

EXHIBIT B

MITIGATION MONITORING AND REPORTING PROGRAM

PROJECT NAME: Vista Canyon FILE NUMBERS: _____

APPROVAL DATE: _____

ENVIRONMENTAL IMPACT REPORT NO.: SCH#2007071039

The following environmental mitigation measures were incorporated into the approval for this project in order to mitigate potentially significant environmental impacts. A completed and signed checklist for each mitigation measure indicates that this mitigation measure has been complied with and implemented, and fulfills the City of Santa Clarita's monitoring requirements with respect to Public Resources Code Section 21081.6. The mitigation measures are numbered consistently with the project's Environmental Impact Report.

Exhibit B
Mitigation Monitoring and Reporting Program

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards					
a. Grading	4.1-1 Grading: The applicability of the preliminary recommendations for foundation and retaining wall design shall be confirmed at the completion of grading. Paving studies and soil corrosivity tests shall be performed at the completion of rough grading to develop detailed recommendations for protection of utilities, structures, and for construction of the proposed roads.	Conduct field investigation to confirm applicability of preliminary recommendations for foundation and retaining wall design Also confirm paving studies and conduct soil corrosivity tests in accordance with all geotechnical studies Check Grading Permit for compliance	Public Works Department/ Development Services Division	During grading and construction activities	
	4.1-2 Site Preparation: Prior to performing earthwork, the existing vegetation and any deleterious debris shall be removed from the site. Existing utility lines shall be relocated or properly protected in place. All unsuitable soils, uncertified fills, artificial fills, slopewash, upper loose terrace deposits, and upper loose alluvial soils in the areas of grading receiving new fill shall be removed to competent earth materials and replaced with engineered fill. The depth of removal and recompaction of unsuitable soils is noted in the Project Geotechnical Report. Any fill required to raise the site grades shall be properly compacted.	Monitor grading and site preparation activities. Check Grading Permit for compliance	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-3 Removal Depths: The required depth of removal and recompaction of the existing compacted fill or natural soils are indicated in the Project Geotechnical Report. Deeper removals shall be required if disturbed or unsuitable soils are encountered during project grading as directed by the Project Geotechnical Consultant. After excavation of the upper natural soils on hillsides and in canyons, further excavation shall be performed, if necessary, and as directed by the Project Geotechnical Consultant, to remove slopewash or other unsuitable soils. Additional removals will also be required for transition lots (a transition lot occurs on a graded pad where relatively shallow or exposed bedrock materials and compacted fills soils are both present on a lot.) and where expansive bedrock occurs as directed by the Project Geotechnical Consultant. The Project Geotechnical Consultant may require that additional shallow excavations be made periodically in the exposed bottom to determine that sufficient removals have been made prior to recompact the soil in-place. Deeper removals may be required by the Project Geotechnical Consultant based on observed field conditions during grading. During grading operations, the removal depths shall be observed by the Project Geotechnical Consultant and surveyed by the Project Civil Engineer for conformance with the recommended removal depths shown on the grading plan.</p>	<p>Monitor grading by Project Geotechnical Consultant during grading and site preparation activities</p> <p>Survey grading removal depths by Project Civil Engineer</p>	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	4.1-4 Material for Fill: The on-site soils, less any debris or organic matter, may be used in the required fills. Any expansive clays shall be mixed with non-expansive soils to result in a mixture having an expansion index less than 30 if they are to be placed within the upper 8 feet of the proposed rough grades. Rocks or hard fragments larger than 4 inches shall not be clustered or compose more than 25 percent by weight of any portion of the fill or a lift. Soils containing more than 25 percent rock or hard fragments larger than 4 inches must be removed or crushed with successive passes (e.g., with a sheepfoot roller) until rock or hard fragments larger than 4 inches constitute less than 25 percent of the fill or lift.	Monitor and provide direction during grading and site preparation activities	Public Works Department/ Development Services Division	Conduct field investigation throughout each grading phase	
	4.1-5 Oversized Material: Rocks or hard fragments larger than 8 inches shall not be placed in the fill without conformance with the following requirements: Rock or material greater than 8 inches in diameter, but not exceeding 4 feet in largest dimension shall be considered oversize rock. The oversize rocks can be incorporated into deep fills where designated by the Project Geotechnical Consultant. Rocks shall be placed in the lower portions of the fill and shall not be placed within the upper 15 feet of compacted fill, or nearer than 15 feet to the surface of any fill slope.	Monitor grading by Project Geotechnical Consultant during grading and site preparation activities	Public Works Department/ Development Services Division	Conduct field investigation throughout each grading phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-5 (continued)</p> <p>Rocks between 8 inches and 4 feet in diameter shall be placed in windrows or shallow trenches located so that equipment can build up and compact fill on both sides. The width of the windrows shall not exceed 4 feet. The windrows shall be staggered vertically so that one windrow is not placed directly above the windrow immediately below. Rocks greater than 1 foot in diameter shall not exceed 30 percent of the volume of the windrows. Granular fill shall be placed on the windrow, and enough water shall be applied so that soil can be flooded into the voids. Fill shall be placed along the sides of the windrows and compacted as thoroughly as possible. After the fill has been brought to the top of the rock windrow, additional granular fill shall be placed and flooded into the voids. Flooding is not permitted in fill soils placed more than 1 foot above the top of the windrowed rocks. Where utility lines or pipelines are to be located at depths greater than 15 feet, rock shall be excluded in that area. Excess rock that cannot be included in the fill or that exceeds 4 feet in diameter shall be stockpiled for export or used for landscaping purposes.</p>				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	4.1-6 Import Material: Import material shall consist of relatively non-expansive soils with an expansion index less than 30. The imported materials shall contain sufficient fines (binder material) so as to be relatively impermeable and result in a stable subgrade when compacted. The import material shall be free of organic materials, debris, and rocks larger than 8 inches. A bulk sample of potential import material, weighing at least 25 pounds, shall be submitted to the Project Geotechnical Consultant at least 48 hours in advance of fill operations. All proposed import materials shall be approved by the Project Geotechnical Consultant prior to being placed at the site.	