Figure 11, major ridgelines in the Village run east to west along the rim of the Middle Yuba River, through APNs 61-210-20, 61-210-19, and 61-240-02 (through proposed residential clusters N, M and O, respectively); north to south along Maidu Ridge Road along the western boundary of 61-240-33 and 61-180-02; north to south through APN 61-210-19 and 61-240-35 (through proposed residential cluster M and existing residential cluster B); and northwest to southeast through APN 61-210-19 and 61-210-20 (from proposed residential clusters M to L). As noted in the project description, residential sites were selected based on a number of criteria, one of which was southerly orientation in order to provide solar access. As a result, Clusters M, N, O, and to a lesser extent, L, are placed on the Middle Yuba River canyon ridgeline, and may have visibility to and from Montezuma Ridge and Harmony Ridge. Although views would be distant and filtered through surrounding trees, the implementation of standards relating to lighting, design, and minimization of clearing for views, would help to reduce any potential impacts. These standards are included in Mitigation Measure 1A below.

Maidu Ridge Road has panoramic views to the west and east, and is currently used as a vista point for visitors, residents, and neighbors, with benches installed along the road. To preserve these views the Expanding Light temple would not be placed on Maidu Ridge Road as previously proposed, but has been moved to the edge of a meadow at the existing Expanding Light retreat area, where it would be well buffered from offsite locations. New residential development such as at Clusters M and L may be visible from Maidu Ridge Road, but with the implementation of Mitigation Measure 1A below which would reduce nighttime lighting impacts, minimize viewshed clearing, and blend building colors with the natural environment, this impact is considered less than significant.

Light and glare impacts from future residential development may include daytime reflection from windows or nighttime illumination from residential exterior lighting. The project does not propose the use of any street lights, but exterior lights are proposed on new non-residential buildings for safety and security reasons. According to the submitted lighting plan, new non-residential lights are proposed consistent with existing non-residential lights, which includes soffit-mounted down lighting, embedded and shielded lighting, and security lighting. Section L-II 4.2.8 of the Nevada County Zoning Code outlines standards for exterior lighting, requiring that exterior lighting be shielded and directed downward to

prevent visibility of lights offsite and to prevent light pollution (Nevada County 2016). Compliance with these standards for both non-residential and residential development, which is located on ridges within the property, would reduce impacts associated with the visibility of offsite lighting to a less than significant level and is included in Mitigation Measure 1A.

All development, both residential and non-residential, would be landscaped and subject to design guidelines. Ananda's development is generally internally consistent and relatable within the community, with similar design features, signage, landscaping, and lighting throughout the development. In anticipation of the CMP update, Ananda hosted a series of design charrettes for community members, during which key values and goals were identified. Goals related to aesthetics included preserving a natural setting, creating a visually pleasing environment, minimizing impacts to views and view corridors, buffering impacts to neighbors and neighbors' impacts on the Village, providing public space to welcome visitors and support businesses, and protecting the privacy of residential uses. Design guidelines were then developed in support of these goals, and include the following:

- Limit the height of residences to two stories
- Locate residences outside of major circulation corridors
- Use common architectural features and finishes to unify building clusters
- Situate residences to open onto common space
- Make access and entries to residential areas easily identifiable
- Protect proximate view corridors for residences
- Orient residences south to maximize solar heating while minimizing summer solar gain from the east and west
- Provide for simple designs over complex ones to support affordable housing
- Discourage lawns and encourage native and drought-tolerant plants
- Use fences only to protect vegetable gardens and flowers
- Focus outside lighting to prevent light spill to open space areas

With the implementation of these and additional measures described in Mitigation Measure 1A below, the project's visual impacts would be reduced to a level that is *less than significant with mitigation*.

*Impact Discussion 1b:* The project site is not visible from State Route (SR) 49, approximately 5 miles west of the project site. SR 49 is not designated as a scenic highway. The project would therefore have **no** *impact* on a state scenic highway.

**Mitigation Measures:** To offset the potential impacts to visual resources associated with the project, the following mitigation measures shall be required:

Mitigation Measure 1A. Add Visual Resource Protections to the Comprehensive Master Plan **Design Guidelines:** Prior to issuance of any grading or improvement permits, the following shall be added to the Comprehensive Master Plan Design Guidelines to provide visual resource protections:

1. All outdoor light fixtures for both residential and non-residential uses shall be fully shielded and downward-facing to prevent the light source or lens from being visible from offsite properties and roadways. Fixtures shall have high-efficiency lamps. Mercury vapor light fixtures, floodlights and spotlights shall be prohibited. Lighting shall be turned off between 11 p.m. and sunrise except for the following: security lighting which operates with the use of motion or heat sensors, those businesses operating during these hours, and lighting at the Village Center and Rajarshi Park which has a demonstrated safety and security need. Security lighting fixtures shall be shielded and aimed so that illumination is directed only to the designated area. Improvement plans for non-residential structures shall depict the location, height and positioning of all light fixtures and shall provide a description of the type and style of lighting proposed.

- 2. Residential buildings within Clusters L, M, N, and O shall be subdued earth tone colors. High visibility or reflective colors and materials, such as bright white body color or shiny metal roofing, are prohibited.
- 3. Non-residential buildings (with the exception of the new temple) shall be subdued colors similar to the tones found on nearby buildings. High visibility or reflective colors and materials are prohibited.
- 4. Clearing of trees for building site views shall be limited to a 30-degree corridor as measured from the edges of the building.

The Final Comprehensive Master Plan and Design Guidelines shall be kept on file in the Planning Department for future reference in site plan reviews.

Timing: Prior to issuance of grading and improvement permits

**Reporting:** Revision of CMP and Design Guidelines prior to approval of any permits **Responsible Agency:** Planning Department

## 2. <u>AGRICULTURAL/FORESTRY RESOURCES</u>

**Existing Setting:** The project site is predominantly zoned AG-PD-SP, with one 9-acre area of PD-SP for industrial and manufacturing uses and one 3-acre C1-PD-SP area. Agricultural uses include livestock and poultry keeping, and farming to provide food and fiber sources within the community. Livestock include a herd of approximately 45 goats used for brush clearing on 140 acres and 8 dairy cows pastured on 25 acres. Fenced and irrigated farming occurs on over 10 acres onsite within Ananda Farms, Prana Gardens CSA, and Ananda Permaculture, and another 4 acres of individual gardens also produce food for community members. Annually, over 30,000 pounds of fruits, nuts, and vegetables are produced with an organic certification. Agricultural activities take place in areas that were historically farmed. Most of the site is designated as Grazing Land by the Resources Agency, with a small amount of Locally Important Farmland on the eastern boundary that is attached to the adjoining parcel, and Urban and Built-up Land at the Village Center. Williamson Act contracts do not exist on the property. The site contains 237 acres of black oak woodland, 123 acres of mixed conifer-hardwood forest, 97 acres of open annual grasslands, and 64 acres of ponderosa pine forest. Ananda has a certified Forest Management Plan to manage forest-related issues.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?			~		A, D, 57
b. Conflict with existing zoning for agricultural use, or a Williamson Act contract?				$\checkmark$	А
c. Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resource Code section 12220(g)), timberland (as defined by Public Resources Code section 4526), or timberland zoned Timberland Production (as defined by Government Code section 51104(g))?				~	А
d. Result in the loss of forest land or conversion of forest land to non-forest use?		$\checkmark$			A, 8, 64

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
e. Involve other changes in the existing environment, which due to their location or nature, could result in conversion of Farmland, to non- agricultural use or conversion of forest land to non- forest use?			$\checkmark$		A, D, 57

Impact Discussion 2a,e: A 22.5-acre area of Locally Important Farmland is situated on the eastern boundary, with the vast majority of that area offsite. Approximately 3.3 acres in the Locally Important Farmland designation (within proposed residential cluster L) is proposed to be converted to residential development. Nevada County recently amended its definition of Locally Important Farmlands to include only certain soil types which are not mapped within the Locally Important Farmlands on the project site. This new ordinance will take effect on February 23, 2017. Furthermore, in 2013, then-Agricultural Commissioner Jeff Pylman made a formal determination that an Agricultural Management Plan was unnecessary for the property because the area of Locally Important Farmland is "sloped, forested, and has thick vegetation in certain parts." Areas proposed for development within Locally Important Farmland are within the Horseshoe Gravelly Loam 9 to 15 percent slopes and Josephine Loam 9 to 15 percent slopes. According to the Soil Survey of Nevada County, Horseshoe Gravelly Loam 9 to 15 percent slopes is used mostly for timber production, grazing, and dry pasture. Josephine Loam 9 to 15 percent is used for timber production, limited grazing, and some pasture. Other soil types on the property, including Josephine Loam 15-30 percent slopes, Musick Sandy Loam 15-50 percent slopes, Hoda Sandy Loam 15-50 slopes, also have timber production and pasture/grazing capability. Alluvial Land Clayey in the southern area is used for pasture and range. The soil types across the property, whether within designated Grazing Land or Locally Important Farmland, support the same types of agricultural uses. The project would not prevent agricultural uses from continuing on the property, but instead have the potential to support the expansion of agricultural activity as residential uses increase and food and fiber demand grows. Given these facts, this impact is considered *less than significant*.

*Impact Discussion 2b:* There are no Williamson Act contracts associated with the subject property. There would therefore be *no impact* related to Williamson Act contracts from the proposed project.

*Impact Discussion 2c:* There is no forest- or timberland-zoned property within the project site, nor is any proposed. There would therefore be *no impact* related to forest zoning.

*Impact Discussion 2d:* The subject property contains mixed conifer-hardwood forest, oak woodlands, and ponderosa pine forest (Beedy 2014a). According to the Oak Habitat Management Plan prepared for the project, development of the project would result in temporary and permanent impacts to 34 acres of black oak woodlands, including 21 acres of impacts from new residential and non-residential construction and attendant infrastructure; 4 acres of infill in already developed oak woodlands; and 9 acres of leach field construction in oak woodlands. The Oak Habitat Management Plan provides mitigation measures to reduce and compensate for impacts, with the preservation, enhancement, and restoration of up to 39 acres of oak woodlands. The applicant proposes to place 54 acres of oak woodlands into a permanent non-disturbance area, and would restore the appropriate amount of acreage depending on the ultimate amount of impacts, as discussed in the Biological Resources section of this Initial Study. Areas of restoration are fire-affected areas that will be enhanced for increased habitat values and the promotion of old-growth conditions. Mitigation Measures 4I-4L outline the requirements of the Oak Habitat Management Plan in more detail.

In addition, in 1996 a Forest Stewardship Plan was prepared for the property, and in 2013 a California Cooperative Forest Management Plan was prepared by Registered Professional Forester Kevin Whitlock for the management of all forest and woodland types on the property. This plan, though not required for the current application, was adopted by the Ananda community. Its function is to outline the conditions and capability of property resources, document the landowner's objectives and decisions, and identify potential resource improvement projects. The Forest Management Plan is used as both an educational and a planning document, in addition to meeting the requirement for many grants and other funding available through CalFire, Natural Resource Conservation Service, US Forest Service, and the American Tree Farm Association. It contains provisions for fuels management, fire preparedness, enhancement of old growth characteristics and preservation of habitat, noxious weed control, and long-term sustainability of timber production; soil conservation, and erosion control from topsoil disturbance and road cuts; and subsequent control of sedimentation into nearby drainages and waterways. Ongoing implementation of the Management Plans would enhance forest, aquatic, and riparian habitat and the long-term viability of forest stands on the property through implementation of weed control, thinning, and fuels reduction measures. Ananda Village and previous owners have also previously carried out three approved Timber Harvest Plans over 190 acres onsite and has identified areas for continued forest management for timber production on APNs 61-170-23 and -34; 61-180-02; 61-210-04, -19, -20; 61-230-06; and 61-240-02 and -36. According to the Biological Inventory prepared for the project, the mixed conifer-hardwood stands are in a generally healthy stand condition with few areas where overcrowding occurs. However, smaller, young conifers are beginning to emerge and over-top the stands of large-diameter oaks. In the identified oak mitigation areas, oaks habitat would be enhanced through selective thinning processes (Beedy 2014a).

With the implementation of the Oak Habitat Management Plan as required in Mitigation Measures 4I-4K and the California Cooperative Forest Management Plan, as well as the non-disturbance and restoration area for oak woodland as required in Mitigation Measures 4L, impacts related to the loss of forest land and conversion of forest land to non-forest uses would be *less than significant with mitigation*.

Mitigation Measures: See Mitigation Measures 4I-4L.

## 3. <u>AIR QUALITY</u>

**Existing Setting:** Nevada County is located in the Mountain Counties Air Basin. The overall air quality in Nevada County has improved over the past decade, largely due to vehicles becoming cleaner. State and Federal air quality standards have been established for specific "criteria" air pollutants including ozone, carbon monoxide, nitrogen dioxide, sulfur dioxide, lead, and particulate matter. In addition, there are State standards for visibility reducing particles, sulfates, hydrogen sulfide, and vinyl chloride. State standards are called California Ambient Air Quality Standards (CAAQS) and federal standards are called National Ambient Air Quality Standards (NAAQS). NAAQS are composed of health-based primary standards and welfare-based secondary standards.

Western Nevada County is Marginal Nonattainment for the 1997 ozone NAAQS, with a "Finding of Attainment" based on three years of "clean" data. The area is also Marginal Nonattainment for the 2008 ozone NAAQS and is Nonattainment for the ozone CAAQS. Most of western Nevada County's ozone is transported to the area by wind from the Sacramento area and, to a lesser extent, the San Francisco Bay Area. Ozone is created by the interaction of Nitrogen Oxides and Reactive Organic Gases (also known as Volatile Organic Compounds) in the presence of sunlight, especially when the temperature is high. Ozone is mainly a summertime problem, with the highest concentrations generally observed in July and August, especially in the late afternoon and evening hours.

Nevada County is also Nonattainment for the PM10 CAAQS, but Unclassified for the PM10 NAAQS due to lack of available recent data. The number after "PM" refers to maximum particle size in microns. PM10 is a mixture of dust, combustion particles (smoke) and aerosols, whereas PM2.5 is mostly smoke and aerosol particles. PM2.5 sources include woodstoves and fireplaces, vehicle engines, wildfires and open burning. PM10 sources include the PM2.5 plus dust, such as from surface disturbances, road sand, vehicle tires, and leaf blowers. Some pollen and mold spores are also included in PM10, but most are larger than 10 microns. All of Nevada County is Unclassifiable/Attainment for the PM2.5 NAAQS and Unclassified for the PM2.5 CAAQS.

Ultramafic rock and its altered form, serpentine rock (or serpentinite), both typically contain asbestos, a cancer-causing agent. Ultramafic rock and serpentine exist in several locations in Nevada County, mainly in the western half, but these geologic types are not located in the project area (California Department of Conservation 2016).

An evaluation of project impacts related to greenhouse gas emissions is provided in Section 7 of this Initial Study.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in substantial air pollutant emissions or deterioration of ambient air quality?		$\checkmark$			A, 11, 41, 55
b. Violate any air quality standard or contribute to an existing or projected air quality violation?		$\checkmark$			A, 11, 41, 55
c. Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is in non-attainment under an applicable federal or state ambient air quality standard (including releasing emissions that exceed quantitative thresholds for ozone precursors)?		~			A, 11, 41, 55
d. Expose sensitive receptors to substantial pollutant concentrations?		$\checkmark$			A, 13
e. Create objectionable odors, smoke, ash, or dust affecting a substantial number of people?		$\checkmark$			A, 11, 41, 55
f. Exceed any potentially significant thresholds adopted in County Plans and Goals?		$\checkmark$			A, 51, 52

*Impact Discussion 3a-c,e:* The California Emissions Estimation Model (CalEEMod) was used to estimate potential emissions associated with both construction and operation of this project.

<u>Construction Impacts</u>: Using the parameters specific to this proposed project, CalEEMod identified potential increases in the pollutants of concern during various stages of the construction phase of the project (CalEEMod Version 2013.2.2 2017, "Run 6 – All Construction"). The highest year of pollutant concentrations for any given stage of the project was used to determine whether the project would exceed NSAQMD thresholds.

Pollutant	Total Project Impact	Highest Annual Project Impact <sup>1</sup>	NSAQMD Threshold <sup>2</sup>
NOx	27.0004 tons	<b>10.74 ppd</b> ( <b>1.96 tpy</b> ) <sup>3</sup>	24-136 ppd <sup>3</sup>
ROG	26.4368 tons	36.00 ppd (6.57 tpy)	24-136 ppd
PM10	7.7450 tons	2.58 ppd (0.47 tpy)	79-136 ppd
СО	59.0296 tons	23.07 ppd (4.21 tpy)	N/A

Table 4: Project	<b>Construction Air</b>	<b>Quality Impacts</b>
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Notes:

1. A 6-year construction period was used in the CalEEMod analysis due to limitations in the model. The resultant annual impacts were divided by 3.33 to provide a 20-year buildout. The developer is seeking a 25-year buildout, so 20 years will provide a more conservative analysis.

2. These thresholds are "Level B" in NSAQMD's Guidelines. All projects require basic mitigations

under Level A, which is under 24 pounds per day of any pollutant shown above.

3. ppd = pounds per day, tpy = tons per year

As shown in Table 4, although all pollutant levels would increase with project construction, ROG is the only pollutant anticipated to exceed thresholds established by NSAQMD. ROG levels would be over the Level B threshold of 24 pounds per day (ppd) at 36 ppd, leading to an increase in ozone precursor emissions, for which the County is in nonattainment. These impacts are from combustible sources related to construction vehicles and equipment. The NSAQMD Guidelines recommend mitigation during the construction phase for projects exceeding Level B thresholds, including a requirement that construction equipment be supplied with Tier 1 engines or cleaner and a requirement for alternatives to open burning of cleared vegetation. These are outlined in Mitigation Measure 3A.

Although PM is not anticipated to exceed the per diem threshold adopted by NSAQMD, this constituent has been identified in Nevada County as exceeding ambient air quality standards and should be mitigated to the extent possible. Some PM is generated from combustible sources such as construction equipment (mitigated with Mitigation Measure 3A), while some PM is in the form of dust generated by grading and excavation, vegetation removal and construction activities. If improperly managed or controlled, the associated construction activities with this project may have the potential to produce offsite dust and smoke impacts depending upon the time of year and air conditions. The NSAQMD requires a Dust Control Plan to be approved by their agency for projects disturbing more than one acre. The Dust Control Plan would require measures that minimize dust, such as watering and covering stockpiled dirt, staging areas, and unpaved roads used during construction; limiting the speed of construction traffic; suspending Construction during excessive winds; and re-establishing groundcover as necessary. Mitigation Measure 3B requires that the applicant implement an NSAQMD-approved Dust Control Plan during construction to mitigate PM emissions.

<u>Operational Impacts</u>: Table 5 identifies operational impacts of the project. Various model runs for each use type were generated in CalEEMod and then aggregated to calculate total operational impacts. These runs accounted for operational emissions from residences, the new temple, new retreat facilities, new commercial- and planned development-zoned uses in the Village Center and Rajarshi Park, and attendance of events at the amphitheater and the Crystal Hermitage. To the extent possible, uses that are overlapping, such as the retreat center, were not duplicated in the emissions calculations. Operational impacts are shown in Table 5 below.

Pollutant	Residential Impacts	Temple Impacts	Retreat Impacts	Commercial and Industrial Impacts	Events Impacts	Total Impacts <sup>1</sup>	NSAQMD Threshold <sup>2</sup>
NOx	2.20 tpy	0.28 tpy	0.47 tpy	0.16 tpy	0.25 tpy	<b>18.41 ppd</b> (3.36 tpy)	24-136 ppd
ROG	12.80 tpy (70.14 ppd)	0.18 tpy	0.71 tpy	0.12 tpy	0.16 tpy	<b>76.49 ppd</b> (13.96 tpy)	24-136 ppd
PM10	5.13 tpy	0.09 tpy	0.26 tpy	0.11 tpy	0.08 tpy	<b>31.07 ppd</b> (5.67 tpy)	79-136 ppd
СО	35.05 tpy	1.29 tpy	1.75 tpy	0.72 tpy	1.14 tpy	<b>218.90 ppd</b> (39.95 tpy)	N/A

Notes:

Total impacts are shown in both pounds per day (ppd) and tons per year (tpy) using a simple conversion, with ppd highlighted to compare the impacts to the corresponding NSAQMD threshold.
 These thresholds are "Level B" in NSAQMD's *Guidelines*. All projects require basic mitigations under Level A, which is under 24 pounds per day of any pollutant shown above.

As shown in Table 5, long-term development and operation of the project site would create stationary sources air emissions (associated with the energy use, electricity, landscape equipment, etc.) and mobile source emissions (associated with vehicle trips to and from the stationary sources). Stationary source emissions include those associated with operation and maintenance of buildings and landscaping. Mobile source emissions are generated from new vehicle trips to and from the residential, retreat, commercial, planned development, and event uses. The only criteria pollutant exceeding the Level B threshold is ROG. For projects exceeding Level B thresholds, NSAQMD *Guidelines* recommend incorporating a mix of land uses to achieve a balance of commercial, employment, retail and housing options; providing neighborhood parks and trails to minimize vehicle travel to off-site recreational uses; and increasing densities to encourage transit use. The project is designed to meet all these parameters which will help to reduce long-term operational emissions. Gold Country Stage, the county's transit provider, does not currently operate a route past Ananda Village, but a dedicated bus stop is in place should a route become operational in the future. Additionally, Ananda Village has numerous solar fields to harvest solar energy, and will be installing another large solar project shortly. These facilities also serve to reduce long-term operational impacts of the project.

As noted above, although PM is not anticipated to exceed the per diem threshold adopted by NSAQMD, this constituent has been identified in Nevada County as exceeding ambient air quality standards. The most common source for PM10 violations during operations is from inefficient wood burning devices. The current California Building Code requires all new wood burning devices to be EPA Phase II certified or better, which includes pellet stoves, and this requirement would be implemented through Mitigation Measure 3D, which also includes additional wood-burning stove restrictions as recommended by the NSAQMD.

Although this project would increase emissions of criteria pollutants, with the mitigation identified in Mitigation Measures 3A through 3D below, impacts would be *less than significant with mitigation*.

*Impact Discussion 3d:* Onsite improvements would require grading and excavation of the interior road system and the installation of underground utilities. Serpentine soils or ultramafic rock are not mapped on the project site (California Department of Conservation, Division of Mines & Geology 2000) and there is a low probability of discovering them onsite (NSAQMD 2015). However, the NSAQMD requires notification in the event that ground disturbance yields serpentine, ultramafic rock or naturally occurring asbestos, as outlined in Mitigation Measure 3D. With implementation of this mitigation, this impact would be *less than significant with mitigation*.

*Impact Discussion 3f:* Nevada County's 1995 General Plan, Chapter 14 Air Quality Element, contains several policies to protect air quality in Nevada County. These policies are all part of NSAQMD's standard mitigation measures and have been included in Mitigation Measures 3A and 3B. Mitigation Measure 3C requires compliance with Rule 226, referred to in General Plan Air Quality Element Policy 14.7A, to control dust emissions during construction. The proposed development of the Project Area would therefore have an impact that is *less than significant with mitigation* with regard to Nevada County goals and policies.

**Mitigation Measures:** To offset the potential air quality impacts associated with the project construction activities, the following mitigation measures shall be required:

**Mitigation Measure 3A. Reduce Emissions during Construction:** The following measures shall be included as notes on all plans prior to issuance of all grading, improvement, and building permits. In addition to these measures, all statewide air pollution control regulations shall be followed, including diesel regulations (which may be accessed at www.arb.ca.gov/diesel/diesel.htm).

- 1. Alternatives to open burning of vegetative material shall be used to dispose of site-cleared vegetation. Among suitable alternatives are chipping, mulching, or conversion to biomass fuel.
- 2. Grid power shall be used (as opposed to diesel generators) for job site power needs where feasible during construction.
- 3. At least 50% of the mobile off-road construction equipment in use at any time on the project shall be equipped with Tier 1 engines (or cleaner).
- 4. All architectural coatings shall comply with the California Air Resources Board's 2007 Suggested Control Measure for Architectural Coatings (available at www.arb.ca.gov/coatings/arch/Approved\_2007\_SCM.pdf).
- 5. Construction equipment idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to 5 minutes (as required by the California airborne toxics control measure Title 13, Section 2485 of California Code of Regulations [CCR]) and all construction equipment shall also be maintained and properly tuned in accordance with manufacturer's specifications." Clear signage shall be provided for construction workers at all access points.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval grading, improvement, and building permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3B. Implement a Dust Control Plan:** Prior to issuance of any grading or improvement permits proposing disturbance of topsoil, the applicant shall submit a dust control plan for the review and approval of the Air Pollution Control Officer. For the purpose of this regulation, the disturbance of topsoil includes any clearing, grubbing or grading. The Dust Control Plan requirement shall be fulfilled by clearly phrased and enforceable conditions included on the project grading and improvement plans with their own descriptive heading, such as "Dust Control." The following set of dust control measures would constitute an approvable Plan:

- 1. The applicant (or other responsible party, which should be indicated) shall be responsible for ensuring that all adequate dust control measures are implemented in a timely manner during all phases of project development and construction.
- 2. All material excavated, stockpiled, or graded shall be sufficiently watered, treated, or covered to prevent fugitive dust from leaving the property boundaries and causing a public nuisance or a violation of an ambient air standard. Watering shall occur at least twice daily in active areas during dry weather, including once before initial morning disturbance.
- 3. All areas with vehicle traffic shall be watered or have dust palliative applied as necessary for minimizing dust emissions.
- 4. All on-site vehicle traffic shall be limited to a speed of 15 mph on unpaved roads.

- 5. All land clearing, grading, earth moving, or excavation activities on a project shall be suspended as necessary to prevent windblown dust from leaving the property boundary when winds are expected to exceed 20 mph.
- 6. All inactive portions of the development site shall be covered, seeded, or watered until a suitable cover is established. Alternatively, the applicant shall be responsible for applying County-approved non-toxic soil stabilizers (according to manufacturers' specifications) to all inactive construction areas (previously graded areas which remain inactive for 96 hours) in accordance with the local grading ordinance.
- 7. All material transported off-site shall be either sufficiently watered or securely covered to prevent public nuisance, and there must be a minimum of six (6) inches of freeboard in the bed of the transport vehicle.
- 8. Paved streets adjacent to the project shall be swept or washed at the end of each day, or more frequently if necessary to remove excessive accumulations of silt and/or mud which may have resulted from activities at the project site.
- 9. Prior to final occupancy, the applicant shall re-establish ground cover on the site through seeding and watering in accordance with the local grading ordinance.

*Timing:* Prior to issuance of grading or improvement permits *Reporting:* Approval of grading or improvement permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3C. Limit Wood Stoves:** The project shall include no more than one wood-fired heat source in any residential unit, which may be a pellet stove or an EPA-certified wood stove, and open fireplaces shall not be permitted within this project. Each residence shall also be equipped with a non-woodburning source of heat. This mitigation shall be implemented prior to the issuance of residential building permits.

*Timing:* Prior to issuance of residential building permits *Reporting:* Agency approval of building permits *Responsible Agency:* Northern Sierra Air Quality Management District

**Mitigation Measure 3D. Mitigate any Asbestos Discovered during Construction:** If serpentine, ultramafic rock or naturally occurring asbestos are discovered during construction or grading, the applicant shall notify the Northern Sierra Air Quality Management District within 24 hours and comply with specific requirements contained in Section 93105 of Title 17 of the California Code of Regulations. *Timing: During construction* 

**Reporting:** As needed

Responsible Agency: Northern Sierra Air Quality Management District

# 4. <u>BIOLOGICAL RESOURCES</u>

**Existing Setting:** Information for this section is based on the *Biological Inventory, Oak Habitat Management Plan*, and *Wetland Habitat Management Plan*, all prepared by Beedy Environmental Consulting and dated April 2014, as well as the California Red-Legged Frog Site Assessment prepared by Anne Wallace of Eco-Bridges Environmental dated August 2016.

Ananda Village is located on the San Juan Ridge near Cherokee and Badger Hill Diggings, between North San Juan and North Columbia. It is located within the Blind Shady Creek watershed of the Yuba River at an elevation of approximately 1,600 feet to 2,900 feet in the lower montane conifer zone. Adjacent land uses are low density residential and agricultural (dry grazing). A small Bureau of Land Management parcel abuts the eastern boundary of the project. Tahoe National Forest lands abut the 706-acre Village at the northern boundary in the Middle Yuba River canyon. In all of the areas where development is

proposed, slopes are gentle to moderate. The dominant soil types in the project area are well-drained, moderately to strongly acidic sandy loams in the Musick soil series, with 15-50 percent slopes (NRCS 2013). These are non-hydric soils are typically used for timber production or grazing. Soils in the east-central portion of the project area, and another area in the west-central portion are dominated by well-drained, very acidic sandy loams in the Hoda soil series (Hoda Sandy Loam 15-50 percent slopes). These are also nonhydric soils with timber production and grazing capability.

Existing residential, commercial, industrial, and agricultural development occurs in clusters throughout the property, but predominantly in the southern and central areas. No "blue line" features (indicating streams) are depicted on the Nevada City or Camptonville USGS topographic maps in the proposed development areas; however, two seasonal blue line streams are located in the southern and western portions of the Village, outside of the proposed new development or infill areas, and several "swales" consisting of drainage contours that were well vegetated with upland species are located throughout the site. Several ponds, seep-fed wetlands, and riparian vegetation also occur onsite outside the areas of proposed development.

Plant communities documented within the proposed development areas and road alignments include black oak groves, mixed conifer-hardwood forest, ponderosa pine forest, non-native annual grassland, and disturbed-ruderal areas. These plant communities are distributed across the 706-acre property as follows:

Black oak woodland	237 acres
Ponderosa pine forest	64 acres
Mixed conifer-hardwood forest	123 acres
Non-native annual grassland	97 acres
Disturbed-ruderal	72 acres
Other	113 acres
Total	593 acres

The "other" 113 acres consist of small patches of crop land and orchard, Himalayan blackberry scrub, interior live oak woodland, mixed oak-pine chaparral, perennial and seasonal pond and wetland, perennial grassland, riparian vegetation, scotch broom, and whiteleaf manzanita chaparral. Small patches of mixed willow riparian scrub and woodland and Himalayan blackberry-dominated scrubs occur just outside the development areas in the southeast portion of the Village. Non-native, invasive species such as Himalayan blackberry (Rubus discolor) and Scotch broom (Cytisus scoparius) occur in scattered dense stands in forest and woodland canopy openings, and in well-lit, open areas of the oak woodlands. Himalayan blackberry also dominates large portions of the seep-fed wetlands and swales. The noxious weeds yellow star thistle (Centaurea solstitialis) and goat grass (Aegilops triuncialis) are occasional in the open grassland areas. More information on the predominant habitat types in areas proposed for development is provided below:

<u>Black Oak Woodland</u>: Approximately 33 percent of the 706-acre project site contains black oak woodland. Total oak canopy cover in most groves is estimated at approximately 60-100 percent canopy closure. The shrub and herb understory is highly variable depending on how much light is available, how dry the site is, and the degree of disturbance or management of the understory. Characteristic species common to all settings include the shade-tolerant native species hoary honeysuckle (*Lonicera hispidula var. vacillans*), poison oak (*Toxicodendron diversilobum*), blue wildrye (*Elymus glaucus*), California brome (*Bromus carinatus*), and the non-native species hedge parsley (*Torilis arvensis*) and hedgehog dogtail (*Cynosurus echinatus*). At canopy openings and other clearings, deer brush (*Ceanothus intgerrimus*) and whiteleaf manzanita (*Arctostaphylos viscida*) are common. In canopy openings with a history of disturbance, the native mountain misery (*Chamaebatia foliolosa*) is present. In the developed stands, the overall tree size is conspicuously larger but the understory is sparse or absent.

<u>Ponderosa Pine Forest</u>: Ponderosa pine forests within the existing development areas are generally small stands with residences in the understory and a managed (cleared to some degree) shrub and herb layer. Narrow, linear pine-dominant stands also occur along drainages. The understory of the more open, disturbed, and early successional stands tend to be weedier, with a heavier component of the invasives Himalayan blackberry and Scotch broom. Dense, heavily shaded forest floors have a sparse to moderately dense understory of young oaks and conifers. Open stands, disturbed forest and forest edges are typically represented by deer brush or Himalayan blackberry, bracken fern (*Pteridium aqualinum var. pubescens*), and the common hoary honeysuckle, an escaped cherry rootstock (*Prunus avium*), and a variety of native and non-native herbs, such as California goldenrod (*Solidago californica*), pearly everlasting (*Anaphalis margaritacea*), and the non-natives hedgehog dogtail, hedge parsley, and Klamathweed (*Hypericum perforatum*).

<u>Mixed Conifer-Hardwood Forest</u>: The mixed conifer-hardwood forest occupies the northern portion of the property where it occurs on the cooler, moister, north-facing Middle Yuba River canyon slopes, and at the top of the ridge. The mixed conifer-hardwood stands are in a generally healthy condition with few areas where overcrowding occurs. Smaller, young conifers are beginning to emerge and overtop the stands of large-diameter oaks. The stand structure of the conifer overstory is variable, with intermixed patches of oaks, primarily tan oak (*Lithocarpous densiflorus*), black oak, and Pacific madrone, with some canyon live oak and bigleaf maple (*Acer macrophyllum*), and includes many larger diameter oaks than found in the oak-dominant stands mapped as "Black Oak Woodland." The conifer overstory is dominated by Douglas fir (*Pseudotsuga menziesii*) and incense cedar with some ponderosa pine and white fir (*Abies concolor*). The conifers range in size from 12-40 inches diameter, with most in the 18-28 inch size class. The understory is dominated by seedling and sapling conifers and oaks, predominantly shade-tolerant species such as deer brush (*Ceanothus integerrimus*), hoary honeysuckle and poison oak, with some white-barked raspberry (*Rubus leucodermis*) and Sierra gooseberry (*Ribes roezlii*).

<u>Non-native Annual Grassland</u>: These dry grasslands of predominantly non-native Mediterranean annual grasses occupy areas with a history of disturbance, generally areas of oak woodland or conifer forest cleared historically to create grazing areas. Annual grassland also occurs in the understory of open canopy woodlands, i.e., oak woodlands with a canopy density of a few percent to 20 or 30 percent. Examples of this type are found in portions of the development envelopes for clusters E and I. The dominant species of these habitats are overwhelmingly non-native; native wildflowers and grasses are sparse due to competition. Small to medium-sized infestations of the noxious weeds yellow star thistle (*Centaurea solstitialis*) and goat grass (*Aegilops triuncialis*) occur in many of the dry grassland areas.

<u>Disturbed-Ruderal</u>: This mapping unit includes previously developed areas, primary roads, landscaped areas, and actively farmed areas. Residential areas with a dense and well-developed tree canopy were mapped as woodlands and forests. Dominant and characteristic plants include ornamental plantings and non-native grasses and forbs such as hedgehog dogtail, ripgut, orchard grass, white clover, Klamathweed, English plantain (*Plantago lanceolata*), rough cat's-ear (*Hypochaeris radicata*), and the invasive noxious weed species yellow star thistle and goat grass, Scotch broom and Himalayan blackberry.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special-status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?		~			A, 7, 8, 9, 45, 62

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
b. Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Game or US Fish and Wildlife Service?		~			A, 7, 8, 9, 45, 62
c. Have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?		~			A, 7, 9
d. Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?		~			A, 17, 49
e. Conflict with any local policies or ordinances, or other approved local, regional, or state habitat conservation plan, protecting biological resources, such as a tree preservation policy or ordinance?		~			A, 51, 52
f. Introduce any factors (light, fencing, noise, human presence, and/or domestic animals), which could hinder the normal activities of wildlife?		$\checkmark$			A, 17, 49

*Impact Discussion 4a:* The project biologists—wildlife biologist Ted Beedy, botanist and wetlands specialist Carolyn Chainey-Davis, and biologist Anne Wallace—used several methodologies in preparation of the Biological Inventory. Pre-field investigations consisting of records and database searches were conducted to review existing information and prepare for fieldwork. Four field surveys were conducted, on January 3 and 4, February 18, and June 10, 2013.

### Special-Status Plant Species

Special-status plants identified as having moderate to high potential for occurrence based on at least marginally suitable habitat and/or nearby occurrences include True's manzanita (*Arctostaphylos mewukka* Merriam var. *truei* [W. Knight] P. Wells), Mexican mosquito fern (*Azolla microphylla* Kaulf.), thread-leaved beakseed *Bulbostylis capillaris* [L.] Clarke), Sierra sweet bay (*Myrica hartwegii* S. Watson), Butte County fritillary (*Fritillaria eastwoodiae*), Brandegee's clarkia (*Clarkia biloba ssp. brandeegeae*), and Humboldt lily (*Lilium humboldtii ssp. humboldtii*). However, these species were not found within the Master Plan Update project area and surveys were conducted at a time of year adequate for detecting these taxa, if present. Species with the highest potential to occur onsite are discussed further below.

### Sierra Sweet Bay

Sierra sweet bay blooms May to June in lower montane conifer forest, cismontane woodland, riparian forest, streambanks, and other moist place and is known in the vicinity at South Yuba River State Park. Sierra sweet bay is a California Native Plant Society (CNPS) List 4 plant but it is not protected under the state or federal endangered species acts. This species was not found, and the early June surveys were adequate to determine that this species was not present within the proposed development areas.

### Butte County Fritillary

Butte County fritillary blooms late March to early May in a wide variety of habitats and is known in the vicinity from an occurrence in montane hardwood forest near North Columbia. Butte County fritillary is a CNPS List 3 plant but it is not protected under the state or federal endangered species acts. This species was not found, and the late February and early June surveys were adequate to determine that no species in the genus Fritillaria were present within the proposed development areas.

### Humboldt Lily

Humboldt lily, another species known from the immediate vicinity, occurs in a variety of habitats and conditions, and blooms in early summer. Humboldt lily is a CNPS List 4 (watch list) species. Impacts to List 4 plants are generally not significant unless the species has suffered significant losses locally, or occurs on an unusual substrate or habitat type, and exhibits any unique morphology. The June 10, 2013, survey was adequate for determining the absence of this taxon within the Master Plan Update project area.

#### Brandegee's Clarkia

Brandegee's clarkia is known to occur in grassland habitats, and on sunny grassy slopes in canyons. Locally, it is most often found on the colluvium of road cuts and embankments that are uncompacted and only lightly vegetated. Brandegee's clarkia is known to occur in the Middle Yuba River canyon. It blooms in late May to early July. Although it is not state or federal listed, it is a CNPS List 1B (rare, threatened or endangered throughout their range), and impacts to such species are generally considered significant. Brandegee's clarkia was not found within the Master Plan Update project area during the early June surveys.

Other special-status plants known to occur in the project vicinity include Cantelow's lewisia (*Lewisia cantelovii*), brown-beaked rush (*Rhyncospora capitellata*), Mielichhof's coppermoss (*Mielichhoferia elongata*), Norris' beard-moss (*Didymodon norrisii*), red-anthered rush (*Juncus marginatus var. marginatus*), bog club-moss (*Lycopodiella inundata*), Scadden Flat checkerbloom (*Sidalcea stipularis*), Stebbins' morning-glory (*Calystegia stebbinsii*), or Pine Hill flannelbush (*Fremontodendron decumbens*). Suitable habitat is present for Scadden Flat checkerbloom outside the proposed development on the seepfed swales; however, there are no known occurrences within 25 miles of the project area. No suitable habitat is present in the proposed development areas to support the other rare and uncommon taxa listed above, which are endemic to gabbro soils in the Secca and Rescue soil series, which does not exist on the project site.

#### Special-Status Wildlife Species

Special status animals with potential, or known to occur at the Ananda property, include foothill yellowlegged frog (*Rana boylii*), Western pond turtle (*Actinemys marmorata*), northern goshawk (*Accipiter gentilis*), California spotted owl (*Strix occidentalis occidentalis*), Vaux's swift (*Chaetura vauxi*), Townsend's big-eared bat (*Plecotus townsendii pallescens*), and Yuma myotis (*Myotis yumanensis*).

#### Avian Species

The northern goshawk (Accipiter gentilis), California spotted owl (Strix occidentalis occidentalis), and Vaux's swift (Chaetura vauxi) are known to nest on or near San Juan Ridge, and have moderate to high potential to nest or forage in the project area. Both of these species are considered Bird Species of Special Concern in California. Raptor species such as red-tailed hawks, red-shouldered hawks, and Cooper's hawks could also nest in or near the project area. CDFW codes and the federal Migratory Bird Treaty Act also protect all migratory birds from harassment or harm and also protect their eggs and nestlings. Human

disturbance that causes nest abandonment and/or loss of reproductive effort is considered a "taking." Vegetation clearing and removal of trees, noise and human disturbance associated with heavy equipment use could directly or indirectly impact nesting raptors or migratory birds. During nesting season, direct impacts could include removal of occupied nest trees, and prolonged disturbances to nearby nesting sites could lead to nest abandonment. Any loss of fertile eggs, nesting raptors, or any activities resulting in nest abandonment would constitute a significant impact. Mitigation Measure 4A would therefore require preconstruction surveys to ensure this impact is less than significant.

#### **Bat Species**

The project area is within the ranges of the pale Townsend's big-eared bat (*Plecotus townsendii pallescens*), and Yuma myotis (*Myotis yumanensis*), both considered Mammalian Species of Special Concern in California. Habitat requirements, range and distribution of bat species in Nevada County and elsewhere in the state are generally poorly known, so little information exists on their potential occurrence of this species in the region. However, it is known that caves, old buildings, and tree cavities can provide habitat for these species. Because trees would be removed as part of this project, acoustical surveys would therefore be required prior to construction as shown in Mitigation Measure 4B, in order to reduce this impact to a less than significant level.

#### Aquatic and Amphibious Species

Western pond turtle (*Actinemys marmorata*), also a Species of Special Concern, has been observed regularly in the Ananda property ponds). They were not observed during the project surveys but are expected to occur. The foothill yellow-legged frog (*Rana boylei*), an Amphibian Species of Special Concern in California, is known to occur on the Middle Yuba River, and could possibly be present on the intermittent tributaries to Shady Creek on the Ananda Village property. Mitigation Measures 4C through 4E, which establish buffers around environmentally sensitive areas, implement best management practices for erosion and sedimentation control, and minimize impacts to wildlife and habitat values, would reduce impacts to Western pond turtle and amphibian species that may occur on the site.

While the federally threatened California red-legged frog (CRLF) (*Rana draytonii*) is not known to occur at or near Ananda Village, the property is located within its geographic range and has seven small to medium reservoirs that could potentially support breeding or non-breeding individuals. A Habitat Assessment for red-legged frog was prepared to provide the U.S. Fish and Wildlife Service (USFWS) with an assessment of habitat suitability and potential impacts to the CRLF of proposed new developments at Ananda Village. This Habitat Assessment was sent to the USFWS and CDFW in August 2016, and no response has been received to date. Potential habitat for CRLF at Ananda is in two basic types: swales, intermittent/ephemeral streams, seasonal wetlands, springs, and riparian areas, which may be used by CRLF when these features hold moisture, but are not suitable for breeding; and perennial ponds and reservoirs, which are suitable habitat for breeding habitat and seven reservoirs that provide open water, shoreline vegetation, and floating aquatic vegetation that would provide suitable breeding habitat. The reservoirs—St. Francis Pond, Incense Pond, Dairy Pond, Turtle Pond, Lotus Lake, Pubble Pond, and Nandi Pond—were constructed under the authorization of the State Water Resources Control Board and hold 72.5 acre-feet total.

As noted in the CRLF Habitat Assessment, Ananda Village has been developed and developing since the 1960s. Eight-five residential units (or 93 units if additional units being counted toward the total density are included) within six housing clusters, as well as 65,000 square feet of commercial and other non-residential uses already exist within a network of paved roads. Other developed uses onsite include a farm, a school, a retreat center, office buildings, and relatively extensive fuel-treatment zones for fire protection. Some of the ponds within the village are substantially drawn down over the course of the summer. Lotus

Lake receives a good deal of human foot traffic, with a 400-seat amphitheater that is used every Sunday during the summer. The Expanding Light Center around Lotus Lake offers a variety of residential retreats. Existing fire roads lie adjacent to the north side of Pubble Pond, the east side of Incense Pond, and the south side of Lotus Lake. Two paved roads pass within feet of Turtle Pond. A paved road that lies adjacent to Nandi Pond receives substantial traffic as described above. Within this context, the Habitat Assessment concludes that proposed developments and improvements occurring within 100 feet of non-breeding habitats and within 300 feet of breeding habitats represent relatively benign additions that will take place over an extended period of many years. Nonetheless, continued development in existing areas and development in new areas would increase long-term impacts to CRLF.

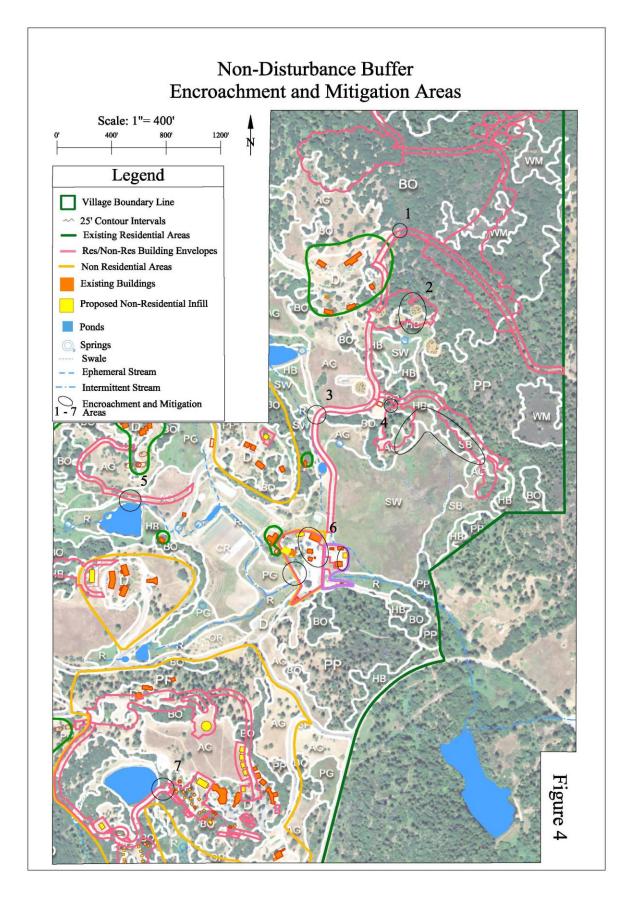
Four encroachments occur near non-breeding habitats as follows:

- 1. A proposed new road from the existing Almora Cluster B to proposed Cluster L will cross an upland swale. This corresponds to Buffer Encroachment Area 1 on Figure 12.
- 2. A proposed new road would cross an upland swale contour in Cluster K. This corresponds to Buffer Encroachment Area 2.
- 3. Portions of development Clusters I, J, and K will have driveways, roads, or houses within 100 feet of a seasonally wet meadow, shown as Buffer Encroachment Area 4.
- 4. Proposed developments within the Village Center commercial zone and within a proposed PD-SP zone adjacent to the commercial zone are within 100 feet of riparian and seasonal wetland areas. These correspond to Buffer Encroachment Area 6.

Impacts to non-breeding habitats as defined above would be less than significant with the application of Mitigation Measures 4C through 4F which require implementation of the Wetland Habitat Management Plan. These measures include establishing non-disturbance buffers and implementing BMPs during construction, enforcing the on-leash dog policy, and maintaining an educational program for visitors and residents which includes information on the risk to wildlife associated with pets. Additional mitigation for new development that is located within 100 feet of non-breeding habitat is provided in Mitigation Measure 4G in order to reduce impacts associated with CRLF movement through construction zones, roads, or developed areas during project operation. This mitigation includes contractor personnel training by a qualified biologist, pre-construction surveys, frog relocation, non-disturbance buffers, construction timing outside the wet season, and limiting construction vehicle speed.

Five encroachments into the 300-foot buffer of CRLF breeding habitat would occur as follows:

- 1. Incense Pond and wetland and riparian areas:
  - a. A portion of the existing road would be widened at the point where the road makes a 90degree turn to the east; this is within 100 feet of a wetland and riparian area (Buffer Encroachment Area 3) and just outside 300 feet of Incense Pond.
  - b. Village Drive will be re-graveled and a portion of it lies directly adjacent to Incense Pond.
- 2. <u>Pubble Pond</u>: Within 300 feet of Pubble Pond (roughly corresponding to Buffer Encroachment Area 5):
  - a. The fire road extension of Ranikhet Road that runs from the south end of Ranikhet cluster (cluster A) to Ayodhya Way will be widened. For a short section just west of the dam, this road passes within a 100 feet of the pond, passing as close as 20 to 30 feet from the north side of Pubble Pond.
  - b. Two new residences are proposed for the south end of Ranikhet Road north of Pubble Pond, replacing an existing residence that has structural issues and will be removed.
  - c. A new leach field is proposed between 200 and 300 feet southeast of Pubble Pond. It also lies just inside the 300-foot boundary.





- 3. <u>Lotus Lake</u>: Construction envelopes for a number of residential and non-residential structures around the Expanding Light site are within 300 feet of Lotus Lake (Buffer Encroachment Area 7), as are an existing fire road that will be upgraded and local camping areas that will be expanded. Structures include a single residence, up to six small cabins for guests, two shower houses, and a yoga hall. In addition, future plans include minor leveling to improve drainage, constructing low rock walls, and constructing a small gathering area defined by improved surface (flagstones, pavers, or compacted gravel), with benches and an open-roofed pergola.
- 4. <u>Nandi and St. Francis Pond</u>: A classroom and a residence are proposed for either side of School Circle within 300 feet of and between Nandi Pond and St Francis Pond. There is also a proposed residence in Ranikhet cluster (cluster west of Nandi Pond that is just inside the 300-foot buffer.
- 5. <u>Turtle Pond</u>: The existing parking area along Assisi Hill Drive just off Brotherhood Way will be improved and slightly enlarged. A small portion of this existing parking area lies just within 300 feet of Turtle Pond.

Impacts to these breeding habitats could occur from erosion and sedimentation or toxic materials spills or leaks during construction or operation and from increased traffic vehicle traffic and new roadways, and increased number of pets. While impacts at each of these locations varies in severity, all potential impacts would be mitigated to a less than significant level with the implementation of Mitigation Measures 4C through 4F as described above.

#### Common Plant and Wildlife Species

Loss of limited numbers of common species of plants or animals is not a significant impact under current CEQA guidelines pertaining to biological resources. However, the Migratory Bird Treaty Act (MBTA) and California Fish and Game Code (FGC) §3513 prohibit take of migratory birds, which is defined to include destruction of active nests (presumed to contain eggs or nestlings). Compliance with the MBTA requires that no grading, brush clearing (mechanized or otherwise), or tree removal occur during the nesting season without a nesting bird survey that confirms that no occupied nests are present, or contingent mitigation actions if nests are present. Mitigation Measure 4A requires a nesting survey prior to any disturbance to either offset or avoid impacts to potentially nesting raptors and migratory birds.

As discussed above, the project would result in potential impacts on CRLF, foothill yellow-legged frog, western pond turtle, special-status bats, and nesting raptors and migratory birds, but these impacts would be *less than significant with mitigation* with the implementation of Mitigation Measures 4A-4G below.

*Impact Discussion 4b-c:* The project area was assessed for potential wetlands based on the threeparameter approach described in the U.S. Army Corps of Engineers (USACE) 1987 Wetland Delineation Manual (USACE 1987) and the Arid West Supplement (USACE 2006). Potential wetlands were assessed by determining if an area was dominated by wetland plant species, contained hydric soils, and exhibited positive indicators of wetland hydrology (e.g., saturation, sediment deposits, oxidized root channels, etc.). Fifteen soil pits were excavated for this reconnaissance-level survey. The current indicator status for wetland plants occurring in the project area was obtained from the National Wetlands Inventory (USFWS 2012), which was also consulted for the presence of any documented wetlands or waters. The Web Soil Survey (NRCS 2012) was reviewed for the potential presence of hydric soils in the project area. Determinations of other waters of the U.S. were based on the presence or absence of indicators of ordinary high water or other indicators of recent flow (USACE 2005). Drainage contours that were well vegetated with upland plant species and contained no evidence of recent flow were mapped as "swales."

No "blue line" features (indicating streams) are depicted on the Nevada City or Camptonville USGS topographic maps in the proposed development areas; however, two seasonal (intermittent) blue line

streams are located in the southern and western portions of the Village, outside of the proposed new development and infill development within existing residential areas. No ponds, wetlands, riparian vegetation or streams occur within the proposed areas of disturbance or road alignments. However, small portions of the proposed development clusters and portions of new road and improved road alignments occur within the Nevada County 100-foot non-disturbance buffer for ponds, wetlands, and riparian habitat in seven areas:

- 1. A proposed new road from the existing Almora Cluster B to proposed Cluster L would cross an upland swale;
- 2. A proposed new road would cross an upland swale contour in Cluster K;
- 3. Widening of the fire road from the Village Center to development Clusters I, J, and K at the point it makes a 90-degree turn to the east would be within 100 feet of a wetland and riparian area;
- 4. Some portions of development Clusters I, J, and K would have driveways, roads or houses within 100 feet of a seasonally wet meadow;
- 5. Widening the fire road that runs from the end of Ranikhet (Cluster A) to Ayodhya Way would involve a small stretch that will be within 100 feet of Pubble Pond and its outlet;
- 6. Proposed development areas within the Village Center commercial zone and within a proposed PD-SP zone adjacent to the commercial zone are within 100 feet of a riparian and seasonal wetland areas, and
- 7. One of the construction envelopes at the Expanding Light site is within 100 feet of Lotus Lake, and proposed road improvements would occur on the dam retaining the lake.

No direct impacts to waters of the U.S. (including wetlands) or waters of the state (including riparian vegetation) would result from the proposed Master Plan Update. Potential impacts from development in close proximity to ponds, seasonally wet meadows, and riparian vegetation include potential indirect and direct impacts to water quality from upslope erosion and sedimentation, construction and grading in close proximity to the water resources; indirect impacts to wildlife habitat values from residential development within the nondisturbance buffers; temporary impacts during construction to nesting raptors, other nesting birds, and other special-status species potentially occurring in or adjacent to these resources during construction, and potential accidental introduction and spread of noxious weeds and other invasive nonnative plants from vehicles and equipment operating near these resources during and following construction. This impact would be *less than significant with mitigation* with implementation of Mitigation Measures 4A through 4G, which provide for all of these resources in the form of construction protection measures and ongoing education of residents and visitors.