Monitor and provide direction during grading and site preparation activities Provide sample of import material to Project Geotechnical Consultant for approval	Public Works Department/ Development Services Division	Conduct field investigation throughout each grading phase Submit sample to Geotechnical Consultant 48 hours prior fill operations	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-7 Compaction: After the site is cleared and excavated as recommended, the exposed soils shall be carefully observed for the removal of all unsuitable material. Next, the exposed subgrade soils shall be scarified to a depth of at least 6 inches, brought to above optimum moisture content, and rolled with heavy compaction equipment. The upper 6 inches of exposed soils shall be compacted to at least 90 percent of the maximum dry density obtainable by the ASTM D 1557-02 Method of Compaction. After compacting the exposed subgrade soils, all required fills shall be placed in loose lifts, not more than 8 inches in thickness, and compacted to at least 90 percent of their maximum density. For fills placed at depths greater than 40 feet below proposed finish grade a minimum compaction of 93 percent of the maximum dry density is required. The moisture content of the fill soils at the time of compaction shall be above the optimum moisture content. Compacted fill shall not be allowed to dry out before subsequent lifts are placed. Rough grades shall be sloped so as not to direct water flow over slope faces. Finished exterior grades shall be sloped to drain away from building areas to prevent ponding of water adjacent to foundations.</p>	Monitor and provide direction during grading and site preparation activities	Public Works Department/ Development Services Division	Conduct field investigation throughout each grading phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-8 Shrinkage and Bulking: In computing fill quantities, about 10 to 15 percent shrinkage of the upper 5 feet is estimated for on-site natural alluvial soils, slopewash, and unsuitable soils. That is, it will require approximately 1.15 cubic yards of excavated alluvium to make 1 cubic yard of fill compacted to 90 percent of the maximum dry density. About 10 percent shrinkage of the alluvium between depths of about 5 to 10 feet is estimated, as well as 5 percent shrinkage below a depth of about 10 feet. Additional loss of material may be due to stripping, clearing, and grubbing. A bulking value of about 5 to 10 percent is anticipated for materials generated from the bedrock when placed as compacted fill. The removal of oversize material generated by excavation of the bedrock may affect volume losses.</p>	Monitor and provide direction during grading and site preparation activities	Public Works Department/ Development Services Division	Conduct field investigation throughout each grading phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-9 Temporary Slopes: For purposes of construction, the soils encountered at the site shall not be expected to stand vertically for any significant length of time in cuts 4 feet or higher. Where the necessary space is available, temporary unsurcharged embankments may be sloped back at a 1:1 without shoring, up to a height of 45 feet in competent bedrock with favorable bedding. Where any cut slope exceeds a height of 50 feet within competent bedrock, a bench at least 10 feet wide shall be located at mid-height. Within alluvial or compacted fill material, temporary excavations may be made at a 1.25:1 cut to a height of 25 feet. If the temporary construction embankments are to be maintained during the rainy season, berms are recommended along the tops of the slopes where necessary to prevent runoff water from entering the excavation and eroding the slope faces. Where sloped embankments are used, the tops of the slopes shall be barricaded to prevent vehicles and storage loads within 5 feet of the tops of the slopes. A greater setback may be necessary when considering heavy vehicles, such as concrete trucks and cranes; in this case, the Project Geotechnical Consultant shall be advised of such heavy vehicle loads so that specific setback requirements can be established. All applicable safety requirements and regulations, including OSHA regulations, shall be met.</p>	<p>Monitor and provide direction during grading and site preparation activities</p> <p>Where heavy vehicles are needed on slope embankments, the Project Geotechnical Consultant shall determine setback requirements</p>	Public Works Department/ Development Services Division	<p>Conduct field investigation throughout each grading phase</p> <p>Request advice from Project Geotechnical Consultant when considering use of heavy vehicles.</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	4.1-10 Permanent Slopes: Permanent cut and fill slopes may be inclined at 2:1 or flatter. The current bulk-grading plan indicates that the steepest slope to be constructed at the site during grading will be 2:1.	The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions	Public Works Department/ Development Services Division	Conduct field inspections throughout grading phases	
	4.1-11 Proposed Cut Slopes: Cut slopes proposed for the rough grading of the subject site have been designated as shown in the Project Geotechnical Report. Each cut slope is discussed with specific recommendations presented in the "Slope Stability Analyses" section of the Project Geotechnical Report. All grading shall conform to the minimum recommendations presented in the Project Geotechnical Report. If these slopes are modified from those that are discussed in the Project Geotechnical Report, the modifications shall be reviewed by the Project Geotechnical Consultant to ascertain the applicability of project recommendations or to revise recommendations. The cut slope designation, gradient, and proposed mitigation are summarized in the Project Geotechnical Report.	The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions and review any modifications to the Project Geotechnical Report	Public Works Department/ Development Services Division	Conduct field inspections throughout grading phases	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-12 Fill Slopes: If the toe of a fill slope terminates on natural, fill, or cut, a keyway is required at the toe of the fill slope. The keyway shall be a minimum width of 12 feet, be founded within competent material, and shall extend a horizontal distance beyond the toe of the fill to the depth of the keyway. The keyway shall be sloped back at a minimum gradient of 2 percent into the slope. The width of fill slopes shall be no less than 8 feet and under no circumstances shall the fill widths be less than what the compaction equipment being used can fully compact. Benches shall be cut into the existing slope to bind the fill to the slope. Benches shall be step-like in profile, with each bench not less than 4 feet in height and established in competent material. Compressible or other unsuitable soils shall be removed from the slope prior to benching. Competent material is defined as being essentially free of loose soil, heavy fracturing, or erosion-prone material and is established by the Project Geotechnical Consultant during grading.</p> <p>Where the top or toe of a fill slope terminates on a natural or cut slope and the natural or cut slope is steeper than a gradient of 3:1, a drainage terrace with a width of at least 6 feet is required along the contact. As an alternative, the natural or cut portion of the slope can be excavated and replaced as a stability fill to provide an all-fill slope condition.</p>	The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions	Public Works Department/ Development Services Division	Conduct field inspections throughout grading phases	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-12 (continued)</p> <p>When constructing fill slopes, the grading contractor shall avoid spillage of loose material down the face of the slope during the dumping and rolling operations. Preferably, the incoming load shall be dumped behind the face of the slope and bladed into place. After a maximum of 4 feet of compacted fill has been placed, the contractor shall backroll the outer face of the slope by backing the tamping roller over the top of the slope and thoroughly covering all of the slope surface with overlapping passes of the roller. The foregoing shall be repeated after the placement of each 4-foot thickness of fill. As an alternative, the fill slope can be over built and the slope cut back to expose a compacted core. If the required compaction is not obtained on the fill slope, additional rolling will be required prior to placement of additional fill, or the slope shall be overbuilt and cut back to expose the compacted core.</p>				
	<p>4.1-13 Slope Planting: In order to reduce the potential for erosion, all cut and fill slopes shall be seeded or planted with proper ground cover as soon as possible following grading operations in accordance with Section 7019 of the County of Los Angeles Building Code, 1999, or latest edition. The ground cover shall consist of drought-resistant, deep-rooting vegetation. A landscape architect shall be consulted for ground cover recommendations, plant selection, installation procedures, and plant care requirements.</p>	<p>Confirm the slopes have been seeded or planted</p> <p>Landscape architect to provide recommendations</p>	<p>Public Works Department/ Development Services Division</p>	<p>Immediately after grading</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