*Impact Discussion 4d,f:* Much of the project site contains oak groves or oak-conifer woodland, both of which provide habitat for nesting birds. As discussed in Impact Discussion 4a, project construction could impact raptors and other migratory birds that are protected under the Migratory Bird Treaty Act, primarily during those construction activities which result in tree and vegetation removal, ground disturbance, heavy equipment use, and various other noises that could disturb, harass, or otherwise impact nesting migratory birds. Mitigation Measure 4A, which requires pre-construction surveys for nesting birds and raptors and appropriate action to avoid impacts should any nesting birds be found, is recommended by the project biologist.

According to the Nevada County Master Environmental Inventory, the project area is in the Critical Winter Range for local deer populations. Deer populations throughout the state are characterized by the California Department of Fish and Wildlife and the Tahoe National Forest as unstable and declining, with the 2014 population at nearly half that of 1991, from 850,000 to 443,289 deer (California Department of Fish and Wildlife 2015). Existing development at Ananda Village has not adversely affected resident or migratory deer herds, as evidenced by the numerous resident herds that are regularly observed on the property. The ongoing practices and policies of the existing development, including clustered

development, preservation of oak groves, maintenance of open meadows and defensible space, and discouragement of new fences (except around gardens) appear to support a thriving deer population at the Village. The slow rate of growth that is expected to occur at Ananda Village is unlikely to have any adverse impacts on deer populations. Because these ongoing practices and policies support a thriving deer population at Ananda Village, the project biologist recommends that these practices should continue to be implemented as mitigation for the proposed phases of development. Mitigation Measure 4H is therefore recommended to continue current practices, which would continue to allow free movement of deer through the area. With implementation of these practices as required in Mitigation Measure 4H, impacts related to wildlife movement and disturbance of local wildlife would be *less than significant with mitigation*.

*Impact Discussion 4e:* Oak groves are sensitive resources protected both by General Plan policy and site development standards of the Nevada County Zoning Ordinance. Landmark oak groves of black oak (*Quercus kelloggii*) are widespread throughout the 706-acre Village, including in the proposed development areas. The Village is dominated by four primary plant communities: black oak woodland (237 acres); mixed conifer-hardwood forest (123 acres); open annual grasslands (97 acres); and ponderosa pine (64 acres). With the exception of isolated oaks in the open grassland or disturbed areas, or in the understory of ponderosa pine forest, all of the mapped oak groves meet the criteria for landmark oak groves as defined by the Nevada County Land Use and Development Code, equal to or greater than 33 percent canopy closure. Most oak groves were affected by a wildfire in the 1970s, illustrated by the dense stands of small diameter, multi-stemmed, even aged trees. Large diameter trees are mostly absent from these stands, except at canopy openings of grassland, and road edges, where there is less competition for light and moisture, and in stands that were managed for fuels, including residential areas. Numerous large diameter oaks and madrones, including some landmark oaks, occur in areas not affected by the 1976 fire, including around the Expanding Light Retreat and the proposed temple site.

Construction of the proposed new residences, temple, leach fields, new roads, road improvements (including construction of the potential re-alignment of Sages Road for the benefit of neighbors to the east), and other project components would result in temporary and permanent impacts to approximately 35.5 acres of black oak woodlands, triggering the requirement for a Management Plan. This impact includes 17 acres of new residential and non-residential construction in currently undeveloped oak woodlands; 5.5 acres of impacts for new access road construction in currently undeveloped oak woodlands, including the potential Sages Road re-alignment through Ananda property; 4 acres of infill in existing residential clusters that support a 33 percent or greater canopy closure; and 9 acres of leach field construction in oak woodlands. In the calculation of infill impacts, all potential infill buildings were included, regardless of whether or not they were sited in oak woodland, to allow flexibility in selecting actual building sites in the future.

Table 6, below, summarizes the direct and indirect impacts of the proposed Master Plan Update on landmark trees and groves. "Indirect impacts" are used here to describe impacts that occur following construction, and "direct impacts" are those that occur during construction.

Type of Development	Oak Impact (acres)	Description of Impacts
	Residential: 16 acres	<ul> <li>Tree removal for new structures and roads and fire- safety around roads and structures</li> </ul>
Currently Undeveloped Oak Woodlands Non-residential: 1 acre Access Roads: 5.5 acres	<ul> <li>Removal and permanent management of woodland understory vegetation</li> <li>Loss of otherwise intact habitat values through human</li> </ul>	
	<ul><li>encroachment: disturbance from ongoing human activity and pets</li><li>Physical damage to roots and trunks of leave trees</li></ul>	

Table 6: Oak Impacts

Infill within Currently Developed Woodlands	Residential: 2 acres Non- Residential: 2 acres	<ul> <li>from construction, fill, trenching and compaction in the dripline of defined groves or landmark trees</li> <li>Root rot and other diseases from landscape irrigation</li> <li>Limited tree removal</li> <li>Physical damage to roots and trunks of leave trees from construction, fill, trenching and compaction in the dripline of defined groves or landmark trees</li> <li>Increased disturbance to wildlife from pets and human activity;</li> <li>Root rot and other diseases from landscape irrigation</li> </ul>
Leach Fields for All Proposed Development (leach field construction in undeveloped oak woodlands)	9 acres	<ul> <li>Limited tree removal</li> <li>Physical damage to roots and trunks of leave trees from construction, fill, trenching and compaction in the dripline of defined groves or landmark trees</li> </ul>

Impacts from new development in currently undeveloped oak woodlands were calculated not just for building envelopes, but with an additional 30 feet of envelopes drawn around the perimeter of each new housing cluster and non- residential buildings. An additional 10 feet of construction envelopes was drawn around new access roads and parking areas, and an additional 20 feet of construction envelopes was drawn around building perimeters for infill areas within existing black oak canopy. Minimization measures to protect oaks during construction are provided in Mitigation Measure 4I.

Because each of the three impact areas described above has unique habitat values, mitigation ratios are identified based on the level of existing disturbance and degree of impact. In currently undeveloped woodlands, a 1.5:1 ratio is used for compensatory mitigation plus avoidance and minimization measures; in infill development areas and for leach field construction, a 0.5:1 ratio for compensatory mitigation plus avoidance and minimization measures is used. Total compensatory mitigation is calculated as follows in Table 7 and would be required through Mitigation Measure 4J below.

	Total Construction Envelopes (acres)	Black Oak Impacts within Construction Envelopes (acres)	Mitigation Ratios	Mitigation Acres
Currently undeveloped oak woodlands				
Residential development	26	16	1.5 to 1	24
Non-residential development	3	1	1.5 to 1	2
Access roads	10.5	5.5	1.5 to 1	8.25
Currently developed woodlands				
Residential development	2	2	0.5 to 1	1
Non-residential development	9	2	0.5 to 1	1
Septic areas	11	9	0.5 to 1	5
Total Impact Area	61.5	35.5		41.25

#### Table 7: Required Oak Mitigation

As shown in Table 7, the total area of black oak impacts is 35.5 acres, while the total mitigation area, given compensation ratios, is 41.25 acres. Compensation for the project's potential impacts would include restoration and preservation of a portion of the black oak woodland degraded by a wildfire that occurred in 1976. This area is identified as "Mitigation Area 1" in the Oak Habitat Management Plan. The stands in this area are densely overstocked with small diameter trees and an excess of dead and dying small trees and slash. Mitigation Areas 2 through 4 (as identified in the Oak Habitat Management Plan) by preventing the new emergence and dominance of young conifers among the oak groves, while maintaining existing large-diameter conifers. Stands not over-topped by conifers, which are typically larger diameter and produce mast crops of acorns, increase the value of the habitat for wildlife. The Oak Habitat Management

Plan also includes guidelines for managing the oak woodlands within the 4 acres proposed for infill development in existing residential clusters

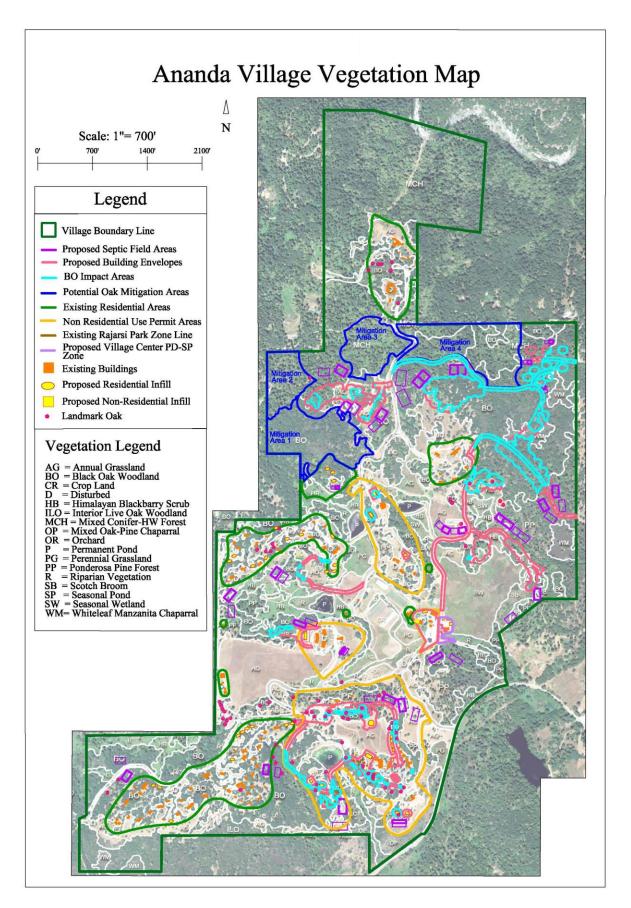
Mitigation will be accomplished through a combination of avoidance and minimization measures as well as compensatory mitigation through the restoration of oak woodlands within designated mitigation areas outside the development areas. Oak mitigation areas would be managed to promote old growth characteristics, biodiversity, and wildlife habitat. In addition, within affected oak woodlands, buildings and associated development, including fire clearing, would be done in a way that will preserve habitat values, protect old growth trees, promote oak regeneration, and reduce the risk of catastrophic fires. It should also be noted that the applicant has agreed to provide all mitigation for each cluster prior to first occupancy regardless of how many sites are developed subsequently in each cluster. Because more residential sites are identified than would ultimately be developed (120 sites are identified; only 100 would ultimately be developed), the applicant would be providing up to 20 percent more mitigation than strictly required. Additionally, leach field mitigation is calculated as if every septic field is located within a black oak woodland and would require mitigation. This will not be the case and thus again more mitigation than required would be provided.

In addition to oak grove impacts, the project site includes numerous landmark oak trees and madrones with diameters-at-breast-height (DBH) greater than 36 inches (Figure 13). All of the known landmark oak trees within the Village are shown in Figure 13. Landmark oaks and other large diameter hardwood and pine trees would be avoided during residential site development. If any direct or indirect impacts do occur to landmark trees, Mitigation Measures 4I-4L would apply to reduce and compensate for impacts. With implementation of these measures, impacts to landmark oak groves and trees would be *less than significant with mitigation*.

**Mitigation Measures:** To offset the potential impacts to biological resources associated with the project, the following mitigation measures shall be required:

**Mitigation Measure 4A. Avoid and Reduce Impacts to Nesting Raptors and Migratory Birds:** If tree removal is proposed outside the nesting season (August 1-February 28), no further mitigation is required. If tree removal is proposed during the nesting season (March 1- July 31) for any project construction, including road and infrastructure improvements, a Nevada County-approved qualified biologist shall conduct a pre-construction survey to verify that the construction and potential disturbance zones do not support nesting migratory birds. The surveys shall incorporate the following procedures:

- 1. Tree removal shall not take place during the breeding season (March 1 July 31), unless supported by a report from a qualified biologist verifying that birds, including raptors, are not nesting in the trees proposed for removal or disturbance.
- 2. An additional survey may be required if periods of construction inactivity (e.g., gaps of activity during grading, tree removal, road building, or structure assembly) exceed two weeks, an interval during which bird species, in the absence of human or construction-related disturbances, may establish a nesting territory and initiate egg laying and incubation.
- 3. Surveys shall be conducted no more than two weeks prior to the initiation of construction activities or other site disturbances.
- 4. Should any active nests or breeding areas be discovered, a buffer zone (protected area surrounding the nest, the size of which is to be determined by a qualified biologist) and monitoring plan shall be developed for the review and approval of CDFW. Nest locations shall be mapped and submitted, along with a report stating the survey results, to the Nevada County Planning Department within one week of survey completion.



### Figure 13: Black Oak Impact and Mitigation Areas

A qualified wildlife biologist shall monitor the progression of reproductive stages of any active nests discovered during the preconstruction survey until a determination is made that nestlings have fledged and that a sufficient time for fledgling dispersal has elapsed; construction activities shall be prohibited within the buffer zone until such determination is made.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4B. Avoid and Reduce Impacts to Special-status Bat Species:** If removal of trees 24 inches dbh or larger ("potential roost trees") is conducted between September 16 and March 31, or if trees to be removed at any time are smaller than 24 inches dbh, acoustical surveys for bats are not required. If trees 24 inches dbh or larger are to be removed for project construction between April 1 to September 15, acoustical surveys for the presence or absence of Yuma myotis and Pale Townsend's bigeared bat shall be performed by a biologist with experience in this type of survey. If these bat species are not detected within the project site, then no further mitigation is required. If these bat species are detected acoustical surveys demonstrate that the bats are no longer foraging within the site; or each potential roost tree that is either designated to be removed or is located within a 50-foot radius of a tree to be removed is determined definitively not to contain a hollow suitable for bat roosting use; or until the period of September 16 to March 30, during which trees of any size may be removed without impacts to bats.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4C. Establish Non-disturbance Buffers (Wetland Habitat Management Plan):** Establish non-disturbance buffers around sensitive wet areas as follows:

- 1. Prior to the start of construction, the applicant shall establish the seasonal wetlands, riparian areas, and ponds that occur in close proximity to project-related work activities as non-disturbance buffers during construction. These include areas mapped as "SW", "P", and "R" in Figures 3 and 4 of the Wetland Habitat Management Plan prepared by Beedy Environmental Consulting (dated April 2016) that occur within 100 feet of development, including road widening and road improvements. Work shall not begin until the buffers are delineated on the ground with orange safety netting or signage under the supervision of a qualified biologist. The buffer area signs shall be installed wherever activity will occur within 100 feet of these resources and remain in place for the entire duration of construction. Staging areas as well as fueling and maintenance activities shall be a minimum of 66 feet from onsite ponds (St Francis, Nandi, Pubble, Dairy, Incense, Turtle, and Lotus). Spoil areas, staging areas, access roads, parking, and equipment refueling & maintenance areas shall be located a minimum of 30 feet from the upstream or upslope side of the wetlands, ponds, riparian areas, and upland swales. Any construction activity that occurs within 20 feet of any water resource shall be marked with orange safety netting. No earth-moving activities, vegetation removal, vehicles, heavy equipment, material storage, equipment maintenance or refueling, or other construction activities shall be permitted within the ESA buffers. The boundaries of all work areas shall be clearly marked on all final grading and construction drawings.
- 2. Prior to issuance of the first occupancy permit, the applicant shall install signage at points around the perimeter of areas mapped as seasonal wetland, ponds, or riparian areas in the Biological Inventory, where these areas share a boundary with roads, trails, or development. The signage shall inform residents about the potential presence of nesting migratory birds and other sensitive wildlife in these areas during the breeding season (March 1 through July 31).

*Timing:* Prior to issuance of grading and improvement permits and prior to first occupancy permit *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4D. Implement Best Management Practices (Wetland Habitat Management Plan):** To protect water quality, habitat values, and wildlife in the wetlands, ponds, streams, and riparian areas, the project work shall implement BMPs during and after construction as described in the Wetland Habitat Management Plan prepared by Beedy Environmental Consulting (April 2016). These include areas mapped as "SW", "P", and "R" in Figures 3 and 4 of the Wetland Habitat Management Plan that occur within 100 feet of development, including road widening and road improvements, as well as the reaches of upland "swales" that would be directly affected by road crossings or widening in development clusters "L" and "K". These standard BMPs include but are not limited to the following, which are summarized here. More detailed specifications are provided in the Wetland Habitat Management Plan:

- 1. <u>Pre-Construction Planning</u>. These measures shall be implemented prior to the start of any earthwork activities.
  - a. Minimize the amount of soil and vegetation disturbance to the minimum necessary through site design and construction practices.
  - b. Prior to the start of work that will disturb soil within 50 feet of wetlands, ponds, or riparian areas, including any vegetation removal, install silt-fencing, straw bales, sediment catch basins, straw or coir logs or rolls, or other sediment barriers to keep erodible soils and other pollutants from entering the adjacent wetlands, ponds, or riparian areas outside the permitted work area.
  - c. Prior to the start of construction, medium to large and/or dense infestations of Scotch broom, goat grass, and yellow star thistle within or adjacent to the 100-foot non-disturbance buffers shall be marked with signage and/or temporary safety netting.
  - d. Provide copies of "After the Storm: A Citizen's Guide to Understanding Stormwater" (Appendix B of the Wetland Habitat Management Plan) to residents living within or near the construction area.
  - e. Prevent alteration of the surface drainage patterns that support streams, wetlands, ponds, and riparian areas by maintaining existing drainage patterns in the design of road ditches, culverts, and development runoff drainage plans.
- 2. <u>Construction Measures</u>. These measures shall be implemented and shown as notes on all grading and improvement plans.
  - a. Construction activity within 100 feet of the wet areas shall occur only during dry weather.
  - b. All ESAs and work areas, including spoil areas, staging areas, access roads, parking, and equipment refueling and maintenance areas, shall be clearly marked on all final grading and construction drawings. The applicant shall prepare a spill prevention and clean-up plan.
  - c. Before the first heavy rains and prior to removing the barriers, soil or other sediments or debris that accumulates behind the barriers shall be removed.
  - d. The contractor shall exercise every reasonable precaution to protect the wetlands, ponds, and riparian areas from accidental pollution with fuels, oils, bitumen, and other harmful materials. The contractor shall immediately contain and clean up any petroleum or other chemical spills with absorbent materials such as sawdust or cat litter.
  - e. All disturbed areas shall be graded or smoothed to minimize surface erosion and siltation; disturbed and bare soils shall be stabilized as soon as possible after the soil disturbance is completed and before any rain event. Specific measures apply to Lotus Lake.
  - f. Bare soils shall be stabilized with a combination of locally native grass seed and/or plugs or tightly woven fiber netting or similar material biodegradable mats to anchor the seeding and mulch on any steeper faces. Plastic sheeting and plastic mono-filament matting may not be used for erosion control due to the possibility of California red-legged frog entrapment. This limitation shall be communicated to the contractor through use of special provisions included in the bid solicitation package.
  - g. On slopes greater than 3:1, heavy erosion control blankets shall be used and installed according to manufacturer's directions.
  - h. If straw is used for mulch or for erosion control, only certified weed-free straw shall be used to minimize the risk of introducing noxious weeds.

- i. Contractors shall be instructed to wash or otherwise remove any seed or stolons from the tires, tracks and undercarriage of heavy equipment and any other vehicles entering the project site.
- j. Sediment and other pollutant control measures, and erosion control measures shall be inspected regularly, and repaired and/or installed no less than 24 hours before a forecast storm or rain event.
- k. Extra sediment, pollutant, and erosion control materials shall be stockpiled onsite to address any unanticipated rain events, problems and emergencies.
- 3. <u>Operational Measures</u>. These measures shall be implemented on an ongoing basis after construction and for the life of project operations, except as noted.
  - a. Prevent the direct discharge of development runoff into ponds, wetlands, and riparian areas by pre-treating the runoff in constructed vegetated swales upstream of these features. These swales shall be constructed as part of the grading and improvement plans for the applicable areas and shall be maintained for the life of the project.
  - b. Protect water quality in the seasonal wetlands and riparian areas surrounding the proposed Village Center PD-SP zone during ongoing operations by insuring that all operations involving petroleum based products (refueling, lubrication, engine maintenance etc.) or other chemicals take place on covered cement pads or indoors to prevent any potential contamination of runoff.

*Timing:* Prior to issuance of the grading and improvement permits and during operation of the project *Reporting:* Agency approval of permits

## Responsible Agency: Planning Department

Mitigation Measure 4E. Maintain an Educational Program for Village Residents and Visitors (Wetland Habitat Management Plan): In order to minimize impacts to wildlife and habitat values, the applicant shall maintain an educational program for Village residents and visitors that focuses on the following during the ongoing operation of the project:

- 1. Any dogs brought onto the property by neighbors, visitors, and guests shall be kept on a leash at all times. Residents and visitors shall not walk dogs in areas mapped as seasonal wetland, ponds or riparian areas.
- 2. Educate residents about the impacts of human disturbance to wildlife ("flushing," light pollution, etc.) and about cat predation on wildlife, especially ground-nesting species, and encourage spaying and neutering of cats. Homeowners shall be encouraged to keep their cats indoors at night.
- 3. Educate residents about the impacts of night-time lighting to wildlife and the CMP requirements to shield light fixtures to direct lighting away from natural areas; use the proper amount of light for the job (don't overlight); and turn off lights (either manually or with motion sensors) when there is no one around to use them. Advocate to residents how these simple steps will also result in both reduction of light pollution and conservation of energy.
- 4. Prohibit the dumping of private yard trash, landscape maintenance trash (including grass clippings), or littering; require residents to keep trash cans and compost bins in fenced areas to avoid attracting wildlife and to prevent nuisance wildlife.
- 5. Educate residents on how to deter brown-headed cowbirds by the following measures: use feeders that are made for smaller birds, such as tube feeders that have short perches, smaller ports, and no catch basin on the bottom. Avoid platform trays, and do not spread food on the ground; avoid using cowbirds preferred feed (sunflower seeds, cracked corn, and millet) and instead offer nyjer seeds, suet, nectar, whole peanuts, or safflower seeds; clean up seed spills on the ground below feeders, and avoid searching for or visiting a nest if cowbirds are in the area.
- 6. Implement fuels management guidelines in the Ananda Village Forest Management Plan (Whitlock 2013).
- 7. Locate trails and other recreational facilities away from seasonal wetland, pond, and riparian areas and other Environmentally Sensitive Areas, maintaining a buffer of 25 feet or more from the perimeter of these habitats.

*Timing:* Prior to issuance of the grading and improvement permits and during project operation *Reporting:* Agency approval of permits

### **Responsible Agency:** Planning Department

**Mitigation Measure 4F. Provide Copies of Mitigation Measures to Contractors:** To ensure the proper and timely implementation of all mitigation measures contained in this report, as well as the terms and conditions of any other required permits, the applicant shall distribute copies of the project mitigation measures and any other permit requirements to the contractors and to members of the Ananda Village Board of Directors prior to grading and construction. These measures shall also be included as notes on all plans and permits.

*Timing:* Prior to issuance of the grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4G. Minimize Impacts to California Red-legged Frogs:** Prior to any construction activities and issuance of any grading or improvement permits on the property, the following shall be completed as noted. The term "construction activities" refers to all construction activities, including road improvements and road construction, anything that requires ground disturbance such as campground expansion, septic-field construction, parking-lot construction, stone-wall construction, etc., and anything that requires use of heavy equipment anywhere within 300 feet of a pond. Restrictions apply to all or specified ponds regardless of whether they are inundated at the time of construction.

- 1. <u>Pre-Construction Planning</u>. These measures shall be implemented prior to the start of any earthwork activities.
  - a. Resumes of all biologists proposed to capture or handle red-legged frogs or to provide construction monitoring and training will be submitted to the Service for approval no fewer than 30 days prior to the start of construction.
  - b. For all projects that take place within 300 feet of any pond, a qualified biologist approved by the U.S. Fish and Wildlife Service (Service-approved biologist) shall train all project staff, contractors, and other work crews regarding habitat sensitivity, identification of California red-legged frogs and their breeding and non-breeding habitats, and required practices before the start of any construction activity taking place within 300 feet of any pond. The training shall include the general measures that are being implemented to conserve this species, the penalties for non-compliance, and the boundaries of the project area. A fact sheet or other supporting materials containing this information shall be prepared and distributed. Upon completion of training, employees shall sign a form stating that they attended the training and understand all of the conservation and protection measures. The training shall be effective for one year and must be retaken after one year.
  - c. For all construction activities taking place within 150 feet of any pond, a pre-construction survey for California red-legged frogs shall be conducted within 24 hours prior to the beginning of construction. The Service-approved biologist shall carefully search all obvious potential hiding spots for red-legged frogs, such as large downed woody debris, the perimeter of pond or wetland habitat, and the riparian corridor associated with streams and drainages. Any red-legged frog found shall be captured by a Service-approved biologist and held for the minimum amount of time necessary to release it in suitable habitat outside of the project area. All project construction access areas and routes shall be included in preconstruction surveys and, to the maximum extent possible, shall be established in locations disturbed by previous activities to prevent adverse effects.
  - d. A buffer of 150 feet shall be flagged as a non-disturbance buffer during all construction activities around Lotus Lake, Nandi Pond, Incense Pond, and Pubble Pond. Sensitive habitat areas shall be delineated with high visibility flagging or fencing to prevent encroachment of construction personnel and equipment into any sensitive areas during project work activities.
  - e. Where construction activities will take place more than 150 feet from pond edges, such as at the residence east of School Circle (west of St Francis Pond), the parking area south of Turtle Pond,

the septic field southwest of Pubble Pond, the single residence west of Nandi Pond, and any peripheral structures around Lotus Lake, the boundaries of the construction site itself shall be flagged, outside of which construction activities may not take place.

- 2. <u>Construction Measures</u>. These measures shall be implemented and shown as notes on all grading and improvement plans.
  - a. Within the 150-foot buffer, construction activities shall not take place without the presence of a Service-approved biologist. The Service-approved biologist shall monitor all ground-disturbing activity. After ground-disturbing activities are complete, the Service-approved biologist shall train an individual to act as the on-site construction monitor. The onsite construction monitor shall have attended the required red-legged frog training. Both the Service-approved biologist and the construction monitor shall have the authority to stop and/or redirect project activities if any of the requirements associated with these terms and conditions are not being fulfilled and to ensure protection of California red-legged frogs. The Service-approved biologist and construction monitor shall not have authority to capture or handle California red-legged frogs.
  - b. If a California red-legged frog is encountered during construction work, activities shall cease immediately until the animal is removed and relocated by a Service-approved biologist. California red-legged frogs found within construction areas shall be captured and released well away from construction. California red-legged frogs shall not be captured or handled by anyone other than a Service-approved biologist. Suitable release sites for any captured California red-legged frogs shall be approved by the Service prior to the start of construction activities. Nets or bare hands may be used to capture red-legged frogs. Service-approved biologists will not use soaps, oils, creams, lotions, repellents, or solvents of any sort on their hands within two hours before and during periods when they are capturing and relocating red-legged frogs. To avoid transferring disease or pathogens between aquatic habitats during the course of surveys or handling of redlegged frogs, Service-approved biologists will follow the Declining Amphibian Populations Task Force's "Code of Practice." Service-approved biologists shall limit the duration of handling and captivity of red-legged frogs. While in captivity, individuals of these species shall be kept in a cool, moist, aerated environment, such as a bucket containing a damp sponge. Containers used for holding or transporting adults will not contain any standing water.
  - c. All construction activities shall be conducted outside the "wet season," which in the Sierra begins with the first frontal system that results in at least 0.25 inches of precipitation after October 15 (as measured from the closest published location and elevation by the National Weather Service) and continues until April 15.
  - d. All construction within 300 feet of aquatic sites will be completed as quickly as possible. For any lapses longer than one week on construction within 150 feet of a pond edge, a new preconstruction survey for the presence of CRLFs shall be completed prior to the re-initiation of construction.
  - e. Permanent and temporary construction disturbances and other types of project-related disturbance to red-legged frog habitat shall be minimized to the maximum extent possible and confined to the project site. To minimize temporary disturbances, all project-related vehicle traffic shall be restricted to established roads, construction areas, and other designated areas. These areas shall be established in locations disturbed by previous activities to prevent further adverse effects.
  - f. A vehicle speed limit of 10 miles per hour shall be posted and enforced on all non-public access roads during construction. Construction crews shall be given weekly tailboard instruction to travel only on designated and marked existing, cross country, and project-only roads.
  - g. Because dusk and dawn are often the times when red-legged frogs and tiger salamanders are most actively foraging and dispersing, all construction activities shall cease one-half hour before sunset and shall not begin prior to one-half hour before sunrise.
  - h. Tightly woven fiber netting or similar material shall be used for erosion control or other purposes at the project site to ensure that the red-legged frogs do not get trapped. This limitation shall be communicated to the contractor through use of special provisions included in the bid solicitation

package. Coconut coir matting is an acceptable erosion-control material. No plastic mono-filament matting will be used for erosion control.

- i. The Sacramento Fish and Wildlife Office (SFWO) shall be notified within one working day of the finding of any dead listed species or any unanticipated take of the California red-legged frog.
- j. Staging areas as well as fueling and maintenance activities shall be a minimum of 66 feet from riparian or aquatic habitats. The applicant shall prepare a spill prevention and clean-up plan.
- k. To prevent inadvertent entrapment of wildlife, all excavated, steep-walled holes or trenches will be covered at the end of each work day with plywood or similar materials. If this is not possible, one or more escape ramps constructed of earth fill or wooden planks will be established in the hole. These holes will be inspected for trapped animals prior to the start of construction each day. Before such holes or trenches are filled, they will be thoroughly inspected for any animals. If at any time a red-legged frog is found trapped or injured in these holes, work will cease until the Service is contacted for further guidance.

*Timing:* Prior to issuance of the grading and improvement permits and during project operation *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

**Mitigation Measure 4H. Minimize Impacts to Resident and Migratory Deer Populations:** The project applicant shall enforce existing guidelines for protecting resident and migratory deer populations, as follows:

- 1. Cluster development to concentrate access and services and preserve open space
- 2. Preserve standing oaks and oak groves to the extent possible
- 3. Maintain open meadows and clear brush within forests for fire safety
- 4. Remove old agricultural fences and discourage installation of new fencing (except to protect gardens from deer)
- 5. Enforcing the rule against dogs (generally, no resident dogs, visiting dogs must be on a leash) and hunting within Ananda Village.

These measures shall be incorporated into the Comprehensive Master Plan narrative for the project, which shall be updated prior to the issuance of any grading or improvement permits for the property. *Timing: Prior to issuance of the grading and improvement permits Reporting: Agency approval of permits Responsible Agency: Planning Department* 

Mitigation Measure 4I. Protect Landmark Oaks and Other Large Diameter Trees from Accidental Harm during Construction (Oak Habitat Management Plan): To ensure that no accidental harm comes to landmark oaks and other trees that have been designated as trees to be left undisturbed, the following measures shall be implemented with the timing shown. The measures shall be incorporated into the grading and construction plans and specifications for all new construction projects, including individual structure construction, septic system construction, and road and driveway construction.

- 1. Prior to issuance of any grading, improvement, or building permits for the project, the applicant shall submit a final Comprehensive Master Plan map that identifies the location of all landmark oak trees and groves as mapped in the project biological reports, and identifies the location of the potential Sages Road re-alignment for the benefit of the neighbors to the east.
- 2. Prior to any tree or vegetation removal, grading, or construction activities, the applicant shall survey the development areas and flag landmark oak trees, large diameter snags, and acorn granary trees that will be left undisturbed. Other large diameter trees (e.g., greater than 18 inches diameter) shall be flagged and preserved wherever possible, with preference for the larger diameter trees. Whenever possible, landmark oak trees and other trees 36 inches diameter or greater shall not be removed and impacts to them minimized.

- 3. Precise surveyed locations of the trees to be left undisturbed shall be shown on improvement, grading, and building plans, and identified within non-disturbance buffers. The boundary of the non-disturbance buffer for landmark oak groves shall be established at the dripline of the protected groves. The boundary of the non-disturbance buffer for landmark oak trees shall be established at a distance that is equal to 1.5 times the radius of the dripline. No soil grading, placement of fill, soil compaction, paving or hardscaping, irrigation, or changes in drainage patterns shall occur within that non-disturbance area. Only non-irrigated plantings shall be permitted within that buffer.
- 4. Where buffers occur within 50 feet of any work activity, they shall be delineated on the ground, prior to construction, with temporary orange construction fencing or flagging spaced at 20-foot intervals and signage.
- 5. Soil surface removal greater than one foot located within the driplines of groves and trees, fill placement within five feet of their trunks, impervious paving (asphalt, concrete, etc.) laid within the dripline of groves and trees shall be considered as disturbances, and the impact will require mitigation as specified in Mitigation Measure 4J. Underground utility line trenching shall not be placed within the dripline of non-mitigated trees. If necessary to install underground utilities within the driplines of oak trees, the trench shall not be placed within five feet of the trunk.
- 6. The applicant is encouraged to implement these or similar measures for trees that they wish to preserve but that may be indirectly impacted by encroachment within the designated non-disturbance buffers; however, any trees that may be impacted by buffer encroachment must be compensated for potential long-term, indirect impacts, under Mitigation Measure 4J.
- 7. A qualified professional biologist shall periodically monitor onsite construction and grading activities occurring near all identified oak tree protection zones to ensure that damage to the protected oak trees does not occur. Prior to final inspection, the biologist shall provide a memo to the Planning Department indicating whether any oaks were damaged during construction that need to be added to the compensation totals.
- 8. Contractors shall stay within designated work areas. No vehicles, construction equipment, mobile offices, or materials shall be parked or located within the established non-disturbance buffers.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval of permits

**Responsible Agency:** Planning Department

**Mitigation Measure 4J. Provide Compensation for Impacted Landmark Oaks and Oak Groves** (**Oak Habitat Management Plan**): For all oak woodlands and landmark oaks and madrones that are impacted either directly or indirectly by new development and ground disturbance, including road and infrastructure construction, compensation shall be provided in the following ratios. In currently undeveloped woodlands: 1.5:1 ratio; infill development areas and leach field construction: 0.5:1 ratio. Compensation shall be provided prior to the finalization of any grading, improvement, or building permits. Compensation shall be implemented by the enhancement and restoration of oak woodlands as described in the Oak Habitat Management Plan, including retaining a Registered Professional Forester to conduct the management prescriptions outlined in Appendix B of the Oak Habitat Management Plan. The management prescriptions are summarized below:

- 1. Conduct all large-scale tree and shrub removal in the non-breeding season (August 1-February 28).
- 2. Promote growth of larger trees through thinning and fuels reduction.
- 3. Preserve representations of all tree species present on the site.
- 4. Encourage structural diversity; retain a variety of size and age classes of understory trees; and retain a variety of habitat types, including large and small patches of shrubby species, small trees, dense patches of conifers, and existing open areas and canopy openings.
- 5. Leave Himalayan blackberry patches along streams for wildlife cover and foraging.
- 6. Protect the mitigation area streams (including ephemeral headwater reaches) and riparian habitat (including Himalayan blackberry scrub) as Environmentally Sensitive Areas during construction and fuels management activities.

- 7. Construct trails away from stream corridors and riparian vegetation.
- 8. Preserve large standing dead trees and leave some large logs on the ground.
- 9. Remove and control existing medium to large Scotch broom infestations from the forest understory.
- 10. Implement measures to minimize the introduction of new weed species or the spread of weeds into new areas on infested vehicles and equipment.

*Timing:* Prior to finalization of grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

Mitigation Measure 4K. Educate Residents and Guests on Oak Habitat Management (Oak Habitat Management Plan): On an ongoing basis following approval of the Comprehensive Master Plan, the applicant shall implement the following:

- 1. Educate residents about the goals and objectives of the Oak Habitat Management Plan.
- 2. Enforce dog leash policy and requirements to discourage wildlife from garbage feeding.
- 3. Educate residents about permitted and prohibited activities in mitigation areas and infill areas.
- 4. Encourage residents' participation in the management of oak mitigation areas and commons.
- 5. Educate residents in oak woodland management for maintaining the health of adjacent oaks, managing for fire-safety, and minimizing disturbance to wildlife.

Timing: On an ongoing basis

**Reporting:** Enforced through code compliance process

**Responsible Agency:** Planning Department and Code Compliance Division

Mitigation Measure 4L. Preserve the Oak Habitat Mitigation Areas in Perpetuity (Oak Habitat Management Plan): Prior to issuance of any grading or building permits, the applicant shall designate 54 acres of oak mitigation areas as identified in the Oak Habitat Management Plan as non-disturbance and non-buildable areas on the Comprehensive Master Plan, with a note that these are areas are to be preserved in perpetuity. No uses requiring grading or building permits shall be allowed within these areas. Commercial harvesting may not occur in the Oak Mitigation Areas (except as forest products are produced in the course of performing prescribed mitigation treatments) and will be guided only by the overall goals listed in the Oak Habitat Management Plan (Beedy 2016). This condition shall run with the land and shall be noted on the face of the final approved Comprehensive Master Plan map and within the Comprehensive Master Plan narrative.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Agency approval of permits *Responsible Agency:* Planning Department

## 5. <u>CULTURAL RESOURCES</u>

**Existing Setting:** The information for this section of the Initial Study is based on the *Archaeological Survey* prepared by Jensen & Associates on October 6, 1994; an addendum to the 1994 report by Sean Michael Jensen, dated January 3, 2017; and the North Central Information Center's Standard Records Search for the site conducted on March 8, 2013. The Ananda Village project area is situated along the San Juan Ridge at approximately 2,600 feet elevation in the Sierra Nevada foothills. Tributaries of Clear Creek run through the project area, and the Middle Yuba River is adjacent to the northern boundary of the project area.

### Prehistoric Context

The Nisenan, also known as "Southern Maidu," occupied the project area in the ethnographic period. In this part of Nevada County, prehistoric-period habitation sites are primarily found adjacent to streams, or

on ridges or knolls, especially those with a southern exposure. The Nisenan had permanent settlements along major rivers in the Sacramento Valley and foothills, and would travel yearly to higher elevations to hunt or gather seasonal plant resources. As with all northern California Indian groups, economic life for the Nisenan revolved around hunting, fishing and the collecting of plant foods. The Nisenan were very sophisticated in terms of their knowledge of the uses of local animals and plants, and of the availability of raw material sources that could be used in manufacturing an immense array of primary and secondary tools and implements. Only fragmentary evidence of the material culture of the Nisenan remains, due in part to perishability, and in part to the impacts to archaeological sites resulting from later (historic) land uses.

### Historic Context

European Americans began arriving in substantial numbers during the Gold Rush period of the mid-1800s. The project site is along the San Juan Ridge, which represents one of the most intensively mined areas in the state. The first recorded evidence of miners in the Nevada City area occurred in 1848 with independent explorations along Deer Creek. Mining operations along Shady Creek, the Yuba River system, and associated tributaries were initiated soon thereafter. Placer mining was initiated by 1850 along San Juan Ridge, and nozzles were added in about 1853. An extensive systems of dams, ditches, and flumes began to emerge as early as 1855, one of which (Milton Ditch, site CA-NEV-537-H) was constructed through a portion of the present project area. Before the end of much of the hydraulicking in 1883, numerous archaeological sites had been destroyed by this mining method. Drift or hard rock mining also occurred on the San Juan Ridge as early as 1850. The town of Cherokee, founded in 1853, which is within portions of the Ananda property, was one of the earliest mining communities to appear along this section of San Juan Ridge. The world's first "long distance" telephone line was constructed along the Ridge in 1878 in order to serve the extensive ditch system in use along the Ridge at the time. Logging and water storage projects represent additional major historic themes for the San Juan Ridge area. As with the earlier mining emphasis, activities associated with logging and water storage have also adversely affected the local cultural resource base.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Cause a substantial adverse change in the significance of a historical resource as defined in Section 15064.5 of the CEQA Guidelines?		~			A, 34, 35, 53
b. Cause a substantial adverse change in the significance of an archaeological resource pursuant to Section 15064.5 of the CEQA Guidelines?		~			A, 34, 35, 53
c. Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?		~			A, 34, 35, 53
d. Disturb any human remains, including those interred outside of formal cemeteries?		√			A, 34, 35, 53
e. Would the project cause a substantial adverse change in the significance of a tribal cultural resource as defined in Public Resources Code 21074?		~			A, 34, 35, 53

*Impact Discussion 5a-e*: In 1994, Jensen & Associates conducted an intensive pedestrian survey and archaeological investigation for portions of the overall Ananda property. Between 1996 and 2005, four additional investigations were conducted within the overall property. These investigations found the presence of a variety of historic features and sites, mostly within mine areas associated with the Cherokee, the Milton Ditch, and other mine-related features and structural remains. In 2013, the North Central

Information Center (NCIC) conducted a records search for the entire Ananda property (NCIC File No.: 13-12). The records search concluded that approximately 70 percent of the property had been subjected to archaeological inventory, and that eight resources had been recorded either within or adjacent to the property. Careful examination of the records search results verified that only four of the previously recorded resources (all historic-era ditches) are located within the Ananda property. None of these resources are considered significant historical resources or unique archaeological resources, nor are any of these resources eligible for inclusion in the California Register of Historical Resources.

A comparison of the previous archaeological survey coverage with the proposed CMP map confirmed that four proposed housing clusters (K, M, O & P), as well as their respective septic fields and segments of their access roads had not been subjected to previous archaeological investigation. On January 1, 2017, Sean Michael Jensen and two associates undertook an additional pedestrian field survey consisting of walking parallel transects spaced at approximately 10-meter intervals throughout the four housing cluster areas. Contemporary disturbance was noted throughout the areas subjected to timber removal. Succession vegetation species proliferated after the fire, and were subsequently removed via brush rakes and heavy equipment. Following brush removal, some areas of the burn were reforested. Additional impacts to the present survey area include placement of buried utilities, road grading, and fence line placement. No historical sites or features, and no prehistoric cultural resources (no artifacts, flakes, or other evidence of cultural utilization) were identified during the January 1, 2017, pedestrian survey area lands.

In preparation of this Initial Study, local Native American tribes who have previously requested consultation were contacted. These tribes were the United Auburn Indian Community (UAIC) and the Washoe Tribe. The Native American Heritage Commission was also contacted and informed of the proposed project. The UAIC requested a site visit and further consultation, but as of the date of this writing, no follow-up response from the UAIC has been received.

Portions of the project site, particularly those areas on flatter ridge tops or knolls and gentle to moderate south-facing slopes, have moderate sensitivity and potential for prehistoric and historic resources to be discovered. Although the entire site has been surveyed with no cultural findings of significance under CEQA, it remains possible that additional resources could be discovered during project construction activities. Based on the findings of the archaeologist, the project would have impacts that are *less than significant with mitigation*, as identified in Mitigation Measure 5A, which requires construction work to stop and appropriate steps taken if cultural resources are discovered.

**Mitigation Measures:** To offset the potential impacts to cultural resources associated with the project, the following mitigation measures shall be required:

Mitigation Measure 5A. Halt Work and Contact the Appropriate Agencies if Human Remains or Cultural Materials Are Discovered During Project Construction: All equipment operators and persons involved in any form of ground disturbance at any phase of project improvements shall be advised of the possibility of encountering subsurface cultural resources. If such resources are encountered or suspected, work shall be halted immediately within 200 feet of the suspected resource and the Nevada County Planning Department shall be contacted. A professional archaeologist shall be retained by the developer and consulted to access any discoveries and develop appropriate management recommendations for archaeological resource treatment. If bones are encountered and appear to be human, California Law requires that the Nevada County Coroner and the Native American Heritage Commission be contacted and, if Native American resources are involved, Native American organizations and individuals recognized by the County shall be notified and consulted about any plans for treatment. A note to this effect shall be included on the grading and construction plans for each phase of this project. *Timing: Prior to issuance of the grading and improvement permits* 

**Reporting:** Agency approval of permits **Responsible Agency:** Planning Department

## 6. <u>GEOLOGY / SOILS</u>

**Existing Setting:** There are six basic soil types found on the property, Alluvial land (Ao), Hoda sandy loam (HnE), Horseshoe gravelly loam (HrC) Josephine loam (JoC, JoD & JoE), McCarthy cobbly loam (MoE), and Musick sandy loam (MrC & MrE). The Musick soil series represents the dominant soil type in the project area, with the Hoda series also represented heavily in the east- and west-central areas of the project site.

The Alluvial Land soils (Ao) are mostly clays to clay loams deposited along stream courses or in swales. These soils vary from 30-45 inches deep and have an available water capacity (AWC) of 3.5 to 8 inches. Soil permeability is moderately slow to very slow, runoff is slow, and erodibility is none to slight. These soils are considered to be suitable for winter and spring pasture, for range, and for the production of small grains. They are unsuitable for the production of wood products. Where there is sufficient ground water, they are ideal for construction of ponds.

Soils in the east-central portion of the project area, and another inclusion in the west-central portion are dominated by well-drained, very acidic sandy loams in the Hoda soil series. These erodible soils are derived from weathered granite and are described as having a moderate to high hazard of erosion on slopes less than 15 percent and a high hazard of erosion on steeper slopes. Up to 10 percent of the ground surface is in granitic rock outcroppings. Effective rooting depth is more than 60 inches. AWC is 7 to 11 inches and permeability is moderately slow in the subsoil. Runoff is rapid and the hazard of erosion is high. This soil is used for timber production and limited grazing.

The Josephine loam (JoC, JoD & JoE) is underlain by vertically tilted slate, shale, and contact metamorphic rock. Available water capacity is generally 8 to 10 inches for the profile and soil permeability is moderate. Soil runoff is medium and the hazard of erosion is high. Effective rooting depth is 55 to 60 inches or more. This soil is suitable for timber production, limited grazing, and some pasture.

The Musick series (MrC & MrE) consists of well-drained soils underlain by weathered granodiorite at a depth of about 98 inches. The surface layer ranges from sandy loam to loam and the subsoil ranges from loam to clay loam. Up to 10% of the surface area of this series is in rock outcrops. Effective rooting depth is 40-60 inches. AWC is 7 to 11 inches. Permeability is moderately slow in the subsoil. Runoff is medium to rapid and the hazard of erosion is high. These soils are mostly used for timber production and grazing.

Horseshoe gravelly loam (HrC) consists of well-drained soils underlain by stratified sand and gravel. These soils are rolling to hilly and are on terraces of tertiary river gravel deposits. Slopes are 9 to 30 percent. Soil runoff is medium and the hazard of erosion is high. Effective rooting depth is 48 to 60 inches or more. Available water holding capacity is 6 to 10 inches. These soils are mostly used for timber production and grazing.

McCarthy cobbly loam (MoE), consists of moderately deep, well drained soils on tops and sides of flat volcanic ridges. These soils formed in residuum weathered from andesitic mudflows (Mehrten Formation). Slope ranges from 2 to 75 percent. Available water capacity is low, runoff is medium to rapid, and the erosion potential is high. Depth to weathered rock ranges from 20 to 40 inches. Gravel and cobbles range from 15 to 60 percent. These soils are mostly used for timber production and grazing.

No serpentine (Dubakella series) or gabbro-derived soils in the Rescue, Secca, or Chaix variant soil series are mapped in the project area.

According to the Department of Conservation's Fault Activity Map, the nearest fault lines are the Big Bend Wolf Creek Fault Zone approximately 5 miles west of the Ananda Village, the Slate Creek Fault 3 miles to the north, and the Ramshorn Fault approximately 1 mile to the east. All of these faults are prequaternary, or older than 1.6 million years, with no evidence of recent geologic activity. The closest active fault is the Cleveland Hill Fault near Oroville, 30 miles west.

The Nevada County Environmental Health Department has identified possible abandoned mining features on APN 61-210-19 ('Joe Blow' mine) and APN 61-170-34 ('J E Bunduck Ranch' mine).

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Expose people or structures to potential substantial adverse effects, including the risk or loss, injury, or death involving exposure to or production of unstable earth conditions such as landslides, earthquakes, liquefaction, soil creep, mudslides, ground failure (including expansive, compressible, collapsible soils), or similar hazards?		~			A, D, 21, 24, 43, 61
b. Result in substantial disruption, displacement, compaction, erosion, or over-covering of the soil by cuts, fills, extensive grading, or loss of topsoil?		$\checkmark$			A, D, 21, 61
c. Be located on a geologic unit or expansive soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?		V			A, D, 21, 24, 43, 61
d. Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?			~		A, 38, 39
e. Result in excessive grading on slopes of over 30 percent?		$\checkmark$			A, 40

### Impact Discussion 6a-c:

### Seismic Hazards

The site is located outside of the Alquist-Priolo Earthquake Fault Zone Map Area as defined by the State Division of Mines and Geology Special Report 42 of 1997. Said map illustrates active faults that have ruptured in the last 11,000 years. The Act is not applicable to this project because there are no known active faults at or near Ananda Village. The Village is bounded by two north-trending pre-quaternary faults, which lie about one mile east and five miles west respectively. Pre-quaternary faults are generally considered inactive, with no known geologic activity in the last 1.6 million years. The nearest active fault is the Cleveland Hill Fault 30 miles to the west. The primary seismic activity which may affect the site is moderate ground shaking associated with an offsite fault. The preparation of design-level geotechnical recommendations for all grading and improvement plans as identified in Mitigation Measure 6A, as well as compliance with the California Building Code and Nevada County Land Use and Development Code, would ensure that seismic-induced hazards are mitigated to a level that is not substantially adverse.

### Unstable Soils

Based on the lack of plastic clay soil types and the California Expansive Soils Map, Ananda Village does not contain expansive soils. However, much of the proposed development would occur on the Musick sandy loam series, which is classified as highly erodible. To preserve the integrity of the soil and the natural topography of the site as much as possible, new development is sited on slopes under 15 percent to the extent feasible. The project, however, does include some residential development and a new nonresidential building in Rajarshi Park on slopes between 15 and 20 percent. No buildings are proposed on slopes in excess of 20 percent. Future, design-level geotechnical investigations at the site would determine the presence of potentially erodible soils on a building-by-building basis and derive project-specific mitigation approaches as appropriate. Mitigation Measure 6A requires the preparation and implementation of a geotechnical report for all grading and structural work. Performance standards are included to ensure that the project does not result in erosion from the areas of highly erodible soils. Mitigation Measure 6B requires the preparation and implementation of an erosion control plan for all disturbance to reduce impacts from erodible soils. Mitigation Measure 6C would limit grading to the dry season to reduce potential erosion and sedimentation impacts that can occur during and after storm events. With implementation of these measures, impacts related to unstable soils and erosion would not be substantially adverse.

#### Mining-related Geotechnical Hazards

The United States Geological Survey (USGS) Mineral Resources On-Line Spatial Data website identifies APN 61-210-19 ("Joe Blow" mine) and APN 61-170-34 ("J E Bundock Ranch") as having historic mining activity. Some abandoned mining features may have associated physical hazards such as the presence of glory holes, shafts, adits, and stockpiles. Holdredge & Kull performed a site reconnaissance in the identified mine areas but did not observe any surface indications of mining features. Their Preliminary Mine Feature Investigation (January 3, 2017) indicates that the location accuracy reported by USGS is 1,000 meters (0.6 miles), so the reported locations are not considered reliable. Further investigation of associated records, including the U.S. Bureau of Mines Minerals Availability System, Mineral Land Classification Maps, BLM Survey Plats, and a number of historical publications, did not reveal any additional information about the Joe Blow or JE Bundock Ranch features. Although the preliminary investigation did not identify evidence of past mining activity on the property, mining features may still be encountered during future development of the property. If encountered, mining features may pose physical and chemical hazards and therefore should be characterized and mitigated if and when they are identified. Mitigation Measures 6D and 6E would ensure that any mining features encountered in the future would not result in physical hazards by requiring proper closure of any encountered subsurface mine features and characterizing the chemical properties of any mine waste.

In summary, Mitigation Measures 6A through 6E would reduce impacts from unstable slopes, excessive eroded areas, incised drainages, ground depressions, underground mine features, seismic activity, improper disposal of cut soil, and structural stability of retaining walls, and result in impacts that are *less than significant with mitigation*.

*Impact Discussion 6d:* Lincoln and Long Civil Engineering prepared a Sewage Evaluation Report for the project dated December 5, 2013. In preparation for the report, Lincoln and Long researched records of testing, construction, and maintenance of sewage disposal areas built and operated in the last 40 years; researched preliminary exploration performed under the direction of Cranmer Engineering in the early 1990s, and excavated new soil test pits and performed new percolation tests in all areas proposed for development. Deep soils were reported in all areas. Percolation rates varied, but the majority were in the acceptable range for standard centralized systems. Lincoln and Long notes that Ananda Village has a history of more than 40 years of onsite sewage disposal without failure in more than a dozen centralized fields. Soils are therefore expected to adequately support the proposed new sewage disposal systems. All

new sewage disposal fields have been mapped on the Comprehensive Master Plan and Proof of Concept plans. All development requiring sewage disposal would be required to be designed, permitted, and constructed according to standards of the current Nevada County On-Site Sewage Disposal Ordinance and its implementing regulations, which is a standard condition of approval of the project. Impacts regarding sewage disposal would therefore *less than significant*.

*Impact Discussion 6e:* An approximately 400-foot section of Brindaban Way would be constructed through intermittent areas of steep slopes over 30 percent in order to access Cluster M. There is no alternate alignment that could avoid this impact. To address impacts related to erosion and sedimentation from disturbance of steep slopes, the applicant has submitted a Steep Slopes Management Plan by Lincoln & Long Engineering. With implementation of the measures outlined in the management plan as shown in Mitigation Measure 6F, which include no earth disturbance during the wet season and use of best management practices, this impact would be reduced to *less than significant with mitigation*.

**Mitigation Measures:** To offset the potential geology and soils impacts associated with project, the following mitigation measures shall be required:

Mitigation Measure 6A: Implement the Recommendations of a Geotechnical Evaluation for Project Grading and Structural Work: Prior to issuance of grading, improvement, and building permits, a design-level geotechnical report shall be prepared by a licensed engineer and submitted to Nevada County and recommendations therein followed for all subsequent grading and structural work. The final report shall provide recommendations that ensure that any highly erodible soils, if present, are accounted for in the grading design and structural specifications for the site. Performance standards shall include the following:

- 1. All grading and structural work shall meet the performance standards of applicable CBC regulations;
- 2. Construction methods shall be used which minimize risks to structures and do not increase the risk to the site, or to adjacent properties and their structures, from the geologic hazard;
- 3. Development shall not increase instability or create a hazard to the site or adjacent properties, or result in a significant increase in sedimentation or erosion;
- 4. Site planning shall minimize disruption of existing topography and vegetation;
- 5. Excavation and grading shall be minimized to the greatest extent practicable; and
- 6. Any limitations to site disturbance, such as clearing restrictions, imposed as a condition of development approval shall be marked in the field and approved by the county prior to undertaking the project.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Approval of grading, improvement, and building permits *Responsible Agency:* Building Department

**Mitigation Measure 6B: Prepare and Implement an Erosion and Sediment Control Plan.** Prior to issuance of grading and improvement permits for all project-related grading, said permits or plans shall incorporate, at a minimum, the following erosion and sediment control measures:

- 1. During construction, Best Management Practices (BMPs) for temporary erosion control shall be implemented to control any pollutants that could potentially affect the quality of storm water discharges from the site. A Storm Water Pollution Prevention Plan (SWPPP) shall be prepared in accordance with California State Water Resources Control Board (SWRCB) requirements. This SWPPP includes the implementation of BMPs for Erosion Control, Sediment Control, Tracking Control, Wind Erosion Control, Waste Management and Materials Pollution Control.
- 2. If applicable, topsoil shall be removed and stockpiled for later reuse prior to excavation activities. Topsoil shall be identified by the soil-revegetation specialist who will identify both extent and depth of the topsoil to be removed.