b. Drainage	4.1-14 Subdrains: Canyon subdrains are required to intercept and remove groundwater within canyon fill areas. All subdrains shall extend up-canyon, with the drain inlet carried to within 15 feet of final pad grade. Specific subdrain locations and recommendations shall be provided as part of the future rough grading plan review.	Check Grading Plans	Public Works Department/ Development Services Division	During grading activities	
c. Bedrock Overexcavation	4.1-15 Bedrock shall be over-excavated to a minimum depth of 5 feet below lots and streets. Bedrock shall be overexcavated to a depth of at least 3 feet below proposed soil subgrade areas receiving pavement or hardscape improvements.	The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions	Public Works Department/ Development Services Division	During grading activities	
d. Expansive Bedrock	4.1-16 Mint Canyon Formation bedrock materials exposed at pad grade may contain expansive claystone beds that could cause differential expansion. Therefore, within building areas at locations where expansive Mint Canyon Formation units are exposed at pad grade, it is required that the bedrock be removed and recompacted to a depth of at least 8 feet below the proposed final pad elevations or 5 feet below the bottom of proposed footings, whichever is greater. The soils generated by these over-excavations shall be mixed with non-expansive soils to yield a relatively non-expansive mixture. Shall the resulting fill soil still be expansive, special construction techniques such as pad subgrade saturation or post-tensioned slabs may be required, at the discretion of the Project Geotechnical Consultant, to reduce the potential for expansive soil related distress.	The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions, and shall determine if special construction techniques for expansive soils are required	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
e. Transition Zones	<p>4.1-17 To reduce the potential for cracking and differential settlement, the portion of the lot in bedrock shall be over-excavated to a depth of at least 5 feet below the proposed finished pad elevation; or 3 feet below the bottom of proposed footings, whichever is greater. The over excavation shall extend at least 5 feet laterally beyond the building limits. Where removal and recompaction for potentially expansive soils or bedrock is also required, it is recommended that the 8-foot removals be performed as described in the "Expansive Bedrock" section of the Project Geotechnical Report.</p> <p>Foundation and floor slabs for structures located within a transition zone shall also contain special reinforcement as designed by the Project Structural Engineer. Continuous footings located across the transition zone and 20 feet on either side of the contact shall incorporate a minimum of two No. 4 bars, one at the top and one at the bottom.</p> <p>Floor slabs located across the transition zone and 20 feet on either side of the contact shall have a minimum slab thickness of at least 4 inches and shall contain as a minimum No. 4 bars spaced a maximum of 18 inches on center. As an alternative, post-tensioned floor slabs may be used.</p>	<p>The Project Geotechnical Consultant shall conduct field inspections to conform anticipated conditions and ensure that recommendations in "Expansive Bedrock" section of the Project Geotechnical Report are complied with</p> <p>The Project Structural Engineer shall design reinforcements and Project Geotechnical Consultant shall confirm that design is implemented</p>	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
f. Foundations	4.1-18 General: Residential and commercial buildings up to three stories in height may be supported on continuous or individual spread footings established in properly compacted fill. The following recommendations shall be considered preliminary since fill will be used in some lots to raise the site grade and the final design values will depend upon the engineering characteristics of the fill soil. The preliminary design values are based upon the site investigation, experience with the soils in the area, and the site preparation and grading recommendations for this project.	The Project Geotechnical Consultant shall conduct field inspections and shall revise design measures as necessary	Public Works Department/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-19 Bearing Capacity: It is assumed that the proposed buildings will be founded at approximately final planned grades, with column loads less than 100 kips, and have normal floor loads with no special requirements. Individual column pads or wall footings for buildings shall have a width of at least 12 inches and be placed at a depth of at least 18 inches below the lowest final adjacent grade.</p> <p>Structures may be placed on spread footings designed using a bearing value of 2,000 pounds per square foot (psf). The recommended bearing value is a net value, and the weight of concrete in the footings may be taken as 50 pounds per cubic foot (pcf). The weight of soil backfill may be neglected when determining the downward loads from the footings. A one-third increase in the bearing value may be used when considering wind or seismic loads.</p> <p>While the actual bearing value of the fill placed at the site will depend on the materials used and the compaction methods employed, the quoted bearing value will be applicable if acceptable soils are used and are compacted as recommended. The bearing value of the fill shall be confirmed during grading.</p>	<p>Check Grading Plans</p> <p>The Project Geotechnical Consultant shall conduct field inspections</p>	Public Works Department/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	4.1-20 Lateral Resistance: Lateral loads may be resisted by soil friction and by the passive resistance of the soils. A coefficient of friction of 0.4 applied to the dead loads may be used between the footings, floor slabs, and the supporting soils. The passive resistance of properly compacted fill soils may be assumed to be equal to the pressure developed by a fluid with a density of 250 pcf. The frictional resistance and the passive resistance of the soils may be combined without reduction in determining the total lateral resistance.	The Project Geotechnical Consultant shall conduct field inspections and verify conformity with mitigation measure	Public Works Department/ Development Services Division	During grading activities	
	4.1-21 Foundation Observations: To verify the presence of satisfactory soils at foundation design elevations, the excavations shall be observed by the Project Geotechnical Consultant. Excavations shall be deepened as necessary to extend into satisfactory soils. Where the foundation excavations are deeper than 4 feet, the sides of the excavations shall be sloped back at 0.75:1 or shored for safety. Inspection of foundation excavations may also be required by the appropriate reviewing governmental agencies. The contractor shall be familiar with the inspection requirements of the reviewing agencies.	The Project Geotechnical Consultant shall observe excavations and verify presence of satisfactory soils	Public Works Department/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
g. International Building Code Seismic Design	<p>4.1-22 Under Section 1613, "Earthquake Loads" of the International Building Code (IBC), the following coefficients and factors apply to the seismic force design of structures on the project site.</p> <p>Latitude 34.41599</p> <p>Longitude -118.4342</p> <p>Site Class D</p> <p>Ss 1.810</p> <p>S1 0.673</p> <p>SMs 1.810</p> <p>SM1 1.009</p> <p>SDs 1.207</p> <p>SD1 0.673</p> <p>The parameters were determined using the Ground Motion Parameter Calculator (Version 5.0.8) at the United States Geologic Survey (USGS) Earthquake Hazards website.</p>	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies	Public Works Department/ Development Services Division	Prior to Grading Permit issuance and during grading and construction activities	