3. Upon completion of grading, stockpiled topsoil shall be combined with wood chips, compost and other soil amendments for placement on all graded areas. Revegetation shall consist of native seed mixes only. The primary objectives of the soil amendments and revegetation is to create site conditions that keep sediment on site, produce a stable soil surface, resist erosion and are aesthetically similar to the surrounding native forest ecosystem.

4. Geo-fabrics, jutes or other mats may be used in conjunction with revegetation and soil stabilization. *Timing:* Prior to issuance of grading and improvement permits *Reporting:* Approval of grading and improvement permits *Responsible Agency:* Building Department

**Mitigation Measure 6C: Limit the Grading Season.** Grading plans shall include the time of year for construction activities. No grading shall occur after October 15 or before May 1 unless the Chief Building Inspector or his/her authorized agent determines project soil conditions to be adequate to accommodate construction activities. This condition shall be noted on all grading plans.

*Timing:* Prior to issuance of grading permits *Reporting:* Approval of grading permits *Responsible Agency:* Building Department

**Mitigation Measure 6D: Physically Close any Encountered Mine Features.** Mining features such as open or partially-collapsed shafts, tunnels or pits may present physical hazards and may not be suitable for support of structures, roads or other improvements. Therefore, if mining features are encountered near proposed development areas, they shall be physically closed in accordance with recommendations developed as part of a design-level geotechnical investigation, which may include recommendations for shallow mining excavations such as excavation to reveal the underlying, competent native soil and rock, and then backfilling with engineered fill; and for deeper features, plugging with concrete or foam in accordance with an engineered plan and under the oversight of the local building department.

*Timing:* If encountered during construction *Reporting:* Agency approval of permits *Responsible Agency:* Environmental Health Department

**Mitigation Measure 6E: Characterize the Chemical Properties of any Encountered Mine Waste.** Mine waste (including soil and rock in exploratory spoils piles, mine waste rock, and processed mine tailings) may contain heavy metals and metalloids such as mercury, lead and arsenic that present a health hazard in the case of dust inhalation, ingestion or dermal contact. Therefore, if mine waste is encountered, soil sampling and analysis shall be conducted to determine whether the mine waste presents a potential health risk. Exposure to mine waste shall be avoided, and mine waste shall not be disturbed without prior permitting and approval of the Nevada County Environmental Health Department (NCDEH). If mine waste is found to present a potential health risk, neutralization, removal, or encapsulation shall be conducted as determined appropriate by NCDEH, to levels that do not represent a potential health or other environmental risk.

*Timing:* If encountered during construction *Reporting:* Agency approval of permits *Responsible Agency:* Environmental Health Department

**Mitigation Measure 6F: Minimize Impacts to Steep Slopes.** The following mitigation measures shall be implemented for disturbance of all slopes 30 percent and greater, according to the timing noted in each item. The following shall also be shown as notes on all grading and improvement plans:

1. Soil disturbance is strictly prohibited within steep slopes during the wet season, between October 15 and April 15 of each year.

- 2. Roadway fills shall be compacted to minimum 90 percent relative compaction and surfaced with 4 inches aggregate base (or asphalt if over 16 percent grade). Roadside ditches shall be lined with 8 inches minus riprap in areas over 12 percent slope.
- 3. Best management practices shall be used for site development. Soil disturbance to graded areas shall be limited. Sediment traps such as straw bale barriers or fiber rolls shall be properly installed downhill of soil disturbance areas. The applicant shall implement periodic cleanup of work areas. All sediment devices shall be maintained until a vegetative ground cover is established.
- 4. A fiber roll or barrier (or a row of straw bales) shall be installed on an even contour (barrier may be staggered with about 5 feet of horizontal overlap) as close to the limit of activity as practical (the road area plus about 10 feet for circulation and access, plus any additional length to stay on an even contour). The erosion barrier shall be located on the fall line downhill from the construction activity and shall be wider than the construction area by about 5 feet.
- 5. Both temporary and permanent erosion control measures shall be used. Vegetative ground covers shall be established on all disturbed areas prior to October 15 of each year. A minimum of 10 pounds per acre of creeping wild rye (*Leymus triticoides*), California brome (*Melica californica*), red fescue (*Festuca rubra*), and California melic (*Melica californica*) shall be applied, and cover shall be watered until established. Seed shall be reapplied as necessary to establish a cover for disturbed areas, and the ground cover shall be maintained on a permanent basis.
- 6. The applicant shall inspect erosion control measures on a regular basis and after the first rains and shall remedy any areas which develop erosion by appropriate measures as listed in this mitigation measure.
- 7. Interceptor drains with 8 inches minus riprap lining shall be incorporated above all cut and fill slopes where the ditch slope is 12 percent or greater, to direct drainage around such slopes.
- 8. All slopes created shall be 2:1 or less in steepness.
- 9. Road cross slope shall direct runoff away from fill slopes.
- 10. In areas of 30 percent slope disturbance, it may be necessary to reduce the slope height by using a retaining wall. This will be determined on a case-by-case basis with an onsite inspection by the project engineer to make the final determination.
- 11. Construction shall be completed within 24 months.

*Timing:* Prior to issuance of grading and improvement permits *Reporting:* Approval of grading and improvement permits *Responsible Agency:* Building Department

# 7. <u>GREENHOUSE GAS EMISSIONS</u>

**Existing Setting:** Greenhouse gases (GHGs) are those gases that trap heat in the atmosphere. GHGs are emitted by natural and industrial processes, and the accumulation of GHGs in the atmosphere regulates the earth's temperature. GHGs that are regulated by the State and/or EPA are carbon dioxide (CO2), methane (CH4), hydrofluorocarbons (HFCs), perfluorocarbons (PFCs), sulfur hexafluoride (SF6) and nitrous oxide (NO2). CO2 emissions are largely from fossil fuel combustion. In California, approximately 43 percent of the CO2 emissions come from cars and trucks. Most HFC emissions come from refrigerants, solvents, propellant agents and industrial processes, and persist in the atmosphere for longer periods of time and have greater effects at lower concentrations compared to CO2. The adverse impacts of global warming include impacts to air quality, water supply, ecosystem balance, sea level rise (flooding), fire hazards, and an increase in health related problems.

Assembly Bill 32 (AB 32), the California Global Warming Solutions Act, was adopted in September 2006 and requires that statewide GHG emissions be reduced to 1990 levels by the year 2020. This reduction would be accomplished through regulations to reduce emissions from stationary sources and from vehicles. The California Air Resources Board (ARB) is the State agency responsible for developing rules

and regulations to cap and reduce GHG emissions. In addition, the Governor signed Senate Bill 97 in 2007 directing the California Office of Planning and Research to develop guidelines for the analysis and mitigation of the effects of greenhouse gas emissions and mandating that GHG impacts be evaluated in CEQA documents (California Attorney General's Office 2010). *CEQA Guidelines Amendments for GHG Emissions* were adopted by OPR on December 30, 2009. The NSAQMD has also prepared a guidance document that includes mitigations for general air quality impacts that can be used to mitigate GHG emissions, *Guidelines for Assessing Air Quality Impacts of Land Use Projects* (Northern Sierra Air Quality Management District 2009).

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?		~			A, 11
b. Conflict with any applicable plan, policy or regulation of an agency adopted for the purpose of reducing the emissions of greenhouse gases?		~			A, 11

*Impact Discussion 7a-b:* Given the complex interactions between various global and regional-scale physical, chemical, atmospheric, terrestrial, and aquatic systems, it is not possible to determine to what extent this project's CO2 emissions would result in any altered physical conditions. Typically, cumulative impacts are analyzed and mitigated in a county's General Plan and associated EIR. In this case, the General Plan for Nevada County does not address GHG emissions. Additionally, no thresholds have been adopted by the County, the NSAQMD, or the State for project-by-project greenhouse gas emission impacts. However, it is possible to determine how many GHG emissions would result from the project and to disclose that figure. Using other nearby jurisdictions' thresholds, it is also possible to estimate the project's potential GHG impact levels relative to other development.

Implementation of the proposed project would contribute to increases of GHG emissions that are associated with global climate change. Estimated GHG emissions attributable to future development would be primarily associated with increases of CO2 and other GHGs, such as methane (CH4) and nitrous oxide (N20), from mobile sources and utility usage. Thresholds for greenhouse gases have not been adopted by any relevant agencies, including the California Air Resources Board, the NSAQMD, Nevada County, or the State of California. However, several air districts around the state have adopted thresholds in the range of 1,100 MT CO2e/year for *de minimis* impacts (i.e., project impacts below 1,100 MT CO2e/year would be less than significant) and 10,000 MT CO2e/year for significant and unavoidable impacts. These standards apply to both construction and operation of project.

Short-term GHG emission impacts would result from construction of the site. CO2e is Carbon Dioxide Equivalent, a measurement that expresses units of different greenhouse gases as equivalent to units of carbon dioxide in the ability to affect global warming. For that reason, CO2e is evaluated here. Total CO2e generated by project construction would be approximately 8,420.11 metric tons (MT) over the entire term of construction, which may last up to 25 years given the proposed Development Agreement (CalEEMod Version 2013.2.2 2015, "Run 6 – All Construction"). Assuming a conservative project buildout of only 15 years (the initial term provided in the Development Agreement), annual CO2e emissions generated by the project average 561.34 MT/yr. Many of the GHG construction emissions would occur with infrastructure development such as roads; other CO2e emissions would be generated by the project's construction impacts would not exceed the *de minimis* threshold on their own, but when combined with any ongoing project operations, could exceed the 1,100 MT/yr threshold.

Mitigation Measure 3A, which requires the emissions-reducing measures during construction, would help to reduce greenhouse gas emissions during the project's construction phase.

Typical of residential uses, the proposed project would generate greenhouse gases via vehicle source CO2e emissions and through energy and water consumption and waste production during project operation. As shown in the table, the CalEEMod provides a separate calculations for mobile source emissions and stationary sources. Mobile source emissions are from vehicle travel to and from the various uses, while stationary sources are a combination of energy, waste, water, and area emissions resulting from the operation of the subdivision and related infrastructure. In total, project operation at full buildout would result in the following greenhouse gas emissions:

Pollutant	Residential Emissions (MT/yr)	Temple Emissions (MT/yr)	Retreat Emissions (MT/yr)	Commercial & Industrial Emissions (MT/yr)	Events Emissions (MT/yr)	Total Emissions (MT/yr)
Mobile Source	1,671.2402	117.6190	289.4425	128.8243	98.3671	2,305.4931
Stationary Source	746.4557	424.4443	332.4260	48.4629	59.1650	1,610.9539
Total	2,417.6959	160.0633	621.8685	177.2872	157.5321	3,534.4470

Table 8	. Project	Operation	CO2e	Impacts
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Note: 1. Mitigated operational impact numbers are used.

The project's operational emissions fall over the generally accepted *de minimis* threshold at 3,543.4470 MT CO2e/year, but these impacts are at least partially mitigable. For the operational phase of the project, compliance with the California Green Building Code would ensure that all new residences would be capable of electric vehicle charging, meet the *California Building Energy Efficiency Standards*, reduce or salvage 50 percent of the nonhazardous construction waste, use interior finishes that comply with current VOC ratings, and have only US EPA Phase II-certified woodstoves. Mitigation Measure 7A also requires automatic controls for air conditioning and energy efficient lighting as well as measures to exceed Title 24 requirements at residential build-out. Additionally, Ananda Village is served by several solar installations, which the model did not account for and which substantially reduce long-term GHG emissions. The mixed use nature and the walkability of the Village provide further design-level mitigation for reduction of GHGs on an ongoing operational basis. With the implementation of Mitigation Measures 3A and 7A, construction and operational impacts related to GHG emissions are anticipated to be *less than significant with mitigation*.

**Mitigation Measures:** For construction impacts, see Mitigation Measure 3A. To reduce long-term operational impacts related to GHG emissions, the following mitigation measure shall be required:

**Mitigation Measure 7A. Provide Energy-efficient Utilities:** Residential improvement plans shall include documentation that they comply with the following measures prior to issuance of building permit:

- 1. The project shall use energy efficient lighting (includes controls) and process systems beyond Title 24 requirements where practicable (e.g. water heating, furnaces, boiler units, etc.)
- 2. The project shall utilize water heating featuring low-NOx water heating burners if electric water heating is not used.
- 3. The project shall use energy efficient, automated controls for air conditioning beyond Title 24 requirements where practicable.

*Timing:* Prior to issuance of the residential building permits *Reporting:* Agency approval of building permits *Responsible Agency:* Northern Sierra Air Quality Management District

## 8. <u>HAZARDS / HAZARDOUS MATERIALS</u>

**Existing Setting:** As discussed in Section 6 *Geology/Soils* of this Initial Study, there is evidence of past mining activity on the Ananda Village property on APNs 61-210-19 ('Joe Blow' mine) and 61-170-34 ('J E Bunduck Ranch' mine). The property is not on any list of hazardous materials sites as documented on the Department of Toxic Substances Control's Envirostor website (www.envirostor.dtsc.ca.gov/public/). There are no public or private airports near the project site, with the closest airport being approximately 10 air-miles south of the project site. There is no formal adopted emergency response or evacuation plan for the Ananda Village. However, a Fire Protection Plan (FPP) is proposed as part of the current project, and this FPP does include an evacuation plan. The project site is within a High and Very High Fire Hazard Area for wildland fire (CalFire 2007), with the majority of the center of the site within the High Fire Hazard Severity Zone, and the perimeters within the Very High Zone.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Create a significant hazard to the public or the					
environment through the routine transport, use, or			$\checkmark$		B, 4
disposal of hazardous materials?					
b. Create a significant hazard to the public or the					
environment through reasonably foreseeable upset		$\checkmark$			B, 4
and accident conditions involving the release of hazardous materials into the environment?					
c. Emit hazardous emissions or handle hazardous					
or acutely hazardous materials, substances, or waste					
within one-quarter mile of an existing or proposed		$\checkmark$			B, 4
school?					
d. Be located on a site which is included on a list					
of hazardous materials sites compiled pursuant to					
Government Code Section 65962.5 and, as a result,				$\checkmark$	B, 18
create a significant hazard to the public or the					
environment?					
e. For a project located within an airport land use					
plan or, where such a plan has not been adopted,					
within two miles of a public airport or public use				$\checkmark$	D
airport, would the project result in a safety hazard					
for people residing or working in the project area?					
f. For a project within the vicinity of a private				/	
airstrip, would the project result in a safety hazard				$\checkmark$	D
for people residing or working in the project area?					
g. Impair implementation of or physically interfere			$\checkmark$		1 20 54
with an adopted emergency response plan or emergency evacuation plan?			v		I, 20, 54
h. Expose people or structures to a significant risk					
of loss, injury or death involving wildland fires,					
including where wildlands are adjacent to urbanized			$\checkmark$		I, 20, 54
areas or where residences are intermixed with					-, 20, 01
wildlands?					

*Impact Discussion 8a:* Operation of the proposed project would not result in the routine transport, use, or disposal of hazardous materials other than typical household cleaning agents and other typical household hazardous substances such as paints and solvents. The uses of these materials are regulated by the state and federal government, and any existing and future residents would be required to comply with usage parameters mandated by these laws. Therefore, this impact would be *less than significant*.

*Impact Discussion 8b-c:* Proposed uses, including residential, commercial, office, and educational, would not generate or result in the transport of hazardous materials. Small quantities of hazardous materials would be stored, used, and handled during construction. The hazardous materials anticipated for use are small volumes of petroleum hydrocarbons and their derivatives (e.g., gasoline, oils, lubricants, and solvents) required to operate the construction equipment. These relatively small quantities would be below reporting requirements for hazardous materials business plans and would not pose substantial public health and safety hazards through release of emissions or risk of upset.

There is evidence of past mining activity on the site with abandoned mining features were identified by the USGS Mineral Resources On-Line Spatial Data website on APN 61-210-19 and APN 61-170-34. Mining features can present hazardous conditions either through existing toxic or hazardous chemical constituents that may be released into the environment during project construction or operations, or through the presence of physical mining hazards such as glory holes, shafts, and near-surface tunnels. However, as discussed in *Impact Discussion 6a-6c*, no evidence of past mining activities on the property was uncovered in site investigations. The investigation did reveal two placer gold mines in tertiary gravels to the east of the property, the Badger Hill and Cherokee mines. Tertiary gold-bearing gravels are mapped at these locations. However, based on the local topography, drainage from these off-site historical mining areas flows away from the subject property; therefore, the property is not expected to be impacted by runoff from these historical mining areas.

Although the preliminary investigation did not identify evidence of past mining activity on the property, the investigation findings do not preclude the possibility that mining features may be encountered during future development of the property. Mining features, if encountered, may pose physical and chemical hazards, and, therefore, should be characterized and mitigated if and when they are identified. Mitigation Measures 6D and 6E would ensure that any mining features encountered in the future would not result in physical hazards because they require the closure of any discovered mine features and the chemical characterization of any discovered mine waste. This impact would therefore be *less than significant with mitigation*.

*Impact Discussion 8d:* The Ananda Village site is not on a list of hazardous materials sites pursuant to Government Code Section 65962.5 as documented on the Department of Toxic Substances Control's Envirostor website. There would therefore be *no impact* associated with hazardous materials sites listed pursuant to Government Code Section 65962.5

*Impact Discussion 8e-f:* The project site is not within two miles of a public or private airport or airstrip, but is located approximately 10 miles north of the nearest airport, the Nevada County Airport. The project site is not within any airport overflight safety zones. There would therefore be *no impact* associated with people residing or working near an airport.

*Impact Discussion 8g-h:* Ananda Village is within the North San Juan Fire Protection District (NSJFPD) and the NSJFPD fire planning area. NSJFPD's Community Fire Plan identifies the Ananda Village Center as a regional safe zone within the Ananda/Sages Road sub-region, one of the five sub-regions of the NSJFPD plan area. The Village Center is a safe zone for the San Juan Ridge community area extending from Oak Tree Road on the west to Fandor Road on the east, and Tyler Foot Road on the south to the County line on the north. The Village Center is considered a safe zone due to the large areas of sparse vegetation which form natural fuel breaks. Further, the Community Fire Plan identifies Sages/Salmon Mine/Ayodhya Roads as neighborhood evacuation routes. Proposed road improvements on the Almora Way extension to Sages Road, as well as the offered easement to neighboring property owners to reroute the northeastern extent of Sages Road, would improve the existing evacuation accessibility available to both Ananda Village residents and neighbors living in the Ananda/Sages Road sub-region. All new roads would meet the current fire-safe standard with two 10-foot travel lanes and 1-foot shoulders. Additionally,

the Fire Protection Plan submitted as part of the application materials for the project and required as a condition of approval outlines numerous additional fire safety protection measures such as a fuels management program, an identification of the fire protection water supply system, a description of evacuation routes and fire protection accessibility within Ananda Village, and setback requirements. The application also includes a Development Agreement that provides a fire engine garage at no cost to the NSJFPD, provides a helicopter landing site in the Village, allows use of Ananda Village ponds and water as a helicopter water source and for fire defense training exercises, provides onsite training for Village and community residents in fire safety issues, maintain stored water to maintain current ISO ratings, and maintain the Village Center as a Red Cross emergency/evacuation center. Thus, although the project would add residents to an area of High and Very High Fire Hazard Severity, the project would also have beneficial impacts to the fire safety and defensibleness of Ananda Village and the broader community. There would therefore be *less than significant* impacts regarding wildlife and emergency planning issues.

Mitigation Measures: See Mitigation Measures 6D and 6E.

# 9. <u>HYDROLOGY / WATER QUALITY</u>

**Existing Setting:** Ananda Village is primarily located in the Blind Shady Creek watershed of the Yuba River. The Blind Shady Creek watershed is a 9,285-acre watershed dominated by ponderosa pine forest. There are 3,690 acres of contiguous unimproved tracts greater than 80 acres in the watershed, and the average parcel size is 128 acres. Approximately 89 percent of the lands in this watershed are in private ownership. No "blue line" features (indicating streams) are depicted on the Nevada City or Camptonville USGS topographic maps in the proposed development areas; however, two seasonal (intermittent) blue line streams are located in the southern and western portions of the Village, outside of the proposed new development areas but no ephemeral streams (streams that flow only during storm events) or intermittent streams, ponds, wetlands, or riparian vegetation. Several ponds, seep-fed wetlands, and riparian vegetation are located in Ananda Village as well. The project is not located within a designated flood hazard zone (FEMA 2016). Elevations on the 706-acre Village property range from 1600 feet, where the property touches the Middle Yuba River, to over 2900 feet elevation at the high point.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Violate any water quality standards or waste discharge requirements?		$\checkmark$			A, D, G
b. Substantially deplete groundwater supplies or interfere substantially with groundwater recharge such that there would be a net deficit in aquifer volume or a lowering of the local groundwater table level (e.g., the production rate of pre-existing nearby wells would drop to a level, which would not support existing land uses or planned uses for which permits have been granted)?		V			5, 32, 33, 37, 38, 42
c. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, in a manner that would result in substantial erosion or siltation on- or off-site?		V			A, D, 7, 9

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
d. Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or substantially increase the rate or amount of surface runoff in a manner, which would result in flooding on- or off- site?		~			A, D, 7, 9
e. Create or contribute to runoff water which would exceed the capacity of existing or planned storm water drainage systems or provide substantial additional sources of polluted runoff?		~			A, D, 7, 9
f. Otherwise substantially degrade water quality?		$\checkmark$			А
g. Place housing within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map?				$\checkmark$	A, D
h. Place within a 100-year flood hazard area structures that would impede or redirect flood flows?				$\checkmark$	A, D
i. Expose people or structures to a significant risk of loss, injury or death involving flooding, including flooding as a result of the failure of a levee or dam?				$\checkmark$	A, D
j. Create inundation by mudflow?				$\checkmark$	A, D

*Impact Discussion 9a,e,f:* No "blue line" features (indicating streams) are depicted on the Nevada City or Camptonville USGS topographic maps in the proposed development areas; however, two seasonal (intermittent) blue line streams are located in the southern and western portions of Ananda Village, outside of proposed development areas. Two swales (drainage contours vegetated with upland plant species and containing no evidence of recent flow) occur within the proposed development areas. A total of seven permanent ponds occur on the 706-acre property, and one seasonal pond. In addition, several seep-fed wetlands and riparian vegetation are located outside the proposed development. Although no direct impacts to the water and wetland features or their hydrology would result from the Master Plan Update, in some cases the construction envelopes are within 100 feet of these resources. The details of where these impacts would occur are outlined in *Impact Discussion 4b-4c*, and include but are not limited to encroachment within the 100-foot non-disturbance buffers of a wet meadow, wetlands, ponds, and riparian areas.

Construction and development in close proximity to aquatic resources could indirectly affect water quality from erosion of disturbed soils on slopes above these features, or from stormwater runoff contaminated from construction or from development. Petroleum products could contaminate stormwater if they are spilled or leaked from heavy equipment, diesel pumps, fuel tanks, or vehicles onto disturbed soils, as could the accidental introduction of wash water, solvents, chemical wastes, cement, or other pollutants from the maintenance of equipment during construction. After construction, stormwater can be contaminated from oil and other contaminants leaked in parking areas, heavy metals from roof shingles and other sources, and from fertilizers and pesticides applied to landscaping. Excess nutrients from development runoff can cause algae blooms in ponds, depleting oxygen for fish and other aquatic organisms. Impervious surfaces like rooftops and paved areas increase the amount of runoff, including contaminated runoff.

Water quality could also be indirectly affected following construction by erosion and sedimentation of disturbed soils on slopes above ponds and seasonal wetlands from earthmoving, road grading and

surfacing, culvert replacement and new culverts, and the placement of fill, and the accidental introduction of pollutants during construction (e.g., fuel and oil). Increased sedimentation and turbidity can adversely affect fish, amphibians, and other aquatic organisms, as could the accidental discharge of equipment washwater, fuel or oil, or chemical wastes during construction in close proximity. Uses proposed for the PD-SP zone could also result in the accidental introduction of fuel and oil into the surrounding wetlands, if contaminated runoff is not contained and directed away from the stream, or contained within cement pads or buildings.

The NPDES stormwater program requires permits for discharges from construction activities that disturb one or more acres, and discharges from smaller sites that are part of a larger common plan of development. Because project grading would be in excess of one acre, development activities would require a County grading permit and a Construction Storm Water General Permit, consistent with Construction General Permit Order No. 2009-009-DWQ, issued by the State Water Resources Control Board to address erosion impacts from storm water runoff. The permit would include measures to address clearing, grading, grubbing, and disturbances to the ground, such as stockpiling, or excavation. This permit would also require the developer to prepare and implement a Storm Water Pollution Prevention Plan (SWPPP) with the intent of keeping all products of erosion from moving offsite into receiving waters. The SWPPP includes Best Management Practices (BMPs) to prevent construction pollutants from entering storm water runoff.

Beedy Environmental Consulting prepared a Wetland Habitat Management Plan (April 2014) for the project that addresses potential impacts to affected water features. Mitigation Measures 4D through 4E as shown in the *Biological Resources* section of this Initial Study would help avoid accidental impacts to water quality during construction, minimize or avoid potential indirect effects following construction, and avoid or minimize indirect impacts to downstream resources from the placement of culverts in upland swales to a level that is less than significant. Mitigation measures include timing restrictions, preconstruction planning for locating staging and spoils areas, erosion control measures, pollution control and spill containment guidelines, sediment control measures, and monitoring guidelines.

Compliance with existing regulations and implementation of BMPs outlined in Mitigation Measure 6B would reduce potentially significant impacts associated erosion or siltation on- or offsite to less-thansignificant levels, including in steep slope areas. Mitigation Measure 6C places limitations on the time periods during which grading can occur, with no grading during the wet season unless authorized by the Chief Building Official. Mitigation Measure 9A further prohibits the project from creating new stormwater runoff offsite through the requirement for a drainage report on a site-by-site basis. With implementation of all of the above-referenced mitigation measures, this impact is *less than significant with mitigation*.

*Impact Discussion 9b:* Most of the information used in the preparation of this section is from the Well Capacity Evaluation and Water Supply Assessment by HydroSolutions of California, Inc. (May 2013 and August 2014, respectively) and the Source Capacity Planning Study by Keith Knibb of Sauers Engineering (September 4, 2014). Other sources include the report "Ananda Village 2014 Water Conservation and Groundwater Management" (Ananda Village Planning and Water Department, December 2014) and "Test Well Locations: Ananda Village" (Geoimagery Aerial Photography & Geology, July 2008). The information in these reports is based on over 10 years of data from individual service meter readings, pumping records, well drilling reports, and pump test reports. Projections of well yields were based on pump tests and hydrologic analyses performed by a licensed hydrogeologist. Maps and planning-level designs of the existing water system and proposed system expansion were prepared by Sauers Engineering, Inc., who also reviewed and verified Ananda's demand projections for proposed Master Plan development.

The Ananda water system is supplied exclusively by groundwater pumped from wells on the Ananda Village property. Groundwater is pumped from fractured bedrock underlying the development. The fractured bedrock allows groundwater to accumulate and flow in a locale based on fracture geometry and fracture interconnection, not a porous medium of gravels, sands and silts. Groundwater is recharged from precipitation, percolates into the subsurface and flows into a system of interconnected fractures in the underlying bedrock. The extent of the connectivity of the fractures and hydraulic barriers determines the boundaries of the aquifer. However, identifying specific groundwater flow paths in the fractured bedrock of the San Juan Ridge is difficult to characterize and would still incorporate a high level of uncertainty. To evaluate the groundwater aquifer in the project vicinity, a conceptual model was created, incorporating field observations and available information on lithology, hydrology, topography, climate, vegetation cover, and land use in order to establish a general understanding of the way that water is recharged, stored, and discharged. The resulting characterization allows the groundwater use proposed by the project to be examined in the context of the existing conceptual hydrologic flow paths, and an evaluation made as to expected impacts on the environment and existing water wells (HydroSolutions 2014).

Future development would also be supplied from groundwater. Ananda Village is not served by any water wholesalers and does not anticipate receiving water from any outside sources. Ananda Village has surface water rights, licensed and permitted with the California Water Resources Board, for the storage of 72.5 acre-feet of water in 7 reservoirs, of which 44.3 acre-feet can be withdrawn annually. This water is used for agricultural irrigation, fire suppression, and recreation. The project area is not part of an adjudicated groundwater basin and is not part of any groundwater basin identified by the California Department of Water Resources or covered under the Sustainable Groundwater Management Act of 20143. Current California law places no restrictions on groundwater pumping in the project area (HydroSolutions 2014).

#### Water Supply and Demand

New proposed uses that could result in additional water demand include the following:

- 100 new single-family residences
- Village Center: Office building and market kitchen remodel/expansion (approx. 320 sf)
- Rajarshi Park: New office/warehouse building (4,800 sf)
- Expanding Light: New temple (11,000 sf) yoga studios (4,950 sf), office (3,300 sf) overnight guest accommodations (8,300 sf), 2 shower houses (500 sf each), staff housing (included in residential cap), tent and RV campground, dining pavilion

Water use for special events, including festivals, Spiritual Renewal Week, and the tulip garden tours, is typically handled with portable toilet and hand washing facilities and is therefore not included in the water supply analysis. If these events are eventually connected to permanent fixtures that draw on the site's groundwater wells, that demand would be identified in the monitoring program required under Mitigation Measure 9B.

To determine the average water use, the Source Capacity Planning Study uses the State Waterworks Standards of Maximum Daily Demand (MDD), which is defined as the highest daily water usage recorded in the last 10 years. Rather than categorizing future demand into residential and non-residential, indoor and outdoor water consumption, the Nevada County Environmental Health Department provided a more conservative projection of MDD by assuming that future MDD would be the MDD for the entire Village divided by the existing number of units (to reach a household average), and then multiplied by the proposed number of units. This methodology would result in an MDD at full project build-out (195 dwelling units) of 197,340 gallons per day (Knibb 2014).

For the purposes of ensuring that there is sufficient water supply to meet demand over the course of development of the proposed CMP, development is divided into three phases, with each phase comprising

one-third of the proposed development (36 new units per phase). The following table identifies the project MDD and well capacity for each of these three phases of development.

Table 9: Maximum Day Demand and Wen Capacity by Flase								
Phase	Total units	Projected MDD gpd	Projected MDD gpm	Sustainable well capacity* gpm	Capacity minus MDD gpm			
Existing - 87 units	87	87,054	60	109	49			
Phase 1 - 87 plus 36 new	123	124,476	86	109	23			
Phase 2 - 123 plus 36 new	159	160,908	112	116	4			
Phase 3 - 159 plus 36 new	195	197,340	137	116	(21)			

#### Table 9: Maximum Day Demand and Well Capacity by Phase

\*Four currently permitted wells (Dairy, St. Francis, Ballpark, and Badrinath) have a combined capacity of 109 gpm. Adding the Turtle well (7gpm) by Phase 2 brings the system total to 116gpm (HydroSolutions 2014).

Capacity is adequate for development through Phase 2 (72 additional units and 2/3 of proposed nonresidential development) but would result in a projected deficit of 21 gpm by the end of Phase 3. Source capacity would therefore need to be reviewed and potentially modified prior to any Phase 3 development (Knibb 2014).

State Waterworks standards require that system source capacity plus storage be equal to twice MDD (Title 22 §64554). Table 10 shows projected storage needs for each phase of the development.

Phase	Total Dwelling Units	2 x MDD gpd	Sustainable WellCapacity* gpd	Required Storage (2 x MDD minus well capacity) gallons
Phase 1 - 87 existing plus 36 new	123	248,952	156,960	91,992
Phase 2 - 123 plus 36 new	159	321,816	167,040	154,776
Phase 3 - General Plan Max	195	394,680	197,340	197,340

#### Table 10: Water Storage Requirements by Phase

\*The combined capacity of the four currently permitted wells (Dairy, St. Francis, Ballpark, and Badrinath) is 156,960 gpd. Adding the Turtle well to the system by Phase 2 brings the system total to 167,040 gpd, (Water Study p. 13). Phase 3 figures assume the addition of source capacity so capacity equals projected MDD.

Based on Tables 9 and 10 above and current system MDD/unit of 1,012 gpd/unit, conditions for Phase 1 are a source capacity of 60 gpm and total storage (excluding storage dedicated to fire suppression) of 91,992. Current source capacity of 109 gpm is sufficient. Current storage (excluding fire) of 36,900 is not adequate to meet Phase 1, 2, or 3 demand. Therefore, Mitigation Measure 9B requires that Ananda must meet the storage and capacity requirements of each phase prior to issuance of any building permits for those phases. The Water Study outlines several possibilities for balancing capacity with demand, including: 1) revision of well capacities for meeting peak demand (e.g., Badrinath well may prove to be able to contribute more than 11 gpm to peak demand); 2) shifting of demand from the potable system to irrigation; and/or 3) addition of new wells to the potable system (e.g., Turtle well). At the beginning of each new phase Ananda would be required to provide documentation on current system MDD/unit and the resultant projection of source capacity and storage required for buildout of that phase. The entire source capacity and storage required for the Phase would be permitted and added to the water system prior to issuance of any building permits for that Phase (Knibb 2014).

Groundwater is recharged from precipitation, percolates into the subsurface and flows into a system of interconnected fractures in the underlying bedrock. Water recharge on the property was estimated by three different approaches in the Source Capacity Planning Study, using available data: (1) Water Table

Fluctuation Method, (2) Applied Hydrogeology of Fractured Rocks, and (3) Water Budget Method. These methods provide a range of recharge estimates varying from 160 acre-feet per year, using the most conservative assumption in the applied hydrology method, to between 444 and 579 acre-feet per year, using the other methods. None of these methods includes septic system return to the groundwater fracture. The Village is characterized by many springs and seeps, which suggests the land is more water abundant than many other areas of the Sierra region. Hydrologic analysis conducted for the nearby San Juan Ridge Mine assumed recharge to bedrock was 15 percent of precipitation. These factors, combined with consistency with the other methods, supports using the upper range value for the Applied Hydrology Method (HydroSolutions 2013).

Projected recharge over the 706 acres of Ananda Village is significantly higher than the projected water demand of 28.4 million gallons per year, or about 87 acre-feet per year at complete build-out of the CMP. Adding a conservative projection of an additional 5 acre-feet of pumping from irrigation wells on the property brings the total potable and non-potable groundwater extraction to 92 acre-feet per year, still well below estimated recharge. Annual recharge volumes with the most conservative method, the Water Fluctuation Method, are 1.7 times higher than projected demand, while the other two methods result in recharge ranging from 4.8 to 6.3 times the total demand at build-out. If recharge from septic returns is taken into account, net annual demand on groundwater at project build-out is reduced to 54 acre-feet, resulting in normal-year recharge that is 8 to 11 times greater than net annual demand at build-out (HydroSolutions 2013).

In summary, although source capacity is anticipated to be adequate when groundwater recharge is accounted for, Phase 3 would require mitigation as identified in Mitigation Measure 9B to increase source capacity to the minimum standard. Additional storage would also be needed in all three phases.

#### Sufficiency of Supply in Dry Years

It is estimated that 245 to 357 acre-feet are recharged on the property in a dry year and 191 to 279 acrefeet in a critical dry year using the Applied Hydrogeology and Water Budget methods. Without any water conservation efforts, demand at full build out of the CMP is projected to be 92 acre-feet. Even in a drought emergency (e.g. half of normal rainfall) recharge would still be 2 to 4 times greater than demand. With septic system returns, 30 acre-feet would be recharged to groundwater, effectively reducing the net water withdrawal associated with the project from 92 acre-feet per year to 62 acre-feet. Taking septic returns into account, recharge in a dry year can be expected to be 3 to 5.75 times higher than demand in dry years. Water supply to the project is therefore sufficient for dry years (10 percent probability) and critically dry years (3 percent probability) with implementation of Mitigation Measure 9B as discussed above. With water conservation efforts such as those implemented in 2014 at Ananda Village, recharge would be even higher.

Water system records show that the wells that currently supply the Ananda Water System have remained viable through drought periods. Although water levels are somewhat lower in dry years than in normal years, long-term well capacity and water quality were not adversely affected by continued consistent pumping during drought years. Ananda Village resiliency has increased even more due to adjustments that are made in the well field as a whole as a result of implementation of the Adaptive Groundwater Management Program. Adjusting pumping schedules and pumping rates redistributes the stress in the aquifer resulting in less overall drawdown.

#### Water Conservation

Currently there are no restrictions on how much groundwater an individual land owner can pump. During the present drought the State has imposed groundwater standards in some areas but not in Nevada County, where groundwater depths and yields are highly variable and there is not a predictable water table. Although the winter of 2015-2016 was average and 2016-2017 has been higher than average in terms of precipitation, the last two winters follow a four-year period of severe drought and a longer period of dry years (seven of the nine years since 2007 have been dry and warmer) (California Department of Water Resources 2016), and drought conditions are known to be cyclical in the western United States.

Ananda Village residents work closely together with water system staff and Village management to conserve water during drought years. Ananda Village has the means and culture in place to effectively reduce demand in a drought, including well monitoring, end use demand metering, a licensed water system staff to provide technical expertise, effective leadership and organization through a Village staff and elected Village Council, well-developed means of Village-wide communication, and a spirit of cooperation among community residents, who participate in the cooperative ownership and governance of the development. During the last drought, the Ananda Village Council adopted a goal of 20 percent reduction in residential and nonresidential water use. The Village planning and water system staffs worked with residents to develop a plan to conserve water in homes, businesses, and gardens. Each month, water users were given personalized feedback on their water use (gallons per day per person), with comparisons to other Village users. Conservation tips were published in the weekly Village newsletter and two community meetings were held, where residents shared information on conservation efforts, and information was shared about the state and regional context of the drought. Village staff worked closely with large irrigators, providing them weekly reports on current and past year's water use in the form of tables and graphs. Peak conservation occurred between mid-July and mid-August, when water demand was 26 percent less than average use between 2006 and 2013, and was 31 percent less than demand during the same period in 2013. Overall, Ananda Water System users were able to conserve 20.3 percent from mid-March to mid-October compared to the previous year's use (Ananda Village Planning and Water Department 2014).

Unlike residential subdivisions in which each residence is individually owned, wells may be considerably closer, and groundwater aquifers interconnected among adjacent uses, Ananda's residential and non-residential uses are all under one ownership and are cooperatively managed. The CMP area is 706 acres, and Ananda's wells are clustered in the center of the development and tend to be well buffered to neighboring parcels as previously discussed in this section. Any drawdown of Ananda's wells that may impact neighboring wells would be monitored and remedied under Mitigation Measure 9C, which requires an Adaptive Groundwater Management Program to ensure groundwater levels maintain dynamic equilibrium.

Although low-flow plumbing devices are now routinely required for interior fixtures on new home construction, approximately half of all water used by residential customers in California is devoted to irrigation (California Department of Water Resources 2015). New landscaping for non-residential uses would be required to comply with Nevada County's Landscape Ordinance, which requires native, drought-tolerant plantings in every plant type (tree, shrub, groundcover). Additionally, Ananda has a policy of discouraging lawns and ornamental plantings at new residences and focusing instead on water used for food production. Residential water use per household is significantly below California and Nevada County averages. Residential water use per dwelling unit (du) in 2010 (a dry year), including vegetable gardens and landscaping, was 217 gpd/du. In 2011 (a wet year) residential water use at Ananda Village dropped to 196 gpd/du. NID, the local water supplier for Nevada County, reports that average household water use among its customers is about 400gpd/du. A detailed study of residential water use in California sponsored by the California Water Resources Control Board, estimated that the average California household used 360 gpd. Ananda's existing water conservation strategies and Mitigation Measure 9C's requirement to monitor water supply and demand and adjust water usage and supplies accordingly would achieve water conservation at a level that would not have substantial adverse impacts on water supply.

#### Impacts to Other Users of the Aquifer

Ananda's wells are clustered in the center of the development and are generally well buffered to neighboring parcels. The main production wells located in the central bowl of Ananda (St. Francis, Ballpark, Dairy, and Turtle wells) are all at least 1,600 feet away from the closest neighboring well. The Badrinath well is closer to the Village boundary, and there are five neighboring wells within a quarter of a mile. The closest well is 720 feet to the northwest of the Badrinath well. There are a total of 25 neighboring wells within a half mile of all Ananda water system wells, but only three of those are within the same lithic zone as the Ananda wells. The fractures at these wells are at a lower elevation than Ananda's wells (HydroSolutions 2014).

Examination of depth-to-water measurements taken during all five of the 10-day pump tests showed no evidence that 10 days of continuous pumping affected any of the other wells in the Ananda system, which are closer to each other than to neighboring wells. The Well Capacity Evaluation Report indicates that the radius of influence of the Ananda wells is not likely to extend outside of the Ananda Village Boundary. Potential impacts on neighbors are also reduced by the well field pumping limits that Ananda has placed into their operational program, implemented through the Adaptive Groundwater Management Program in Mitigation Measure 9C. Productive fractures would not be dewatered. This goal allows continued flow of groundwater to other water users (HydroSolutions 2014).

A key component of the Adaptive Groundwater Management Program is monitoring of water levels in Ananda's wells, using automated pressure transducers and data loggers that record depth to water at least every 45 minutes. Operation of the water system in 2014 was informed by monthly review of the data from the two wells (Dairy and St Francis) that supplied the community's potable water. Pumping from the wells was adjusted as needed to maintain pumped water levels above the water producing fractures and to keep pumped and static water levels within the ranges observed in historical data. Based on this data, pumping from the Dairy and St Francis wells was adjusted during 2014 (HydroSolutions 2014).

Through the implementation of Mitigation Measure 9C, Ananda is proposing to manage pumping in all of its potable system wells to prevent dewatering of the water producing fractures, thus maintaining the dynamic equilibrium of the regional aquifer. This would protect the health of both Ananda's wells and neighboring wells. This strategy has already been successfully maintained during dry years and normal precipitation years. All wells in use in the potable system would have equipment to automatically record depth-to-water. Quantity of water pumped is continuously metered and recorded daily. End-use would also be metered at all service connections. Development would be slow, over two decades or so, and during this time, data would be collected from all the wells. A baseline of seasonal depths, water quality, recharge rates, and well flows would be established for each well. Ananda would adjust pumping rates and spread demand among the system wells so that water producing fractures are not dewatered in any of the wells.

The management goal is to maintain pumped water levels above the shallow-most fracture. The practice of not dewatering fractures would ensure that the aquifer system is maintained in a dynamic equilibrium, thus protecting the health of Ananda wells and neighboring wells. Change in water quality, water level recovery rates, or pump flow would also be used as triggers for shifting supply source, or managing demand until the affected well stabilizes within the pre-defined safe range. In addition, future development would occur slowly, probably over several decades, the capacity and organization to manage water supplies exists at Ananda Village, and Ananda has a record of effectiveness. Ananda has a number of alternatives to maintain balance between demand and supply and thereby ensure aquifer health for all users including:

Reducing demand on the potable system by shifting some irrigation demand to existing irrigation wells

- Shifting supply among wells that have different characteristics and vulnerabilities
- Developing new sources of supply
- Managing development to reduce demand in the long-term
- Managing demand through operational and behavioral changes to meet short-term supply fluctuations (drought contingency plan)

With implementation of Mitigation Measure 9B and the Adaptive Groundwater Management Program in Mitigation Measure 9C, impacts to potential other users of the aquifer(s) would be reduced to a less than substantially adverse level.

#### **Conclusion**

There is a certain degree of hydrologic uncertainty inherent in fractured rock systems. However, there is a preponderance of evidence to suggest that water resources for this project are adequate to meet projected demand without significant effect on the aquifer system, with the implementation of Mitigation Measures 9B and 9C which would require adequate water supply and storage, as well as monitoring and adjusting of groundwater use. This impact is therefore *less than significant with mitigation*.

Impact Discussion 9c-d: Although Ananda Village contains several water features, none of these would be altered or directly impacted by development. Potential impacts from construction and earth disturbance within the non-disturbance buffers of these features would be minimized as described above under Impact Discussion 4b-c. Therefore, impacts associated with the alteration or changes in watercourses would be **less than significant with mitigation**.

*Impact Discussion 9g-j:* There is no flood hazard or designated flood zone on the project site or in proximity to any of the residential or non-residential development locations. Therefore, there would be **no** *impact* associated with placement of housing or structures within a 100-year flood hazard area as mapped on a federal Flood Hazard Boundary or Flood Insurance Rate Map or other flood hazard delineation map.

**Mitigation Measures:** See Mitigation Measures 4C, 4D, and 4F. To reduce additional impacts associated with increased stormwater runoff and the increased use of groundwater, the following measures shall apply:

**Mitigation Measure 9A. Avoid Increased Stormwater Runoff:** Prior to issuance of permits for each development area, the applicant shall provide a drainage report prepared by a registered civil engineer that demonstrates no net stormwater runoff from the proposed project. The drainage report shall include an analysis of net runoff from the project site and design for one-year, ten-year, and 100-year storms. All stormwater drainage shall be designed by a registered civil engineer, and the designer shall utilize County standard plans and specifications. No additional net stormwater runoff offsite shall be permitted.

*Timing:* Prior to issuance of grading, improvement, and building permits *Reporting:* Permit approval *Responsible Agency:* Nevada County Building Department

**Mitigation Measure 9B. Provide Adequate Water Supply for New Development:** Prior to issuance of building permits for each phase as specified below, the applicant shall provide adequate water storage and sustainable well capacity as required by State Waterworks standards. Storage and capacity requirements may change if system maximum daily demand (MDD)/unit changes.

1. The thresholds defined in Condition A.7 relate to three "phases" of development, which are defined herein for the purpose of water supply and demand monitoring. Phase 1 is defined as all development up until Threshold 1 is reached. Phase 2 is defined as all development up until Threshold 2 is reached. Phase 3 is defined as all development after Threshold 2 up to full build out.

- 1.2. Prior to issuance of permits for each phase of development (defined in Condition C.7as 36 new units per-phase), the applicant shall submit a plan check for the review and approval of the Environmental Health Department. Additional sources and/or storage shall not be connected to the potable water system without prior approval. The applicant shall demonstrate that the water system has sufficient source capacity and infrastructure to meet the storage/source requirements, including any dedicated fire storage requirements, prior to initiating development of the nexteach phase of the referenced project per CCR Title 22, Section 64554.
- 23. Prior to issuance of building permits for Phases 2 and 3, the applicant shall provide monitoring data and documentation to the Environmental Health Department to demonstrate current water use and the resultant need for source capacity and storage required for buildout of that phase. The entire source capacity and storage required for the Pphase will be permitted and added to the water system prior to occupancy of any building included in the next Pphase. If sufficient water supply does not exist for any units up to the maximum allowed in the respective phase, those units may not be constructed until such time as sufficient supply is permitted by the County.
- 43. The applicant shall keep all wells active, to potable water standards, and perform all the required water quality testing for each well that is used to demonstrate the source capacity for each phase of the project they are currently in and all prior phases.

*Timing:* Prior to issuance of building permits for each phase *Reporting:* Permit approval *Responsible Agency:* Nevada County Environmental Health Department

**Mitigation Measure 9C. Implement an Adaptive Groundwater Management Program:** An Adaptive Groundwater Management Program (AGMP), as detailed in Section 6.4 of the Source Capacity Planning Study (Knibb 2014) shall be implemented during project operations to provide the data needed to prove adequate water supply prior to each phase of development and to provide adaptive measures as needed during project operations. Measures include the following:

- 1. Manage Monitoring:
  - a. Water levels shall be recorded via pressure transducers and dataloggers at least every 45 minutes (more frequently if warranted). Data from the transducers shall be downloaded at least monthly. In peak irrigation periods, from June 1 to October 31, data shall be downloaded more frequently (twice monthly to weekly), depending on the perceived need for closer monitoring.
  - b. Pumping volumes shall be measured daily at all operating wells.
  - c. Water samples shall be collected from each well and analyzed for general physical properties and mineral and inorganic constituents, as required by the California Department of Public Health for public domestic water supplies.
  - d. Precipitation shall be monitored from the Grass Valley climatological station, as well as from several local, unofficial sources.
  - e. Ananda shall consult annually with a certified hydrogeologist to verify the integrity of monitoring systems and equipment, and to analyze the data described above. The hydrogeologist shall identify trends and recommend adjustments to operating procedures, as needed, to ensure achievement of these goals.
  - f. Raw data shall be sampled for a variety of parameters, including maximum and minimum depthto-water in a 24-hour period, number of daily pumping cycles, recovery levels and rates between pumping cycles, and proximity of water levels to water-producing fractures. Water quality sampling results shall be reviewed for consistency with historical sampling at the same wells.
  - g. Data shall be presented graphically, when appropriate, to allow easy interpretation and comparison, including the display of historical data with current readings. A number of key parameters shall also be generated for each download period to allow a quick check on the water system as shown in sample hydrographs in Appendix 3 of the Source Capacity Planning Study.
  - h. All monitoring data shall be stored in digital files that are backed up to at least two locations.
- 2. Manage Groundwater Pumping:

- a. Manage pumping to maintain water levels above the fractures identified in the well driller's report for each well. The initial goal for each well will be that the maximum depth-to-water is always at least five feet above a major producing fracture. This goal may be modified as more data becomes available for each well.
- b. Manage pumping to ensure that recovery patterns and rates remain in the range observed in historical data, which have proven to be sustainable. Daily recovery levels (maximum water level measured in a 24-hour period) shall be compared with previously observed values of this parameter for that date. Wells that lack historic data will be phased in gradually until a "normal" recovery range is established. In addition, each well shall periodically be taken out of service long enough to allow full water level recovery, while recovery levels and rates are monitored. Deviation from previously observed recovery rates and levels could signal the need for modification of the pumping regime. Pumping shall be managed so water level recovery stays within the ranges established for each well.
- c. Adjust pumping if monitoring shows that water levels have exceeded the depth-to-water threshold for a well, or a change is observed in the behavior or water quality of a well from historic patterns. Management options include redistributing pumping among the wells to reduce demand on the affected well and reducing system demand (for example, coordinating large irrigation uses to avoid unnecessary peaks in demand or instituting the drought contingency plan described below). If monitoring or onsite observations result in a significant change in water quality, water data shall be monitored more frequently until the affected constituents stabilize.
- 3. Manage Supply and Demand:
  - a. When or if additional source capacity is needed, Ananda shall shift summer irrigation demand from potable systems to other known but undeveloped or underutilized sources; and or develop new sources of supply.
  - b. The applicant shall track water consumption within the Village and use the data to manage demand (e.g., managing MDD and implementing drought contingency measures).
  - c. During times of drought, conservation measures shall be used as appropriate and when needed to manage groundwater supply.

Timing: Ongoing

#### **Reporting:** As needed

Responsible Agency: Nevada County Environmental Health Department

# 10. <u>LAND USE / PLANNING</u>

**Existing Setting:** Ananda Village contains a mix of land uses and organic development of the site that has occurred slowly on an as-needed basis, typically expanding from various core use areas. On the 706-acre project site, most of the land (683 acres) is devoted to residential clusters, agricultural operations, trails, and open space. Interspersed throughout this 683 acres are also other use types that provide economic sustenance, jobs, and services to village residents such as the Expanding Light Retreat, a complex of meditation and yoga retreat facilities; the Crystal Hermitage gardens, a seasonally popular tourist destination and wedding facility that typically requires an entry or rental fee and features a small gift shop; and the Living Wisdom School, a school campus that provides education for grades pre-K through 12 both for onsite residents and those outside the Village. The Village also contains a core commercial area close to the public entrance, the Village Center, as well as an office and planned development use area, Rajarshi Business Park. These sites contribute to the sustainability of the Village in terms of job-housing balance and provision of needed amenities and services for which residents do not typically have to travel outside the village. General Plan designations and zoning districts on the site mirror the actual uses as shown in Table 11 below:

General Plan Designation	able 11: Land Uses, Designations, and Distri Zoning District	Acreage	Actual Uses
Overall: Planned Development	Overall: N/A	706	N/A
Allows a variety of land uses,		acres	
including single-family and			
multi-family, residential,			
commercial, industrial, open			
space, and/or other land uses			
consistent with the capability and			
constraints of the land.			
Subcategory: Estate	AG-PD-SP (Agricultural base district	683	Clustered residential
Provides for low density	with Planned Development and Site	acres,	development,
residential development at a	Performance combining districts)	195	agricultural operations,
minimum lot size of 3 acres per	AG base district: Provides for farming,	units	Expanding Light
dwelling unit in areas which are	ranching, agricultural support facilities and		Retreat, Crystal
essentially rural in character, but	services, low intensity uses, and open space.		Hermitage gardens,
are adjacent to Community	PD overlay: Allows residential, commercial,		Living Wisdom School
boundaries or near Community	and industrial development and support uses		U
Regions.	with flexible standards.		
	SP overlay: Allows refinements in site		
	development standards and/or the permitted		
	uses in the base zone district.		
Subcategory: Planned	PD-SP (Planned Development base	17 acres	Offices within Rajarshi
Development	district with Site Performance combining		Business Park
Allows a variety of land uses,	district)		
including single-family and	PD base district: Provides for		
multi-family, residential,	comprehensive planning, clusters intensive		
commercial, industrial, open	land uses, and maximizes conservation of		
space, and/or other land uses	open space in a manner sensitive to site		
consistent with the capability and	capabilities and constraints. Encourages		
constraints of the land.	innovative design and mixed uses.		
	<u>SP overlay</u> : See above.		
Subcategory: Neighborhood	C1-PD-SP (Neighborhood Commercial	6 acres	Commercial uses and
Commercial	base district with Planned Development		administrative office
A commercial designation that	and Site Performance combining district)		within the Village
provides for local needs of	C1 base district: Provides for retail and		Center
nearby neighborhoods, and	service needs of nearby neighborhoods,		
limited mixed use employment	provide mixed use employment		
opportunities, within Community	opportunities.		
Regions or as part of the	<u>PD overlay</u> : See above.		
development of Rural Centers.	<u>SP overlay:</u> See above.		

Table 11: Land	Uses, Designation	s. and Districts

As shown above, Ananda Village has an overall General Plan land use designation of Planned Development (PD) which is intended to provide for a mix of land uses consistent with the capabilities and constraints of the land. The PD designation is then divided into the subcategories of Estate (683 acres, 195 dwelling units), Planned Development (17 acres), and Rural Commercial (6 acres). Most of the site has an Estate sub-designation for clustered residential and agricultural-type uses, though the overriding PD designation allows other uses such as the Expanding Light Retreat, the Crystal Hermitage Gardens, and the amphitheater, used mostly for musical events. Within the Neighborhood Commercial sub-designation is the primary industrial and office use area within the Village (Rajarshi Business Park). Zoning districts assigned to the site are consistent with the General Plan designations.