h. Retaining Walls	<p>4.1-23 General: Backfill placed behind retaining walls shall be compacted to a minimum of 90 percent of the maximum dry density as determined by ASTM D 1557. When backfilling behind walls, it is required that the walls be braced and heavy compaction equipment not be used closer to the back of the wall than the height of the wall.</p>	Monitor grading and site preparation activities	Public Works Department/ Development Services Division	On-site inspections during grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-24 Lateral Earth Pressures: For design of non-building retaining walls, where the surface of the backfill is level and the retained height of soils is less than 15 feet, it may be assumed that drained, non-expansive soils will exert a lateral pressure equal to that developed by a fluid with a density of 35 pcf. Where the surface of the backfill is inclined at 2:1, it may be assumed that drained soils will exert a lateral pressure equal to that developed by a fluid with a density of 47 pcf.</p> <p>In addition to the recommended earth pressures, the walls shall be designed to resist any applicable surcharges due to any nearby foundations, walls, storage or traffic loads. A drainage system, such as weepholes or a perforated pipe shall be provided behind the walls to prevent the development of hydrostatic pressure. Recommendations for wall drains are presented as follows.</p> <p>If a drainage system is not installed, the walls shall be designed to resist an additional hydrostatic pressure equal to that developed by a fluid with a density of 60 pcf against the full height of the wall. In addition to the recommended earth and hydrostatic pressures, the upper 10 feet of walls adjacent to vehicular traffic areas shall be designed to resist a uniform lateral pressure of 100 psf. This pressure is based on an assumed 300 psf surcharge behind the walls due to normal traffic. If the traffic is kept back at least 10 feet from the walls, the traffic surcharge is not required.</p>	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies	Public Works Department/ Development Services Division	Prior to Grading Permit issuance and during grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-25 Wall Drainage: A drainage system shall be provided behind all retaining walls or the walls shall be designed to resist hydrostatic pressures. Retaining wall backfill may be drained by a perforated pipe installed at the base and back side of the wall. The perforated pipe shall be at least 4 inches in diameter, placed with the perforations down, and be surrounded on all sides by at least 6 inches of gravel. The pipe shall be installed to drain at a gradient of between 0.5 to 1 percent and shall be connected to an outlet device. A filter fabric such as Mirafi 140 or equivalent shall be placed on top of gravel followed by a minimum 2-feet-thick compacted soil layer. Alternatively, the filter fabric and gravel is not required when using a continuous slotted pipe and graded sand which conforms to Los Angeles County Flood Control District (LACFCD) "F1 " Designated Filter Material.</p> <p>The backside of the wall shall be waterproofed. A 6-inch vertical gravel chimney drain, Miradrain, or equivalent, shall be placed behind retaining walls and extend to within 18 inches below the top of the wall backfill to provide a drainage path to the perforated pipe. The top of the vertical drain shall be capped with 18 inches of on-site soils.</p> <p>The drainage system shall be observed by the Project Geotechnical Consultant prior to backfilling the retaining wall. Inspection of the drainage system by the City of Santa Clarita will also be required.</p>	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies On-site inspection	Public Works Department/ Development Services Division	Inspections ongoing during grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
i. Channel Lining	<p>4.1-26 General: The proposed development includes a proposed buried soil cement channel liner. Detailed construction plans for the soil cement channel liner are not yet available and will be geotechnically reviewed in a future report to ensure consistency with the findings in the Project Geotechnical Report. The following preliminary recommendations can be used in the planning of the proposed bank protection. The grading recommendations presented in the preceding sections are also applicable to the proposed channel lining. Overexcavation of the natural soils is not expected to be required for the lining, though existing fill soils shall be excavated and replaced with compacted fill. The backcut for the channel lining may be sloped back at 1.25:1. Concrete lined and soil cement channel liners may be inclined at 1.5:1 or flatter. Grouted and ungrouted rip rap liners may be inclined at 2:1 or flatter.</p>	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	<p>4.1-27 Soil Cement: It is expected that portions of the on-site alluvial soils will be suitable for use in soil cement. For estimating purposes, a cement content of 8 to 12 percent, by weight, may be used. To determine the actual required cement content, the granular soils that are to be used in a soil-cement channel lining shall be stockpiled. Representative samples of the stockpiled material shall be mixed with varying amounts of cement, compacted, and cured for different time intervals. Based on the results of unconfined compression tests on the samples of the soil-cement mixtures, the Project Geotechnical Consultant shall determine during grading activities the percentage of cement content to be used during construction. This testing shall take place when soil intended for soil cement manufacture has been stockpiled on site. The soil-cement shall be placed in layers not more than 8 inches in thickness and shall be compacted to at least 95 percent of the maximum dry density at a moisture content of no more than 2 percent over optimum for the soils. The placement of the soil-cement shall be performed under the observation of the Project Geotechnical Consultant, who shall perform sieve analyses, compaction, unconfined compression, and moisture-density tests.</p>	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies	Public Works Department/ Development Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
j. Vista Canyon Ranch Bridge	4.1-28 The Vista Canyon Road Bridge shall be constructed to extend the existing Lost Canyon Road across the Santa Clara River. Final construction plans shall be reviewed to ensure consistency with the Project Geotechnical Report. It is anticipated that the bridge will be founded on driven or cast-in-drilled-hole piles at bents and abutments.	The Project Geotechnical Consultant shall conduct field investigation to verify proper construction procedures in accordance with all geotechnical studies	Public Works Department/ Development Services Division	During grading and construction activities	
k. Geotechnical Observation	4.1-29 The grading operations shall be observed by the Project Geotechnical Consultant. The Project Geotechnical Consultant shall, at a minimum, have the following duties: <ul style="list-style-type: none"> • Observe the excavation so that any necessary modifications based on variations in the soil/rock conditions encountered can be made; • Observe the exposed subgrade in areas to receive fill and in areas where excavation has resulted in the desired finished subgrade. The representative shall also observe proof-rolling and delineation of areas requiring overexcavation; • Evaluate the suitability of on-site and import soils for fill placement; collect and submit soil samples for required or recommended laboratory testing where necessary; • Observe the fill and backfill for uniformity during placement; 	The Project Geotechnical Consultant shall perform duties described throughout grading operations	Public Works Department/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Geotechnical Hazards (continued)					
	4.1-29 (continued) <ul style="list-style-type: none"> • Test fill for field density and compaction to determine the percentage of compaction achieved during fill placement; • Geologic observation of all cut slopes, keyways, backcuts and geologic exposures during grading to ascertain that conditions conform to those anticipated in the report; and • Observe benching operations; observe canyon cleanouts for subdrains, and subdrain installation. 				
Flood					
Construction Mitigation Measures	4.2-1 <p>During all construction phases, temporary erosion control shall be implemented to retain soil and sediment on the project site, and the bank stabilization areas, as follows:</p> <ul style="list-style-type: none"> • Re-vegetate exposed areas as quickly as possible; • Minimize disturbed areas; • Divert runoff from downstream drainages with earth dikes, temporary drains, slope drains, etc.; • Reduce velocity through outlet protection, check dams, and slope roughening/terracing; • Implement dust control measures, such as sand fences, watering, etc.; 	Check erosion control plans for consistency with all appropriate flood control rules and regulations	Public Works Department/ Development Services Division	<p>Check plans prior to issuance of Grading Permits for each grading stage</p> <p>Conduct field inspections during each grading phase and construction of storm drainage and retention facilities</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Flood (continued)					
	<p>4.2-1 (continued)</p> <ul style="list-style-type: none"> Stabilize all disturbed areas with blankets, reinforced channel liners, soil cement, fiber matrices, geotextiles, and/or other erosion resistant soil coverings or treatments; Stabilize construction entrances/exits with aggregate underdrain with filter cloth or other comparable method; Place sediment control BMPs at appropriate locations along the site perimeter and at all operational internal inlets to the storm drain system at all times during the rainy season (sediment control BMPs may include filtration devices and barriers, such as fiber rolls, silt fence, straw bale barriers, and gravel inlet filters, and/or with settling devices, such as sediment traps or basins); and/or Eliminate or reduce non-stormwater discharges (e.g., pipe flushing, fire hydrant flushing, and over-watering during dust control, vehicle and equipment wash down) from the construction site through the use of appropriate sediment control BMPs. 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Flood (continued)					
	4.2-2 All necessary permits, agreements, letters of exemption from the USACE and/or the CDFG for project-related development within their respective jurisdictions must be obtained prior to the issuance of a grading permit, which permits grading within their respective jurisdictions.	Check erosion control plans for consistency with all appropriate flood control rules and regulations	Public Works Department/ Development Services Division and Los Angeles County Department of Public Works (LACDPW) Flood Control Division	Check plans prior to issuance of Grading Permits for each grading stage	
	4.2-3 By October 1 st of each year, a separate erosion control plan for construction activities shall be submitted to the local municipality describing the erosion control measures that will be implemented during the rainy season (October 1 through April 15).	Submit erosion control plans for each year of construction activities	Public Works Department/ Development Services Division and LACDPW Flood Control Division	Check validity of erosion control plans prior to issuance of Grading Permits for each grading stage	
Operational Mitigation Measures	4.2-4 A final developed condition hydrology analysis (LACDPW Drainage Concept Report [DCR] and Final Design Report [FDR]) shall be prepared in conjunction with final project design when precise engineering occurs. This final analysis will be completed to confirm that the final project design is consistent with the approved drainage concept and this analysis. Those final calculations shall establish design features for the project that satisfy the criterion that post-development peak stormwater runoff discharge rates, velocities, and duration in natural drainage systems mimic pre-development conditions. All elements of the storm drain system shall conform to the policies and standards of the LACDPW, Flood Control Division, as applicable.	Check Drainage Plans for consistency with all appropriate flood control rules and regulations	Public Works Department/ Development Services Division and LACDPW Flood Control Division	Check plans prior to issuance of Grading Permits for each grading stage Conduct field inspections during each grading phase and construction of storm drainage and retention facilities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Flood (continued)					
	4.2-5 Final project hydrology and debris production calculations shall be prepared by a project engineer to verify the requirements for debris basins and/or desilting inlets consistent with the approved drainage concept and this analysis.	Project Engineer to verify requirements for drainage	Public Works Department/ Development Services Division and LACDPW Flood Control Division	Check for final calculations and verification by engineer prior to issuance of Grading Permits for each grading stage	
Traffic/Access					
	4.3-1 Prior to the completion and occupancy of project Phase 1, the project applicant shall convert the westbound left-turn lane on Soledad Canyon Road onto the SR-14 southbound on-ramp from a permitted to protected signal phase, and retime this traffic signal and the adjacent Sand Canyon Road/Soledad Canyon Road signal to optimize traffic flow.	Field Verification	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits	
	4.3-2 Prior to the completion and occupancy of project Phase 1, the project applicant shall take those steps necessary that result in retiming the traffic signals at the Via Princessa/SR-14 SB ramps and Via Princessa/SR-14 NB ramps intersections to optimize traffic flow.	Field Verification	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits	
	4.3-3 Prior to the completion and occupancy of project Phase 1, the project applicant shall install a westbound right-turn overlap arrow at the Via Princessa/Lost Canyon Road intersection.	Verify installation of signalization arrow	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Traffic/Access (continued)					
	<p>4.3-4 Prior to project completion and full occupancy (beyond Phase 1), the project applicant shall construct the following improvements at the Sand Canyon Road/Soledad Canyon Road and SR-14 SB Ramps/Soledad Canyon Road intersections:</p> <ul style="list-style-type: none"> • Restripe Soledad Canyon Road to include a third through lane in each direction from just east of the SR-14 ramp intersection to west of the Sand Canyon Road intersection. • Install a right-turn overlap arrow on the northbound Sand Canyon Road approach to Soledad Canyon Road. • Retime and optimize operations of both traffic signals based on the revised lane geometrics and signal phasings. 	Verify construction of improvements	Public Works Department/Traffic Division	Prior to the issuance of Occupancy Permits beyond Phase 1	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Traffic/Access (continued)					
	4.3-5 Prior to the completion and full occupancy of the project (beyond Phase 1), the project applicant shall install Intersection Design Option No. 3, as described below, at the Sand Canyon Road/Lost Canyon Road intersection.	Verify installation of selected design option	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits beyond Phase 1	
	<ul style="list-style-type: none"> Option 3 (Roundabout) – this design option (see Exhibit 4.3-18 and 4.3-18a) would include the installation of a “roundabout” or traffic circle at the intersection. This option would involve the relocation of the intersection to the north and west to adhere to northbound “line of sight” requirements. Right-of-way acquisition would be necessary on all four corners; most of it would come from the northwest corner (which is presently vacant). Encroachment within the protected zone of the heritage oak tree located along the eastern edge of Sand Canyon Road would still occur, consistent with the existing condition. From a traffic operational standpoint, this design option would be the best of the four, improving the future LOS F under the existing design to an LOS C in the AM peak hour and LOS B in the PM. peak hour even with future growth (including the Vista Canyon project). 	Verify installation of selected design option	Public Works Department/ Development Services Division	Prior to the issuance of Occupancy Permits	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Traffic/Access (continued)					
	<p>4.3-6 Prior to project completion and full occupancy (beyond Phase 1), the project applicant shall construct the following improvements at the Soledad Canyon Road/Lost Canyon Road intersection:</p> <ul style="list-style-type: none"> • Install a traffic signal with signal equipment placed in locations that accommodates the planned restriping of the road to six lanes. • Construct an exclusive right-turn lane on the eastbound Soledad Canyon Road approach consistent with the condition of approval previously placed on the undeveloped parcel adjacent to this intersection. • Construct two left-turn lanes and one right-turn lane (with a right-turn overlap phase) on the Vista Canyon Road approach. Each lane should provide 125 feet of storage. • Lengthen the westbound left-turn lane on Soledad Canyon Road from 140 feet to 200 feet to accommodate the projected 95th percentile vehicle queue of 140 feet and to provide opportunities for deceleration. 	Verify installation of signals and construction of roadways	Public Works Department/ Traffic Division	Prior to the opening of Vista Canyon Road Bridge	