The Planned Development combining district requires the preparation of a Comprehensive Master Plan for the property, and the Site Performance combining district is the implementing mechanism for the CMP.

Lands surrounding Ananda Village are primarily rural residential and agricultural (dry grazing) parcels ranging from as small as 1.5 acres to 120 acres, most with 40-acre densities in the AG or FR zoning districts. Some of the parcels are residentially developed and some are undeveloped. A small Bureau of Land Management parcel abuts the eastern boundary of the project. RCD Engineering, an industrial use within a PD zone, is located nearby to the east as well. Tahoe National Forest lands abut the 706-acre Village at the northern boundary in the Middle Yuba River canyon.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in structures and/or land uses incompatible with existing land uses?			$\checkmark$		A, 51
b. The induction of growth or concentration or population?			$\checkmark$		A, 51
c. The extension of sewer truck lines or access roads with capacity to serve new development beyond this proposed project that would result in growth inducement?			~		А
d. Conflict with any applicable land use plan, policy, or regulation of an agency with jurisdiction over the project (including, but not limited to the general plan, specific plan, or zoning ordinance) adopted for the purpose of avoiding or mitigating an environmental effect?			~		A, 51, 52
e. Physically divide an established community?				$\checkmark$	А

*Impact Discussion 10a:* The project includes a proposal to bring the residential density on the site up to the General Plan-approved density of 195 units, or 108 units above the current approved density of 87 units. New residential uses would occur in two formats: as in-fill within existing residential clusters and in new residential clusters primarily in the northern and northeastern areas of the 706-acre project site that are currently undeveloped. All new residential uses would occur within areas zoned AG-PD-SP and would not be located near any incompatible use areas such as industrial or commercial areas.

The project also includes new non-residential development, including the following:

- Village Center: Maintenance shed, office building, solar shade structure (11,200 sf), fire engine garage (approx. 875 sf), and market kitchen remodel/expansion (approx. 320 sf).
- Rajarshi Park: New office/warehouse building (4,800 sf).
- Expanding Light: New temple (11,000 sf) yoga studios (4,950 sf), office (3,300 sf) overnight guest accommodations (8,300 sf), 2 shower houses (500 sf each), staff housing (included in residential cap), tent and RV campground and dump station, dining pavilion, memorial area and pergola (approx. 700 sf).

The proposed new non-residential uses as described above would all occur within existing developed areas that contain the same types of uses. The proposed new uses would therefore be compatible with the existing uses. Therefore, there would be *less than significant* impacts regarding incompatibility with existing land uses.

*Impact Discussion 10b,c:* The proposed project would add 108 units to the approved density allowance for the site, but this is not considered a growth-inducing impact because the resulting population growth was already anticipated and approved by the Nevada County Board of Supervisors when they adopted the General Plan and General Plan EIR in 1996. The Board found at that time that the growth-inducing impacts of the General Plan would be significant and unavoidable, and adopted findings of overriding consideration that the social and economic benefits outweighed the significant environmental impacts of this growth. These findings apply to any future uses of the same intensity, density, and type as those evaluated in the General Plan EIR, and the proposed project is consistent with the uses anticipated for the site in the General Plan.

Infrastructure for the project is either in place, already on the site with the need only for internal extension, or would be developed onsite, as with sewage disposal. There is no public sewer or public water available to the site and no extension required as the site would be served by private systems for these facilities. With the exception of secondary access for the northern residential clusters which will occur via the new Almora Way extension (see Figure 10) to Sages Road, all access extension would occur onsite. The Almora Way secondary access extension is already partially physically in place and would simply require improvements to bring the access to current Fire Safe Road standards. Therefore, there would be *less than significant* impacts related to growth inducement.

*Impact Discussion 10d:* The project seeks to further bring existing developed areas into more substantial conformance with available zoning by modifying the zoning of an existing developed area adjacent to the Village Center, which contains a shed and maintenance building, from AG-PD-SP to PD-SP which allows for more intensive uses.

General Plan policies that relate to the project include the following. Each policy is followed by a discussion of how the project contributes to the individual goal or supports the individual policy:

Land Use Element Policies:

- Policy 1.2.4.e states that the Estate land use designation provides for low density residential development at a minimum lot size of 3 acres per dwelling unit, as well as agricultural operations and natural resource-related uses. In the case of the proposed project, clustered residential uses and agricultural uses would dominate the Estate-designated areas.
- Policy 1.2.4g states that the Neighborhood Commercial land use designation provides for local needs of nearby neighborhoods and limited mixed use employment opportunities with controlled access to arterial or collector roads. This project's commercial-designated lands serve the local community and are located within close proximity to Tyler Foote Road.
- Policy 1.2.4t states that the Planned Development land use designation allows a variety of land uses, included residential, commercial, and industrial with an emphasis of clustering intensive land uses. The project site has an overriding Planned Development designation which is appropriate for the mixed use character of Ananda Village, and has a Planned Development subdesignation on the office/industrial uses of Rajarshi Business Park.
- Policy 1.3.2 provides for only those types and densities of development which are consistent with the open, pastoral character which exists in Rural Regions. The proposed use requires lower levels of service because of the self-sustaining nature of Ananda Village and preserves open space throughout the community, including 54 acres of dedicated oak woodland preservation and restoration area.
- Policy 1.3.11 encourages future improvements of public and private facilities/services to enhance the specific character and lifestyle of Rural Regions. The project includes the addition of internal trails.
- Policy 1.3.12 states that in Rural Regions development shall be driven and determined by land use designations and the need to provide additional road circulation in areas where there is inadequate

secondary safety access. This project is in compliance with land designations and will provide secondary access for onsite and circulation for all new residential clusters.

- Policies 1.5.3 and 1.5.4 encourage the minimization of impacts to environmentally sensitive resources and promote the maintenance of open space. This project is designed in such a way that avoids environmentally sensitive resources and constraints such as oak woodlands, water features, and steep slopes. Where impacts would occur, the project meets the performance criteria with the implementation of the mitigation measures and conditions of approval required as part of the Oak Habitat, Wetland, and Steep Slope Management Plans.
- Policy 1.5.5 supports the use of clustering to maintain open space, and the pastoral character of Rural Regions. The project includes clustering of residential and non-residential development to minimize disturbance across the site.

Public Facilities and Services Element Policies:

- Policy 3.16 requires that a legally enforceable mechanism be in place to ensure long term maintenance of any community or sewer water systems. Ananda Village maintains a community water system, and long-term maintenance of this system will be required by the State.
- Policy 3.19A requires that onsite stormwater runoff resulting from a proposed development project does not increase over pre-project levels following construction, which is a condition of approval for the project.

Circulation Element Programs and Policies:

- Policy LU-4.1.1 establishes Level of Service (LOS) C as the acceptable LOS for community regions, with which this project is compliant.
- Program LU-4.1.4 requires the payment of Traffic Mitigation fees, which this project is required to pay.
- Policy MV-4.2.10 requires any discretionary development served by a dead end road and located beyond the dead end road limit to construct secondary access roads in accordance with Chapters XVI and XVII of the Land Use and Development Code. This project is constructing secondary access for those portions of the project that exceed the dead end road limit.
- Goal RD-4.1 encourages the reduction of dependence on the automobile. This project's mixed uses, close proximity to jobs and services within the village, and jobs-housing balance encourages alternative modes of transportation.
- Policy RD-4.3.6 encourages the provision of alternative transportation routes, and this project is
  providing numerous trails to access different parts of the village as well as clustered development
  which encourages multi-modalities.
- Goal EP-4.3 encourages the reduction of greenhouse gas emissions to the extent feasible during the design phase of construction projects. This has been achieved with the design of the Comprehensive Master Plan as a mixed-use, clustered project, as well as with the installation of numerous solar systems throughout the community.

Open Space Element Goals & Policies:

- Policy 6.2 encourages clustering of development to preserve open space in Rural Regions. The project is clustering development, creating de facto open space, as well as setting aside 54 acres as an oak woodland preservation and restoration area.
- Policy 6.9 requires Comprehensive Site Development Standards to be used in project review of all discretionary project permits to determine open space requirements for each project. These standards were utilized for this project, and the project meets standards.

Housing Element Goals & Policies:

Policy EC-8.6.1 encourages energy efficient site design for new planned developments, including
maximizing proper solar orientation, encouraging walkability, providing usable open space, and

locating residences within walking distance to needed amenities, all of which the project is designed to accommodate and promote.

- Policy EC-8.6.2 supports neighborhood-serving commercial activities to reduce vehicle miles traveled. The project includes commercial uses within walking distance to new residences.
- Policy EC-8.6.3 promotes infill within existing residential neighborhoods. The proposed project includes infill within existing residential clusters.
- Policy EC-8.6.4 promotes energy efficiency and alternative energy sources, including passive and active solar design, water conservation features, and solid waste reduction and recycling. The project's new residential clusters are all sited to take advantage of passive and active solar opportunities. The project's Development Agreement includes requirements for the maintenance of a solid waste and recycling collection facility, and the project will be strongly incentivized to conserve water to meet the phasing requirements as outlined in the Source Capacity Planning Study.

### Safety Element Policies:

- Policy FP-10.8.11 includes development standards related to water supply to reduce hazards associated with the structural/wildland interface. This project complies with this policy with the numerous fire protections in place as noted in the Fire Protection Plan.
- Policies FP-10.11.1 and 2 support defensible space protections. This project is conditioned to comply with those standards and implement defensible space policies.
- Policy GH-10.2.1 requires new construction to meet current structural and safety standards. This
  will be required of the project during the building permit approval process.
- Policy GH-10.2.1.3 requires California Building Code compliance, particularly with regard to seismic design, which will be required of the project during building permit approval.
- Policy FH-10.3.2 directs the County to avoid potential increases in downstream flooding through project site plan review and the application of the County's Comprehensive Site Development standards. This project will adhere to this policy with the submittal of a drainage report that requires no-net increase in storm water runoff from the site.

## Water Element Policy:

 Policy 11.6A requires that new development minimize the discharge of pollutants into surface water drainages. The project will be held to this standard through the application of the projectspecific conditions of approval and mitigation measures, the County's Grading Ordinance, and the design of the onsite drainage facilities.

### Soils Element Policy:

- Objective 12.1 seeks to minimize earth movement and disturbance which this project does through use of clustered development and infill within existing developed areas.
- Policy 12.4 requires that discretionary projects implement erosion control measures. This would be accomplished through the application of the County's Grading Ordinance.

## Wildlife and Vegetation Element Objective and Policy:

- Policy 13.1 requires sensitive environmental features to be retained as non-disturbance areas through clustered development. This project is avoiding all sensitive resources where feasible.
- Policy 13.2A requires a site-specific biological inventory and mitigation measures for new discretionary development. A biological inventory and appropriate mitigation measures and management plans will be implemented for the project.

## Air Quality Element Policy:

Policy 14.1 encourages the County to cooperate with the Air Quality Management District during the review of development proposals to address cumulative and long-term air quality

impacts. This project is consistent with this policy as the County has consulted with the NSAQMD and has incorporated specific mitigation into the project's environmental document based on the consultation comments provided to the County by NSAQMD.

Forest Element Policy:

• Objective 15.2 promotes the continued diversity and sustainability of forest resources, including timber, watersheds, wildlife habitat, aesthetics, and recreation. Ananda Village has a Forest Management Plan to provide for and promote these values.

Agriculture Element Policy:

- Policy 16.1 encourages agricultural operations in Rural Regions. The project includes ongoing agricultural operations, including livestock grazing and organic farming, in order to provide food to residents of Ananda Village.
- Policy 16.9 supports clustering of new development in Rural Regions and the provision of a buffer between residential development and adjacent agricultural uses. The project includes clustering of development and at least 100 feet of buffer around the entire property and adjoining AG-zoned properties.

Aesthetics Element Policy:

- Goal 18.1 promotes aesthetic design in new development which reflects existing development. The project includes Design Guidelines that ensure that new development will be consistent with existing development in Ananda Village.
- Goal 18.2 supports the preservation of important scenic resources. The project would not degrade important scenic resources, and all new development located on ridges, as discussed in Section 1 of this Initial Study, would not have near-range view from public vantage points.

Cultural Resources Element Policy:

• Goal 19.1 encourages the protection of historical and archaeological landscapes, sites, buildings, features, and artifacts. Cultural resources inventories have been prepared for the proposed project and no features that have been identified as significant under CEQA.

As seen from the above discussion, the proposed project is consistent with existing General Plan designations, densities, and allowable uses within the zoning district on the site. Because the project Therefore, this project would have *less than significant* impacts related to land use compatibility.

*Impact Discussion 10e:* The project proposes to add new development consistent with and compatible within existing development within Ananda Village. The project would not divide an established community. Therefore, there would be *no impact* related to division of an existing community.

Mitigation Measures: None required.

# 11. <u>MINERAL RESOURCES</u>

**Existing Setting:** The project area is not mapped as being within a significant Mineral Resource Zone (MRZ-2), though lands designated MRZ-2 are located approximately 570 feet to the east. However, there are two identified historic mines on the property on APN 61-210-19 and APN 61-170-34. Immediately east of the site are hydraulic diggings, including Badger Hill Diggings and Cherokee Diggings.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?			$\checkmark$		A, D
b. Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?			$\checkmark$		A, D, 51

*Impact Discussion 11a-b:* There are no known significant minerals under this project site. Former claims or mines on the site are no longer viable as the site has been in use as a rural residential and agricultural area for decades. The project would not preclude the development of nearby mineral resources because proposed uses would be located over 1,000 feet from the areas designated as MRZ-2 to the east. There would be *less than significant* impact related to the loss of known mineral resources.

Mitigation Measures: None required.

### 12. <u>NOISE</u>

**Existing Setting:** The project is within the Ananda Village boundaries, an area with low levels of existing noise due to limited traffic and other noise-producing uses in the project vicinity. Existing noise sources include Tyler Foote Road to the south, internal traffic (which produces relatively little noise given the low speed of traffic), low-intensity residential uses which produce occasional noise from landscape maintenance equipment, farm and garden equipment for agricultural uses, and occasional special events such as seasonal festivals.

Sensitive noise receptors in the project vicinity include internal residential uses as well as offsite rural residential uses on all sides. Also considered noise-sensitive by the Ananda community is the meditation and yoga retreat center located in the south-central area of the Village. All of these uses are within the AG zoning district. The LUDC has established daytime noise levels for the AG-zoned uses, as well as other zoning on the property, as follows:

Zoning District	Time Period	Noise Level Leq (average)	Noise Level Lmax (maximum)
	7 am – 7 pm	55	75
AG	7 am – 7 pm 7 pm – 10 pm	50	65
	10 pm – 7 am	40	55
C1	7 am – 7 pm	70	90
	7 pm – 7 am	65	75
$PD^1$	N/A	80	90

Table 12: General Plan/Zoning Ordinance Exterior Noise Limits

Notes:

1. There are no standards for PD-zoned property, so the standards for the closest type of use, Light Industrial (M1), are used.

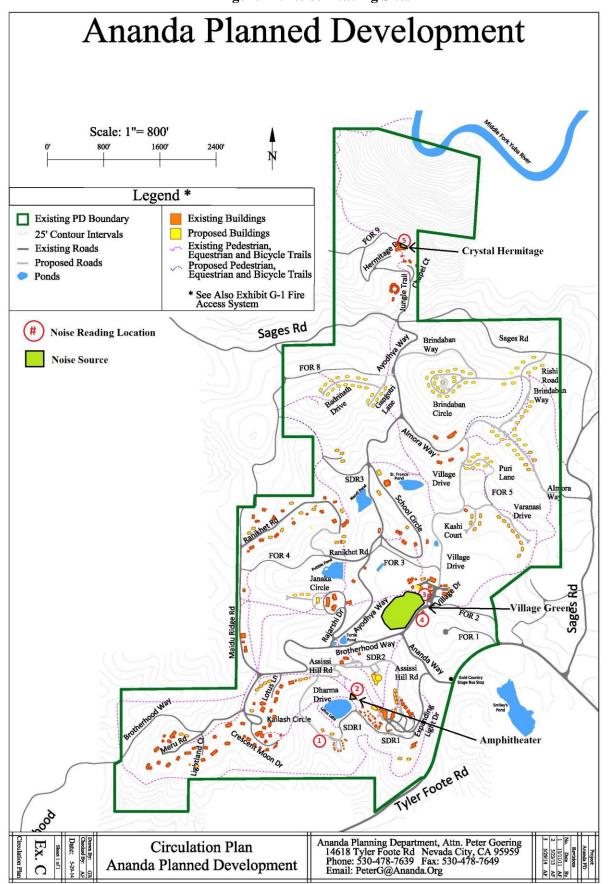
CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Expose persons to or generation of noise levels in excess of the County's adopted standards established in the General Plan and Land Use and Development Code?		~			A, 51, 52
b. Expose persons to or generate excessive ground borne vibration or ground borne noise levels?		$\checkmark$			А
c. Result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project?		$\checkmark$			A, 51, 52
d. Result in a substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project?		$\checkmark$			A, 51, 52
e. For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the project area to excessive noise levels?				V	А
f. For a project within the vicinity of a private airstrip, would the project expose people residing or working in the project area to excessive noise levels?				~	А

*Impact Discussion 12a,c:* The proposed project will generate additional incremental noise in the form of increased traffic on internal roadways and on off-site roads such as Tyler Foote Road and State Route 49. However, increased traffic levels resulting from the project are not expected to result in substantial adverse impacts for a number of reasons. The speed limit within Ananda is generally 25 mph, and lower speed limits result in lower noise levels. Furthermore, because most necessary services and goods are available within the Village within walking and bicycling distance, onsite traffic is minimal relative to other single-family development. Uses that will generate more visitors to the site would generate very few internal trips because all services would be provided onsite, including retreat services, lodging, food, and passive recreation opportunities.

On public roadways such as Tyler Foote Road and State Route 49, increased traffic resulting from the project is not anticipated to result in higher noise levels because noise is not cumulative. Two vehicles generating the same noise levels would not result in a noise level twice that of one car, but would instead generate the same noise level for a longer period of time. The amount of time over which a certain noise occurs is not a metric used in determining the level of significance of noise impacts. Noise thresholds are related to noise levels and not the term of exposure to noise.

Special events, which are not currently covered under the existing Use Permit, are a potential source of noise. On August 27, 2015, County staff conducted noise monitoring at specific locations within the Ananda site to determine the noise levels of events that currently exist on the site but which were not permitted under the current Use Permit. Noise-generating sites include the Crystal Hermitage, the Village greens, and the amphitheater. For all readings, amplified music was played at the loudest level used for such events. The Crystal Hermitage is located at the northern end of the site and is used for weddings, wedding receptions, and tours of the tulip gardens in the spring. As shown in Figure 14, noise readings were taken at five different locations to provide a representative idea of noise measurements from the sources. Table 13 provides a more detailed description of the conditions at each of the sites at the time the measurements were taken.

Figure 14: Noise Reading Sites



Location #	Noise Source	Approx Distance	Ambient Noise	Leq	Lmax
		from Source	Sources	(dBA)	(dBA)
1 – Behind hill south	Amphitheater – amplified	700 feet	Wind, woodpeckers,	40.0	42.4
of amphitheater	concerts, chanting, speaking		bluejays		
2 – Fire plug at top of	Amphitheater – concerts,	250 feet	Wind, woodpeckers,	45.9	51.7
hill above Lotus Lake	chanting, music events		bluejays		
3 – Admin building in	Village Green – seasonal	60 feet	Conversations	48.7	52.9
the Village Center	festivals				
4 – In front of jewelry	Village Green – seasonal	80 feet	N/A	63.4	69.2
store	festivals				
5 – Entrance/gift shop	Crystal Hermitage –	40 feet	Crows, sprinkler	43.4	56.6
to gardens	weddings, wedding				
	receptions, tulip tours				

Table 13: Noise Sources and Noise Measurement Levels

As shown in Table 13 above, the only noise levels that have the potential to be higher than the maximum allowed are from the village green festival amplified music. However, the nearest sensitive receptors to this location are on-site residences 600-1,000 feet away and on-site school uses 1,200 feet away. The nearest off-site receptor is a back yard that is over 1,000 feet from the village green. Using the standard equation of a reduction of 6 decibels (dBA) for every doubling of distance, at the nearest off-site property line, noise levels would be approximately 42 dBA Leq and 48 dBA Lmax, well below the threshold for AG zoning. All other noise sources are below thresholds at on-site locations. Nonetheless, because the applicant proposes commercial events and activities on the site that could result in noise above County standards depending the exact nature of the activity, County conditions pertaining to discretionary uses that could result in unacceptable levels of noise to offsite sensitive receptors will apply to this site. Conditions requiring that noise from discretionary uses of the site remain under County thresholds are provided in Mitigation Measure 12A. With this mitigation, operational noise impacts are anticipated to be *less than significant with mitigation*.

*Impact Discussion 12b,d:* The proposed project could generate minor ground vibration during construction activities from use of heavy construction equipment. Construction equipment would produce vibration from vehicle travel as well as construction activities. Vibration is typically sensed at nearby structures when objects within the structure generate noise from the vibration, such as rattling windows or picture frames. The construction activities that could cause ground borne vibration are those associated with the infrastructure improvements (roads, water lines, underground utilities, etc.) and do not include the individual residential home construction. However, there is no blasting anticipated with this project. The Sages road re-alignment would occur up to the eastern boundary of Ananda's property at APN 61-210-20 (17424 Sages Road). Road construction associated with this possible re-alignment would occur immediately adjacent to several properties to the east. However, the road would be constructed by these property owners for the benefit of these properties. Improvements would also be made to Almora Way up to the eastern property line but there are no homes within the vicinity of these improvements (the nearest is over 1,000 feet away).

Nonetheless, construction activities associated with the proposed project could temporarily increase ambient noise levels in the project vicinity, impacting nearby off-site residences and on-site sensitive receptors such as the school facilities and residences. While the County's Zoning Code does not apply noise standards to temporary construction (Nevada County 2012), there would likely be a temporary increase in noise that could result in a physical impact under CEQA. Mitigation Measure 12B is therefore recommended to limit construction work to the hours of 7 AM to 7 PM Monday through Saturday. With implementation of Mitigation Measure 12B, temporary construction noise impacts would be reduced below the significance threshold identified in the General Plan and LUDC and this impact would be *less than significant with mitigation*.

*Impact Discussion 12e,f:* The proposed project is not located in the vicinity of any public or private airport. Therefore, there would be *no impact* related to this issue.

**Mitigation Measures:** To offset potentially adverse noise impacts related to construction activities, the following mitigation measure is recommended:

**Mitigation Measure 12A. Limit Exterior Property Line Noise Levels to County Noise Standards:** Exterior property line noise levels generated by the approved discretionary uses shall not exceed the Rural standards of Section L-II 4.1.7 of the Nevada County Land Use and Development Code at the time of the given noise generation. This condition shall be enforced through a complaint-driven process through the Nevada County Code Compliance Division.

*Timing:* During project operation *Reporting:* As needed *Responsible Agency:* Nevada County Code Compliance

**Mitigation Measure 12B. Limit Construction Activities to Reduce Noise Impacts:** Hours of operation for construction activities shall be limited to the hours of 7 a.m. to 7 p.m. Monday through Saturday. These limited hours of operation shall be noted on all grading, improvement, and construction plans, which shall be reviewed and approved by the Planning Department prior to permit issuance.

*Timing:* Prior to issuance of grading, improvement, and building permits

Reporting: Permit issuance

Responsible Agency: Nevada County Planning Department

# 13. <u>POPULATION / HOUSING</u>

**Existing Setting:** The project site is comprised of 17 parcels totaling 706 acres, of which 683 acres are zoned AG-PD-SP and have a "Planned Development: Estate" General Plan density limitation of 195 dwelling units, or approximately 1 unit/3.5 acres. The Estate General Plan designation and AG zoning district are typically intended to provide low to moderate residential densities ranging from 1.5 acre to 10 acres per dwelling unit, with Estate allowing up to 3-acre parcel sizes.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Induce substantial population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?			$\checkmark$		A, 51
b. Displace substantial numbers of existing housing, necessitating the construction of replacement housing elsewhere?			$\checkmark$		A, 51
c. Displace substantial numbers of people, necessitating the construction of replacement housing elsewhere?			$\checkmark$		A, 51

*Impact Discussion 13a:* The project would result in the maximization of density for the project site consistent with the General Plan designation of up to 195 units for the site, an additional 108 units over the existing allowable density of 87 units. The project proposes to provide this density with clustered residential sites throughout the property.

The existing population at Ananda Village is approximately 200 people. General Plan Land Use Chapter Table 1.3 allows 0.792 people per acre in the Estate General Plan land use designation, which equates to 541 people on 683 acres of Estate. According to the U.S. Census/American Community Survey, between 2009 and 2013 the Nevada County population average was 2.38 people per household (U.S. Census Bureau 2015), which would result in approximately 257 additional people in the project area. The project would therefore meet this General Plan standard. Although the project would add to the population of Ananda Village, this growth was already evaluated and approved by the Nevada County Board of Supervisors when they adopted findings of overriding consideration for the significant and unavoidable impact of population growth projected by the General Plan EIR in 1996. Therefore, impacts concerning population growth are considered *less than significant*, and no mitigation is required.

*Impact Discussion 13b-c:* The project will not remove or displace any existing residences, but will provide new housing opportunities consistent with the allowed density of the General Plan and zoning. This project will not prohibit future residential uses from being constructed on any of the adjacent properties. Given the existing zoning within this area and the low residential densities they provide, impacts regarding the displacement of existing housing opportunities or renters would be *less than significant* with the approval of this project.

Mitigation Measures: None required.

## 14. <u>PUBLIC SERVICES</u>

Existing Setting: The following public services are provided to this site:

<u>Fire</u>: The North San Juan Fire District (NSJFPD) provides fire protection services to the project site. <u>Police</u>: The Nevada County Sheriff provides law enforcement services.

<u>Schools</u>: The site is within the Twin Ridges Elementary School District and the Nevada Joint Union High School District.

Parks: Recreation services are discussed in Section 15, Recreation.

<u>Other</u>: The County of Nevada provides library services. The proposed project would be served by onsite septic systems and private wells for domestic water.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in substantial adverse physical impacts associated with the provision of or need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the following the public services:					
i) Fire protection?			$\checkmark$		A, I, 20, 64
ii) Police protection?			$\checkmark$		А
iii) Schools?			$\checkmark$		А
iv) Parks?			$\checkmark$		А
v) Other public services or facilities?			$\checkmark$		А

Impact Discussion 14a.i-iii: State and County codes require that any development in this area comply with minimum fire safety standards, including thinning of native brush from around structures for adequate

defensible space. The County Fire Marshal has indicated that the project will be required to comply with defensible space regulations. Additionally, because the project is located partly within a Very High Fire Hazard Severity Zone (the remainder is within the High Fire Hazard zone), the applicant has submitted a Fire Protection Plan that outlines numerous fire safety protection measures such as a fuels management program, a fire protection water supply system, and a description of evacuation routes and fire protection accessibility within Ananda Village. The application also includes a Development Agreement that provides a fire engine garage at no cost to the NSJFPD, provides a helicopter landing site in the Village, allows use of Ananda Village ponds and water as a helicopter water source and for fire defense training exercises, provides onsite training for Village and community residents in fire safety issues, maintains stored water to maintain current ISO ratings, and maintains the Village Center as a Red Cross emergency/evacuation center.