	<p>4.3-7 Prior to project completion and full occupancy (beyond Phase 1), the project applicant shall construct the following improvement at the Via Princessa/Lost Canyon Road intersection:</p> <ul style="list-style-type: none"> • Restripe the southbound approach to include a second left-turn lane. 	Verify construction of roadways and restriping	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits beyond Phase 1	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Traffic/Access (continued)					
	4.3-8 Prior to project completion and full occupancy (beyond Phase 1), the project applicant shall construct the following improvement at the Soledad Canyon Road/Sierra Highway intersection: <ul style="list-style-type: none"> Install a right-turn overlap arrow on the southbound Sierra Highway approach to Soledad Canyon Road. 	Verify installation of arrow	Public Works Department/ Traffic Division	Prior to the issuance of Occupancy Permits beyond Phase 1	
	4.3-9 The applicant shall execute and adhere to the terms of the mitigation agreement with Caltrans to minimize the project's impacts to SR-14.	Review mitigation agreement with Caltrans and confirm that applicant adheres to terms	Public Works Department/ Traffic Division	Prior to issuance of Occupancy Permits	
	4.3-10 The applicant shall comply with the requirements of the Vista Canyon Parking Demand Analysis.	Confirm compliance with Parking Demand Analysis	Community Development Department/ Planning Division	During project buildout	
Air Quality					
a. Construction Mitigation	4.4-1 The project applicant shall prepare a Construction Traffic Emission Management Plan to minimize emissions from vehicles including, but not limited to, scheduling truck deliveries to avoid peak hour traffic conditions, consolidating truck deliveries, and prohibiting truck idling in excess of 5 minutes, and ensuring that all off-road equipment is compliant with the CARB's in-use off-road diesel vehicle regulation and SCAQMD Rule 2449.	Check Construction Traffic Emission Management Plan to ensure these or equivalently effective emissions controls are included Conduct field inspections to ensure proper compliance with approved Construction Traffic Emission Management Plan	Community Development Department/ Planning Division Development Services Division (during grading activities) to conduct field investigations	Check plan prior to issuance of Grading Permits for each grading and construction phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Air Quality (continued)					
	4.4-2 The project contractor shall use electric or alternative fueled mobile equipment for on-site uses instead of diesel equipment if suitable equipment is commercially available and the necessary power and refueling infrastructure can reasonably be installed on site.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-3 The project contractor shall maintain construction equipment by conducting regular tune-ups according to the manufacturers' recommendations.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-4 The project contractor shall use electric welders to avoid emissions from gas or diesel welders if suitable equipment is commercially available and the necessary power infrastructure can reasonably be installed on site.	Conduct field inspections to ensure proper compliance	Public Works/Develop ment Services Division	During grading activities	
	4.4-5 The project contractor shall use on-site electricity or alternative fuels rather than diesel powered or gasoline-powered generators if suitable equipment is commercially available and the necessary power and refueling infrastructure can reasonably be installed on site.	Conduct field inspections to ensure proper compliance	Public Works/Develop ment Services Division	During grading activities	
	4.4-6 Configure construction parking to minimize traffic interference.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-7 Provide temporary traffic controls such as a flag person, during all phases of construction to maintain smooth traffic flow.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-8 Provide dedicated turn lanes for movement of construction trucks and equipment on- and off site.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-9 Schedule construction activities that affect traffic flow on the arterial system to off-peak hour to the extent practicable.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Air Quality (continued)					
	4.4-10 Reroute construction trucks away from congested streets or sensitive receptor areas.	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	
	4.4-11 Consistent with measures that other lead agencies in the region (including Port of Los Angeles and Port of Long Beach) have enacted, require all on-site construction equipment to meet U.S. EPA Tier 2 or higher emissions standards according to the following: <ul style="list-style-type: none"> April 1, 2010 to December 31, 2011: All off-road diesel-powered construction equipment greater than 50 horsepower (hp) shall meet Tier 2 off-road emissions standards. In addition, all construction equipment shall be outfitted with the BACT devices certified by CARB. Any emissions control device used by the contractor shall achieve emissions reductions that are no less than what could be achieved by a Level 2 or Level 3 diesel emissions control strategy for a similarly sized engine as defined by CARB regulations. January 1, 2012 to December 31, 2014: All off-road diesel-powered construction equipment greater than 50 hp shall meet Tier 3 off-road emissions standards. In addition, all construction equipment shall be outfitted with the BACT devices certified by CARB. Any emissions control device used by the contractor shall achieve emissions reductions that are no less than what could be achieved by a Level 3 diesel emissions control strategy for a similarly sized engine as defined by CARB regulations. 	Conduct field inspections to ensure proper compliance	Engineering Services Department	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Air Quality (continued)					
	<p>4.4-11 (continued)</p> <ul style="list-style-type: none"> Post-January 1, 2015: All off-road diesel-powered construction equipment greater than 50 hp shall meet Tier 4 off-road emissions standards, where available. In addition, all construction equipment shall be outfitted with the BACT devices certified by CARB. Any emissions control device used by the contractor shall achieve emissions reductions that are no less than what could be achieved by a Level 2 or Level 3 diesel emissions control strategy for a similarly sized engine as defined by CARB regulations. <p>A copy of each unit's certified tier specification, BACT documentation, and CARB or AQMD operating permit shall be provided at the time of mobilization or each applicable unit of equipment.</p>				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Air Quality (continued)					
	<p>4.4-12 The project constructor shall limit PM₁₀ and PM_{2.5} fugitive dust emissions by implementing the following measures:</p> <ul style="list-style-type: none"> • Install wheel washers where vehicles enter and exit the construction site onto paved roads or wash off trucks or any equipment leaving the site each trip; • Suspend all excavating and grading operations when wind speeds (as instantaneous gusts) exceed 25 mph; • All trucks hauling dirt, sand, soil, or other loose materials are to be covered; • Pave road and road shoulders; • Replace ground cover in disturbed areas as quickly as possible; • Sweep streets at the end of the day if visible soil is carried onto adjacent public paved roads (recommend water sweepers with reclaimed water); and • Appoint a construction relations officer to act as a community liaison concerning on-site construction activity including resolution of issues related to PM₁₀ generation. 	Conduct field inspections to ensure proper compliance	Public Works/ Development Services Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Air Quality (continued)					
	4.4-13 The project constructor shall limit VOC emissions by implementing the following measures: <ul style="list-style-type: none"> • Use coatings and solvents with a VOC content lower than required under SCAQMD Rule 1113; • Construction/build with materials that do not require painting; • Require the use of pre-painted construction materials; and • Contractors shall use varying-pressure-low-volume (HPLV) paint applicators or other application techniques with equivalent or higher transfer efficiency. 	Conduct field inspections to ensure proper compliance	Public Works Department/ Development Services Division	During grading activities	
Noise					
	4.5-1 Pursuant to Section 11.44.080 of the City's Noise Ordinance, construction work shall occur within 300 feet of occupied residences only between the hours of 7:00 AM and 7:00 PM Monday through Friday, and between 8:00 AM and 6:00 PM on Saturday. No construction work shall occur on Sundays, New Year's Day, Independence Day, Thanksgiving Day, Christmas Day, Memorial Day, and Labor Day.	Check contractor specifications to ensure that they include these restrictions Conduct field inspections to ensure proper compliance with these restrictions	Public Works Department/ Development Services Division	Check specifications prior to issuance of Grading and Building Permits for each grading and construction phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Noise (continued)					
	<p>4.5-2 The project applicant shall require by contract specifications that the following construction best management practices (BMPs) be implemented by the construction contractor to reduce construction noise and vibration levels:</p> <ul style="list-style-type: none"> • Two weeks prior to the commencement of construction, notification must be provided to surrounding land uses of the project site disclosing the construction schedule, including the various types of activities that would be occurring throughout the duration of the construction period. • Ensure that construction equipment is properly muffled according to industry standards and in good working condition. • Place noise- and vibration-generating construction equipment and locate construction staging areas away from sensitive uses, where feasible (particularly away from the residential uses located north and east of the project site). 	<p>Check contractor specifications to ensure that they include these restrictions</p> <p>Conduct field inspections to ensure proper compliance with these restrictions</p>	Public Works Department/ Development Services Division	Check specifications prior to issuance of Grading and Building Permits for each grading and construction phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Noise (continued)					
	<p>4.5-2 (continued)</p> <ul style="list-style-type: none"> • Use electric air compressors and similar power tools rather than diesel equipment, where feasible. • Construction-related equipment, including heavy-duty equipment, motor vehicles, and portable equipment, shall be turned off when not in use for more than 30 minutes. • Construction hours, allowable workdays, and the phone number of the job superintendent shall be clearly posted at all construction entrances to allow for surrounding owners and residents to contact the job superintendent. If the job superintendent receives a complaint, the superintendent shall investigate, take appropriate corrective action, and report the action taken to the reporting party. Contract specifications shall be included in the proposed project construction documents, which shall be reviewed by the City of Santa Clarita prior to issuance of the grading permit. 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources					
a. Sensitive Vegetation Types, Wildlife Habitat, and Special Status Plant Species	<p>4.6-1 The applicant shall mitigate for alkali rye at a ratio of 0.5:1 through on-site habitat restoration. Prior to the issuance of a grading permit for the project, the applicant shall provide to the City Community Development Department for review and approval a detailed mitigation and monitoring plan for the restoration of alkali rye. The mitigation plan shall encompass comparable general habitat attributes and acreage of useable wildlife habitat on the subject property (approximately 0.35 acre), and include documentation to monitor the success of the restoration through performance standards over a five-year period. The proposed mitigation site would be in natural areas within or adjacent to the Oak Park or other suitable open space areas within the project site.</p> <p>The applicant shall implement the Lily Plan, 2009, that includes salvaging and re-establishment of slender mariposa population on the mitigation site designated in the plan.</p> <p>If discovered during pre-construction surveys, the applicant shall prepare and implement a Plummer's mariposa lily mitigation plan that would include salvaging and re-establishment of Plummer's mariposa population on an on-site mitigation site designated in the plan.</p>	<p>A qualified biologist to confirm habitat restoration is completed</p> <p>Confirm that applicant has implemented Lily Plan, 2009</p>	Community Development Department/ Planning Division	Prior to issuance of Occupancy Permit	
	<p>4.6-2 The applicant shall mitigate for the loss of riparian scrub and big sagebrush scrub through implementation of the Wetlands Plan, 2009 to the satisfaction of the City's Community Development Department.</p>	<p>Confirm that applicant has implemented Wetland Plan, 2009</p>	Community Development Department/ Planning Division	Prior to issuance of Occupancy Permit	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources					
b. Special-Status Wildlife	<p>4.6-3 All stream flows traversing a construction site or temporary access road shall be diverted around the site and under access roads (using a temporary culverts or crossings that allow fish passage). A temporary diversion channel shall be constructed using the least damaging method possible, such as blading a narrow pilot channel through an open sandy river bottom. The removal of wetland and riparian vegetation to construct the channel shall be avoided to the greatest extent possible. The temporary channel shall be connected to a natural channel downstream of the construction site prior to diverting the stream. The integrity of the channel and diversion shall be maintained throughout the construction period. The original stream channel alignment shall be restored after construction, provided suitable conditions are present at the work site after construction. Any temporary stream diversion plan shall be consistent with the USACE and CDFG permits required for project implementation.</p>	<p>Check Revegetation Plans prior to grading</p> <p>Conduct field investigation by qualified biologist</p>	Community Development Department/ Planning Division	Prior to issuance of Grading and/or Building Permit	
	<p>4.6-4 A qualified biologist shall be present when any stream diversion takes place, and shall patrol the areas both within, upstream, and downstream of the stream diversion work area. Under no circumstances shall the unarmored threespine stickleback be collected or relocated, unless USFWS personnel or their agents implement this measure or authorized by USACE in a subsequent Clean Water Act section 404 permit or streambed alteration agreement issued by CDFG.</p>	<p>Qualified biologist shall be present during grading activities and conduct field investigations</p>	Community Development Department/ Planning Division USFWS and CDFG	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-5 Prior to issuance of a grading permit, the applicant shall employ a qualified biologist to implement the Spadefoot Plan, 2009, with review and oversight provided by the City Planning Department. Any substantive revisions to or deviations from the Spadefoot Plan, 2009, shall be provided to CDFG for consideration and input.	Confirm that applicant has implemented Spadefoot Plan, 2009	Community Development Department/ Planning Division	Prior to issuance of a Grading Permit	
	4.6-6 Sixty days prior to grading activities, a qualified biologist shall contact CDFG and consult with CDFG staff regarding the timing of pre-construction surveys. In any event, no later than 30 days prior to grading activities, a qualified biologist shall conduct a survey within appropriate habitat areas to capture and relocate individual silvery legless lizard, coastal western whiptail, rosy boa, San Diego banded gecko, San Bernardino ringneck snake, coast horned lizard, coast patch-nosed snake, and San Diego black-tailed jackrabbit in order to avoid or minimize take of these sensitive species. Individuals shall be relocated to nearby undisturbed areas with suitable habitat, as identified by the qualified biologist in consultation with CDFG staff. Results of the surveys and relocation efforts shall be provided to the City with a copy to CDFG. Collection and relocation of animals shall only occur with the proper scientific collection and handling permits.	Qualified biologist to consult with CDFG regarding timing of pre-construction surveys Qualified biologist to conduct surveys	Community Development Department/ Planning Division	60 days prior to grading activities No later than 30 days prior to grading	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