Ananda Village also has a CalFire-certified Forest Management Plan to provide additional management resources for the management of fire fuels on the property. Ananda Village has regularly conducted timber harvest and fuels management activity and will continue to conduct these activities in keeping with the guidance of the Forest Management Plan. Figure 15 shows the wildlife and timber harvest activity on the project site, including timber harvests in 1994, 1997, and 2000. Thus, although the project would add residents to an area of High and Very High Fire Hazard Severity, the project would also have beneficial impacts to the fire protection infrastructure and facilities of Ananda Village and the broader community and would not substantially increase the need for new fire protection-related facilities. The Fire Protection Plan, Oak Habitat Management Plan, Forest Management Plan, and Development Agreement fire protections would be included in the project conditions of approval. There would not be a substantially adverse impact related to fire protection services.

Law enforcement, fire, and emergency services are funded by the County's General Fund, which is derived from property and sales tax and to which this project will contribute. The Ananda community does not allow alcohol or drug use, and members voluntarily follow the rules of the community; therefore, Ananda has very few law enforcement needs relative to other residential development. Ananda Village also has its own pre-K through 12<sup>th</sup> grade school facilities, reducing impacts to local schools. Furthermore, growth impacts on schools are addressed by the State of California through the imposition of school impact fees, which are collected at the time of building occupancy, as well as through the collection of property taxes. Therefore, impacts to fire, police, and school services are considered *less than significant*.

*Impact Discussion 14a.iv-v:* Public recreational facilities would not be substantially adversely impacted due to the existing and proposed recreational amenities within Ananda Village, including numerous trails for pedestrian, equestrian, and bicycling use, recreational playing fields, and community center. Ananda Village is anticipated to meet recreation demand within the community and in fact currently serves many outside the Ananda community who live on the San Juan Ridge as a place to recreate, predominately walking and bicycling. No other public services would be impacted by the proposed project as the site would be served by a private community water system and septic systems. Therefore, this impact is considered *less than significant*.

Mitigation Measures: None required.

## 15. <u>RECREATION</u>

**Existing Setting:** The project is located within the Oak Tree Community Park and Recreation District. Nearby public facilities for recreation include Oak Tree Park and onsite and offsite school grounds which typically contain ball fields, greens, and playgrounds. Ananda Village itself also contains numerous walking trails and bicycling and horseback riding opportunities. The County General Plan recommends the level of service for recreation needs as three acres per 1,000 persons.

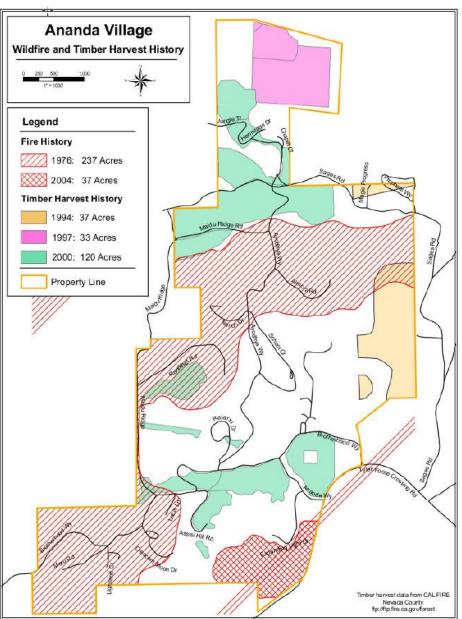


Figure 15: Wildfire and Timber Harvest History

*Impact Discussion 15a-c:* As noted in Section 13 of this Initial Study, although the project would contribute to the population of Nevada County, this increase was accounted for in the General Plan and General Plan EIR. Ananda Village as it currently exists today includes miles of pedestrian, equestrian, and bicycle trails, and, as shown in Figure 4, proposed plans include additional trails. As previously discussed in Section 14 of this Initial Study, Ananda Village's trails and recreational amenities are currently used by both on-site residents and off-site locals, with the Village serving as a local recreational hub for the many nearby neighbors. Additionally, new residential development within Ananda pays recreation mitigation fees and will continue to do so. Because the project provides numerous recreational facilities and proposes to provide more with the proposed addition of density, impacts to recreational services would be *less than significant*.

Mitigation Measures: None required.

## 16. TRANSPORTATION / CIRCULATION

**Existing Setting:** Primary access to the project site is from Tyler Foote Crossing Road. The nearest public cross street is Oak Tree Road approximately 1.5 miles to the west. The Nevada County-operated Gold Country Stage does not serve the project site, although there is a dedicated transit stop in front of Ananda Village should Gold Country Stage serve the site in the future. There are no dedicated or specific bicycle lanes associated with Tyler Foote Crossing Road, although Ananda Village does incorporate walking and biking paths onsite.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in an increase in traffic that is substantial in relation to the existing traffic load and capacity or the street system (i.e., result in a substantial increase in either the number of vehicle trips, the volume-to- capacity ratio, on roads, or congestion at intersections.			~		A, H, 56, 58
b. Result in a need for private or public road maintenance, or new roads?			$\checkmark$		A, H
c. Substantially increase hazards due to a design feature (e.g., a sharp curve or dangerous intersection) or incompatible uses (e.g., farm equipment)?			$\checkmark$		A, H
d. Result in a substantial impact upon existing transit systems (e.g., bus service) or alteration of present patterns of circulation or movement of people and/or goods?				$\checkmark$	A, H
e. Result in a change in air traffic patterns, including either an increase in traffic levels or a change in location that results in substantial safety risks?				$\checkmark$	А
f. Result in an increase in traffic hazards to motor vehicles, bicyclists, or pedestrians, including short-term construction and long-term operational traffic?			$\checkmark$		А
<ul> <li>g. Result in inadequate:</li> <li>Sight distance?</li> <li>Ingress/egress?</li> <li>General road capacity?</li> <li>Emergency access (4290 Standard)?</li> </ul>			~		A, H
h. Conflict with adopted policies, plans, or programs regarding public transit, bicycle, or pedestrian facilities, or otherwise decrease the performance or safety of such facilities?				$\checkmark$	А

*Impact Discussion 16a:* The Department of Public Works did not require a trip generation analysis for this project due to the fact that the project is consistent with the General Plan densities for the site and the planned uses evaluated under the General Plan EIR. However, the Department of Public Works conducted a conservative analysis to ensure that traffic levels would not exceed existing Levels of Service (LOS) on County-maintained roads. According to this analysis, the number of new trips generated by the proposed land uses is 741 daily trips on County roads. Daily trips would be lower than the standards typically used in the Institute of Transportation Engineers (ITE) *Trip Generation Manual* because Ananda Village is largely self-contained, with schools, market, and jobs on one site. Some events, particularly those attended by non-residents traveling from off-site, would add additional traffic. Events do not overlap, so the highest

attended event can be used to conduct a conservative analysis of event impacts on traffic. The event most attended event by persons traveling to the site in vehicles and leaving the same day, and also the event that lasts the longest, is the spring tulip garden open house. Conservatively assuming 800 persons per day (the highest ever recorded attendance) with 1.5 persons per vehicle (although most vehicles traveling to this event arrive with 2-4 people), added trips from this event would be 1,200 trips during the tulip open house, which lasts from 4 to 5 weeks during the spring.

The current volume for Tyler Foote Crossing is 1,988 vehicles per day, and the most recent model predicts an additional 96 vehicles on this portion of Tyler Foote Crossing in the year 2035 (2,084 daily trips total). Adding the new Ananda trips to the buildout volumes results in 2,825 daily trips on Tyler Foot Crossing with the proposed project, and adding the tulip event to that figure results in 4,025 ADT during the tulip festival.

The General Plan identifies an average daily trip rate (ADT) of 7,600 to exceed LOS C and trigger mitigations. As a result, the project would not result in impacts that would negatively affect the future LOS on Tyler Foote Crossing Road. In addition, according to then-Senior Civil Engineer John Rumsey in 1996, the last model run for the General Plan reflected that the LOS for Tyler-Foot Crossing Road would remain at LOS A at full buildout of the General Plan. Considering the existing traffic coupled with the added project traffic collectively, the estimated traffic load and the volume to capacity ratio level (expressed in an LOS standard) the impact would be *less than significant*.

*Impact Discussion 16b:* Because all roads within Ananda Village are under one ownership and no subdivision of land is occurring with the project, the County does not require a Permanent Road Division or other road maintenance mechanism. Rather, all roads must be maintained in accordance with road and fire standards in effect at the time of Use Permit approval, and maintenance is a condition of the Use Permit/Comprehensive Master Plan. With the application of the standard road improvement and maintenance conditions of approval, this project will have a *less than significant* impact on public and private road maintenance.

*Impact Discussion 16c:* The Department of Public Works conducted a collision analysis of the Brotherhood Way-Tyler Foot Crossing intersection (project entrance) to determine if there was any data that would suggest safety concerns with the intersection or with Sages Road. There was one reported collision in 2002 at the Brotherhood Way intersection with Tyler Foote Crossing Road, and no reported collisions with the Sages Road-Tyler Foote Crossing Road intersection. Project implementation would not require any substantial alterations to any public roadway alignments in the vicinity of the project. Interior roads would meet grade and other road standards, with the exception of a 100-foot section of Village Drive which is seeking an exception for grade up to 18 percent. This grade has been accepted and approved by the Department of Public Works and the Nevada County Fire Marshal's Office. New interior and secondary access roads would be required to meet current Fire Safe Road Standards. Project impacts associated with vehicle hazards on public roadways would be *less than significant*, and no mitigation is required.

*Impact Discussion 16d:* As noted above, the Nevada County-operated Gold Country Stage does not currently operate on Tyler Foote Crossing Road and does not serve the project site. Neither project construction nor the build out of the project would interfere with the service of any bus lines or bus stops, and the project entrance has already been designed with the bus stop. The project would not conflict with rideshare programs or other policies supporting alternative transportation. Therefore, *no impact* on the movement of people or goods is anticipated to occur as a result of the proposed project.

*Impact Discussion 16e:* This project would not result in an alteration of any existing waterborne, rail, or air traffic patterns or levels. Therefore, there would be *no impact* with regard to this issue.

*Impact Discussion 16f:* Located within a rural region of the County, the project site does not have direct access to any major transportation routes, or local transportation routes that also cater to pedestrian and alternative transportation methods. Project-related traffic would thus have a *less than significant* impact on alternative transportation methods in the local area.

*Impact Discussion 16g:* New areas of development would require the extension of a secondary access road to the east, connecting to Sages Road. Secondary access is a standard condition of project approval. Additionally, the applicant is offering an easement to neighbors to the east/northeast to re-align Sages Road through Ananda property in order to provide better fire safe access. If this road is constructed, it would be an improvement to fire safety in the neighborhood. Ananda Road capacity and sight distance are discussed in Impact Discussion 16c above. Project impacts on emergency access would therefore be *less than significant*, and no mitigation is required.

*Impact Discussion 16h:* The Nevada County Regional Transportation Plan (RTP) (2010) outlines several goals related to the development of an economically feasible transportation system, reducing adverse impacts associated with transportation, and providing for the safe and efficient movement of people and goods. To support these goals, the plan lists many policies, some of which relate to supporting the existing auto-dependent transportation system, and some of which relate to supporting the creation of a comprehensive multi-modal transportation system (Nevada County Transportation Commission 2011). The proposed project would not conflict with any of the RTP policies and would contribute its fair share toward the existing transportation system through the payment of traffic mitigation fees, resulting in *no impact* related to adopted transportation policies.

Mitigation Measures: None required.

## 17. <u>UTILITIES / SERVICE SYSTEMS</u>

**Existing Setting:** Energy is currently provided to the site by electrical service from Pacific Gas & Electric, propane from private companies, and a number of solar installations owned and maintained by the applicant. Water is provided by several onsite private wells. Solid waste generated either during the development of the site or after occupancy, is transferred to the McCourtney Road Transfer Station. The Transfer Station is maintained by the County of Nevada, which contracts with a solid waste disposal company to haul material to a permitted sanitary landfill. There are a number of wireless telephone services available in Nevada County but with variable coverage depending upon the carrier. AT&T transmission lines run to the edge of the Ananda community along Tyler Foote Road, but Ananda maintains their own private branch exchange (PBX) phone system within the community. Ananda also leases fiber optic lines that run down Tyler-Foote Road for internet service.

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Result in a need for the extension of electrical power, natural gas, or communication systems?			$\checkmark$		А
b. Require or result in the construction of new water or wastewater treatment facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?			$\checkmark$		А
c. Require or result in the construction of new storm water drainage facilities or expansion of existing facilities, the construction of which could cause significant environmental effects?		$\checkmark$			А

CEQA Environmental Checklist Item	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
d. Have sufficient water supplies available to serve the project from existing entitlements and resources, or are new or expanded entitlements needed?		~			A, 32, 33, 37
e. Result in a determination by the wastewater treatment provider which serves or may serve the Project that it has adequate capacity to serve the Project's projected demand in addition to the provider's existing commitments?			✓		А
f. Be served by a landfill or transfer station with sufficient permitted capacity to accommodate the project's solid waste disposal needs?		$\checkmark$			A, H
g. Comply with federal, state, and local statutes and regulations related to solid waste?		$\checkmark$			А

*Impact Discussion 17a:* Ananda Village is an operating planned development with electrical power, solar power, propane, and communication systems currently serving all developed areas of the property. New clusters of residential development would require the extension and improvement of the public systems, and Ananda has sited new development predominately on south-facing slopes to take advantage of solar access. Ananda plans to construct new solar systems in the areas of new development, and has been in the process of expanding solar service around the village in recent years. All extensions are onsite, and physical impacts from onsite extension of this infrastructure have been evaluated throughout this Initial Study and mitigated as appropriate. Project approval would therefore result in *less than significant* impacts on energy and communication services.

*Impact Discussion 17b,e:* There is no public wastewater treatment system serving this area, and no such system is proposed. The proposed project would result in the development of centralized septic systems for new residential development clusters as well as a new septic system for the Expanding Light Temple. All new sewage disposal fields have been mapped on the Comprehensive Master Plan and Proof of Concept plans. New septic system development would avoid sensitive resources such as steep slopes and water features, with the exception of new leach fields within landmark oak woodland habitat. Impacts to oak woodlands are discussed and mitigated for in Section 4 of this Initial Study. All development requiring sewage disposal, including special events and commercial operations such as the use of the Crystal Hermitage for weddings and the tulip festival, would be required to be designed, permitted, and constructed according to standards of the current Nevada County On-Site Sewage Disposal Ordinance and its implementing regulations, which is a standard condition of approval.

According to the Source Capacity Planning Study prepared for the project (Knibb 2014), modeling results indicate that proposed residential and non-residential infill development that would be served by the existing gravity water supply system would be adequately served by the existing system. Residential infill development that is proposed in Cluster A, which is currently served by an existing hydropneumatic pump system, will require replacing and upsizing the existing pump system to meet additional domestic demand and new residential fire sprinkler requirements. Also required would be an extension of the distribution lines to infill sites in Cluster A. New development would require the addition of new distribution lines. The new gravity system could require the addition of in-home booster pumps or individual pressure pumps for some of the higher elevation clusters such as Cluster C and Cluster L. New development on the pump system proposed for areas near the top of the ridge (Clusters M, N, O, and the upper elevation portion of L) would require the installation a new hydropneumatic pump system and the creation of a new, third pressure zone (most of Ananda is currently within one pressure zone, with a second, small zone serving

the six highest elevation residences). The new pump station would be constructed at the site of the existing St. Francis pond tank.

Supplemental water for fire protection would be stored in onsite tanks at various locations. All new areas of disturbance associated with additional water infrastructure have been evaluated within this Initial Study. Impacts regarding water and waste water infrastructure would therefore *less than significant*.

*Impact Discussion 17c:* Storm drainage facilities proposed by the project applicant would consist of roadside ditches that would connect natural drainage swales on the property. Improvement plans, reviewed by the County Building Official, would be required for new road construction, ensuring consistency with adopted County grading and drainage standards. Additionally, compliance with Mitigation Measure 9A, which requires a drainage report demonstrating no new net runoff off the project site, as well as compliance with federal, state, and local regulations, would reduce impacts related to construction of new storm drain facilities to a level that is *less than significant with mitigation*.

*Impact Discussion 17d:* As discussed extensively in *Impact Discussion 9a,e,f* in the Hydrology/Water Quality section of this Initial Study, water supply for the proposed uses are adequate to meet projected demand without significant effect on the aquifer system with the implementation of Mitigation Measures 9B and 9C which will require adequate water supply and storage, as well as monitoring and adjusting of groundwater use. This impact is therefore *less than significant with mitigation*.

*Impact Discussion 17f-g:* Nevada County provides solid waste collection service through a franchise for collection and disposal of waste from residential and nonresidential areas. Waste Management of Nevada County is the current hauler for both solid waste refuse and collection of recyclables. Refuse collected by Waste Management and self-hauled refuse are collected at the McCourtney Road Transfer Station and Recycling Center located at 14741 Wolf Mountain Road in Grass Valley. Nevada County does not have a solid waste landfill; all solid waste refuse is hauled to out-of-County landfills, most of which are in the State of Nevada, under the contract with Waste Management Systems, Inc. Gate fees and parcel charge fees are currently collected by the County to offset the costs of solid waste disposal. According to the Interim Solid Waste Manager of Nevada County, there are no known capacity issues with any Waste Management facilities (Garcia 2015). It should be noted that the applicant proposes to provide a community recycling center under the terms of the proposed Development Agreement. This community service would reduce solid waste disposal needs for the San Juan Ridge community and would help the County meet its State-mandated 50 percent recycling goal.

Construction activities typically produce solid waste in the form of construction materials, vegetation chippings, or industrial toxic waste like glues, paint, and petroleum products. Implementation of the proposed project could thus result in potentially adverse landfill and solid waste disposal impacts. Impacts related to disposal of construction debris would be *less than significant with mitigation* as identified in Mitigation Measure 17A, below which requires the appropriate disposal of construction waste.

**Mitigation Measures:** To offset potentially adverse impacts related to construction waste, the following mitigation measure is recommended:

**Mitigation Measure 17A. Appropriately Dispose of Vegetative and Toxic Waste:** Neither stumps nor industrial toxic waste (petroleum and other chemical products) are accepted at the McCourtney Road transfer station and if encountered, shall be properly disposed of in compliance with existing regulations and facilities. This mitigation measure shall be included as a note on all grading and improvement plans, which shall be reviewed and approved by the Planning Department prior to permit issuance. *Timing: Prior to issuance of grading and improvement permits Reporting: Agency approval of permits and plans* 

### **Responsible Agency:** Nevada County Planning Department

### 18. <u>MANDATORY FINDINGS OF SIGNIFICANT ENVIRONMENTAL EFFECT</u>

	Potentially Significant Impact	Less Than Significant with Mitigation	Less Than Significant Impact	No Impact	Reference Source (Appendix A)
a. Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, reduce the number or restrict the range of a rare or endangered plant or animal, or eliminate important examples of major periods of California's history or prehistory?		~			А
b. Does the project have environmental effects that are individually limited but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of the project are considered when viewed in connection with the effects of past, current, and probable future projects.)			~		А
c. Does the project have environmental effects, which will cause substantial adverse effects on human beings, either directly or indirectly?			~		А

*Impact Discussion 18a:* As discussed in Sections 1 through 17 above, development of the proposed project would comply with all local, state, and federal laws governing general welfare and environmental protection. Project implementation during both construction and operation would result in potentially adverse impacts to aesthetics, agricultural/forestry resources, air quality, biological resources, cultural resources, geology and soils, greenhouse gas emissions, hazards and hazardous materials, hydrology and water quality, noise, and utilities/service systems. Each of those impacts is mitigated to levels that are *less than significant levels with mitigation* as outlined in each section.

*Impact Discussion 18b:* A project's cumulative impacts are considered significant when the incremental effects of the project are "cumulatively considerable," meaning that the project's incremental effects are considerable when viewed in connection with the effects of past, current, and probable future projects. As discussed in Section 4, this project would result in the loss of up to approximately 34 acres of landmark oak woodland and no anticipated loss of landmark oaks, for a total potential loss of 14 percent of the oak woodlands on the project site (out of 237 acres). In Nevada County it is estimated that approximately 37,671 acres or approximately 6 percent of the County's total area is Foothill Hardwood; subsequently, this project accounts for a loss of approximately 0.09 percent of that total habitat.

Over time in Nevada County, development activities have continued to break up formerly large portions of oak woodlands into progressively smaller pieces, diminishing their nature resource values, as is the case with this project site. The project site and its surrounding area have been impacted for over 160 years from agricultural and grazing activities, timber harvesting, development, and related activities. As a result, although the loss of oak habitat on this site due to the current proposed project is comparatively minor, cumulative impacts arise due to the linking of impacts from the past, current, and reasonably foreseeable future projects in the region. Project impacts would result primarily from the disturbance and loss of a regionally abundant terrestrial habitat. Due to the abundance of oak habitat types regionally, no significant

cumulative impacts to these resources are occurring as a result of the proposed project. Further, impacts are calculated conservatively, requiring the developer to restore and enhance more oak woodlands than would likely be impacted. The required compensatory mitigation (Mitigation Measure 4J) would compensate for the lost habitat by requiring enhancement and restoration of oak woodlands onsite or offsite. With implementation of the project mitigation measures, no significant habitat impacts are expected to result from the proposed project. Therefore the proposed project will not result in a cumulatively considerable contribution to cumulative impacts on surrounding biological resources.

As discussed in both the Air Quality and Greenhouse Gas Sections of this initial study, the proposed project would result in incremental increases in emissions from both construction and operational activities. Construction activities are considered short-term, yet mitigation is required to reduce the emissions below thresholds of significance. During operations, the project would generate traffic from the addition of residences, but new uses would not be a significant draw for traffic from those who live outside the area. Mitigation is provided as well to lessen potential operational air quality impacts to less than significant levels. For these reasons, this project as mitigated would not result in a considerable contribution to cumulative impacts on regional air quality or greenhouse gas emissions.

The Department of Public Works has determined that the project will contribute to an incremental increase to local traffic in this area, but Tyler Foote Road would remain at Level of Service A. Furthermore, the residential development associated with the project was accounted for in the General Plan and the addition of project development in addition to full buildout of the General Plan would not result in adverse impacts to Tyler Foote Road, as discussed in Section 16, *Transportation/Circulation*. The developer would also be required as a standard condition of approval to pay traffic mitigation fees to offset the project's traffic impacts to levels of less than significance. Therefore the proposed project would not result in a cumulatively considerable impact to local or regional traffic in western Nevada County.

Reasonably foreseeable projects that could have similar impacts to the proposed project include other future projects within the project vicinity that could be constructed or operated within the same timeframe as the project. However, because most of the project impacts would be short-term construction impacts that are not substantially adverse with mitigation, the proposed project would only incrementally contribute to cumulative impacts. The proposed project would result in various potential environmental impacts, but each of those can be mitigated to a less than significant level by the recommended mitigation from this document. Where the project would have no impact, it would not contribute to cumulative impacts. In addition, issues specific to site conditions, such as site geology and soils, do not have cumulative effects. While the project would contribute to population growth in the County, that impact has been evaluated in the General Plan EIR and findings of overriding consideration adopted by the Board of Supervisors for those impacts. Therefore, the proposed project would have *less than significant* environmental effects that are individually limited but cumulatively considerable.

**Impact Discussion 18c:** The proposed project would comply with all local, state, and federal laws governing general welfare and environmental protection. Project implementation would not substantially degrade the quality of the existing environment because the project would not result in any significant adverse and immitigable impacts that could cause adverse effects to humans. Therefore, project impacts on human beings would be *less than significant*, and no additional mitigation is required.

**Mitigation Measures:** To offset potentially adverse impacts to aesthetics, agricultural/forestry resources, air quality, biological resources, cultural resources, geology and soils, greenhouse gas emissions, hazards and hazardous materials, hydrology and water quality, noise, and utilities/service systems, see Mitigation Measures 1A, 3A-3D, 4A-4L, 5A, 6A-6F, 9A-9C, 12A-10B, and 17A.

#### NEVADA COUNTY, CALIFORNIA PROPOSED MITIGATED NEGATIVE DECLARATION NOTICE OF AVAILABILITY FOR PUBLIC REVIEW

To: Nevada County Building Calif Dept of Fish & W Nevada County Public V Central Valley RWQCE Nevada County Surveyo Nevada County Assesso Nevada Co Environmen Native American Herita Agricultural Commissio BLM North San Juan Fire Dis United Auburn Indian O Twin Ridges School Di US Fish & Wildlife Ser Nevada Joint Union Hig San Juan Ridge Taxpay	ildlife Works Dept 3 or or's Office atal Health Dept age Commission oner strict Community strict vice gh School Dist	Oak Tree Park & Recreation District Federation of Neighborhoods Northern Sierra Air Quality Mgt. District District 4 Supervisor Nevada County Fire Protection Planner Sierra Nevada Group / Sierra Club California Department of Forestry – Timber Rural Quality Coalition AT&T Tyler Barrington, Principal Planner PG&E Caltrans Highways Washoe Tribe County Counsel US Fish and Wildlife Service State Clearinghouse		
Project Name:	Ananda Village Comp	rehensive Master Plan		
File No:	Z15-001, MIS16-0009 0004, MI15-005, LLA	), U15-002, MGT15-004, MGT15-005, MGT17- 16-0008, LLA16-0014 & EIS15-003		
Assessor's Parcel Number(s):	61-170-12, -16, -23, -230-06, -08; 61-240-02	-32, -34; 61-180-02, -03; 61-210-04, -19, -20; 61- 02, -33, -34, -35 & -36		
Applicant/Owner:	Attn: Peter Goering, V Ananda Church of Sel 14618 Tyler Foote Ro Nevada City, CA 9595 (530) 478-7639	f-Realization of Nevada County ad #174		
Project Location:	14618 Tyler Foote Ci Route 49.	cossing Road, approximately 5 miles east of State		

**Project Description:** The project would allow additional residential and non-residential development consistent with the density allowed under the General Plan designation. Entitlements include:

1) **Rezone** (Z15-001) to alter the boundaries of the existing 9-acre Rajarshi Park PD-SP zoning area to fit the existing disturbed area but not alter the PD-SP size, and to rezone a 1.1-acre AG-PD-SP area adjacent to the Village Center to PD-SP.

2) **Development Agreement** (MIS16-0009) proposing an extended development timeline of 15 years with the potential for two 5-year extensions, phasing flexibility, customized sewage disposal inspection fees, and a customized administrative process for development of the residential units. Public benefits include an easement for a Sages Road re-alignment on Ananda property to improve fire safe access for neighbors and construction of a fire engine garage for the North San Juan Fire District.

3) Use Permit for a Comprehensive Master Plan (U15-002) to allow the following, with attendant road and infrastructure improvements:

- (a) Increase the residential cap from 87 units to the General Plan maximum density of 195 units within 8 existing clusters and up to 9 new clusters;
- (b) Add new non-residential uses within the Village Center (1600 sf maintenance building, 1120 sf vehicle repair shop, 1500 sf office building, 864 sf fire engine garage, and 536 sf market kitchen remodel/expansion), Rajarshi Business Park (4800 sf office/warehouse building); Expanding Light Retreat Center (11,000 sf temple, 4300 sf yoga hall and offices, 1000 sf yoga classroom/hall, 1200 sf dormitory lodge, 1500 sf administrative office, 20 guest cabins totaling

# APPENDIX A – REFERENCE SOURCES

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- B. Nevada County Environmental Health Department
- C. Nevada Irrigation District
- D. Nevada County Geographic Information Systems
- E. Northern Sierra Air Quality Management District
- F. California Department of Fish & Wildlife
- G. Regional Water Quality Control Board
- H. Nevada County Public Works Department
- I. Nevada County Fire Marshal's Office
- J. Nevada County Agricultural Commissioner
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