c. Common and Special-Status Bird Nests	<p>4.6-7 Beginning 30 or more days prior to the removal of any suitable riparian habitat that will occur during the riparian bird breeding and nesting season of March 15th through September 1st, the applicant shall arrange for weekly bird surveys to detect the above riparian bird species in the habitats to be removed, and any other such habitat within 300 feet of the construction work areas. The surveys shall be conducted by a qualified biologist using CDFG or USFWS survey protocols. The surveys shall continue on a weekly basis, with the last survey being conducted no more than 7 days prior to the initiation of construction work.</p> <p>If an active nest is found, clearing and construction within 300 feet of the nest shall be postponed until the nest is vacated and juveniles have fledged, and when there is no evidence of a second attempt at nesting. Limits of construction to avoid a nest site shall be established in the field with flagging and stakes or construction fencing. Construction personnel shall be instructed on the ecological sensitivity of the area.</p> <p>Results of the surveys, including surveys to locate nests, shall be provided to the USACE and CDFG. The results shall include a description of any nests located and measures to be implemented to avoid nest sites.</p>	<p>Qualified biologist to conduct weekly surveys from March 15 through September 1</p> <p>Confirm that results provided to USACE and CDFG</p>	Community Development Department/ Planning Division	<p>30 or more days prior to removal of riparian habitat suitable for bird breeding</p> <p>Prior to and during construction activities</p>	
d. Indirect impacts	<p>4.6-8 Signage shall be installed along the River Corridor indicating that no pets of any kind are allowed within the preserved River Corridor.</p>	Confirm that signage is installed	Community Development Department/ Planning Division	Prior to issuance of Occupancy Permit	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-9 Fencing of sufficient height and design (i.e., ranch-rail) shall be constructed between the edge of developed areas and the River Corridor to deter humans and pets from entering habitat areas within the River Corridor.</p> <p>Locally indigenous native shrubs shall be planted along the fence to further deter access. Final fence design shall be approved by the City Planning Department. Fencing shall not be placed within the USACE or CDFG jurisdictional areas of the site.</p> <p>The potentially palette of local indigenous native plant species to be used along the fence include the following, observed on site during the course of biological surveys: California juniper, blue elderberry, four-wing saltbush, quailbush, skunk bush, California sagebrush, Great Basin sagebrush, coyote bush, mulefat, white-stem rabbitbrush, thick-leaf yerba santa, bladderpod, cane cholla, coastal prickly pear, coast live oak, golden currant, chaparral currant, black sage, western sycamore, California buckwheat, thick-leaf ceanothus, wedgeleaf ceanothus, chamise, Fremont's cottonwood, Gooding's willow, arroyo willow, and Whipple's yucca.</p>	Review fence design and plant palette	Community Development Department/ Planning Division	Prior to building occupancy	
	<p>4.6-10 Human access into the River Corridor shall only occur in designated locations (i.e., existing and future trails). All motorized vehicles and off-trail bike riding shall be prohibited from entering the preserved River Corridor with the exception of authorized emergency or maintenance vehicles, and signs shall be posted along the River Corridor prohibiting such uses.</p>	Confirm that signage is installed	Community Development Department/ Planning Division	Prior to occupancy	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-11 Prohibitions against human, domestic animal, and motorized vehicle/bike entry into the River Corridor shall be established by ordinance or recorded CC&Rs.	Recordation of CC&Rs	Community Development Department/ Planning Division	Prior to occupancy	
	4.6-12 Interpretative signs shall be constructed and placed in appropriate areas, as determined by a qualified biologist, that explain the sensitivity of natural habitats and the need to minimize impacts on these natural areas. The signs will state that the River Corridor is a protected natural area and that all pedestrians must remain on designated trails, all pets are to be restrained on a leash, and that it is illegal to harm, remove, or collect native plants and animals. The project applicant shall be responsible for installation of interpretive signs and fencing along the River Corridor.	Conduct site inspection	Community Development Department/ Planning Division	Prior to first Certificate of Occupancy	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-13 A qualified restoration specialist shall ensure that the proposed landscape plants will not naturalize and cause maintenance or vegetation community degradation in open-space areas of the project site. Container plants to be installed within public areas shall be inspected by a qualified restoration specialist for the presence of disease, weeds, and pests, including Argentine ants. Plants with pests, weeds, or diseases shall be rejected. In addition, landscape plants shall not be on the Cal-IPC California Invasive Plant Inventory (http://www.cal-ipc.org/ip/inventory/index.php). Except as required for fuel modification, irrigation of perimeter landscaping adjacent to the River Corridor with native plant communities shall be limited to temporary irrigation (i.e., until plants become established).	On-site monitoring by a qualified restoration specialist	Community Development Department/ Planning Division	During project buildout	
	4.6-14 The applicant shall be responsible for weeding all restoration/enhancement sites to prevent an infestation of perennial non-native invasive weeds. All perennial, non-native invasive weed species (e.g., arundo, pampas grass, fennel, perennial pepperweed, castor bean, tamarisk, etc.) shall be controlled for a period of 5 years after the initial vegetation community restoration, or until the 5-year success criteria described in the Wetlands Plan, 2009, are met. The cover of annual, non-native plant species at the mitigation sites shall not exceed the requirements of the Wetlands Plan, 2009, at any time during the period of documenting successful restoration.	Conduct restoration/enhancement activities per Wetlands Plan, 2009, and document successful restoration	Community Development Department/ Planning Division	Monitor and control for a period of 5 years or until 5-year success criteria met	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-15 Waste and recycling receptacles that discourage foraging by wildlife species adapted to urban environments shall be installed in common areas and parks throughout the project site.	Confirm that receptacles are installed	Community Development Department/ Planning Division	During project buildout	
	4.6-16 All bridge, street, residential, and parking lot lighting shall be downcast luminaries or directional lighting with light patterns directed away from the River Corridor. Similarly, all lighting immediately adjacent to the Santa Clara River, Oak Park, and designated mitigation areas for biological resources shall be shielded. CC&Rs shall require that exterior lighting within the residential areas adjacent to the River Corridor be limited to low luminosity and/or shielded.	Review of Architectural Site Plan elevations and CC&Rs	Community Development Department/ Planning Division	During project buildout	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-17 The following guidelines shall be followed to minimize impacts on remaining biological resources on site as a result of construction and grading activities and to ensure that potential impacts on these resources will remain less than significant:</p> <p>A qualified biologist shall be retained as a construction monitor to ensure that incidental construction impacts on biological resources are avoided, or minimized, and to conduct pre-grading field surveys for special-status plant and wildlife species that may be destroyed as a result of construction or site preparation activities. Responsibilities of the construction monitor include the following:</p> <ul style="list-style-type: none"> • The construction monitor shall attend pre-grade meetings to ensure that timing/location of construction activities do not conflict with mitigation requirements (e.g., seasonal surveys for plants and wildlife). • Mark/flag the construction area in the field with the contractor in accordance with the final approved grading plan. Haul roads and access roads shall only be sited within the grading areas analyzed in the project EIR. • Supervise cordoning of preserved natural areas that lie outside grading areas identified in the project EIR (e.g., with temporary fence posts and colored rope). 	On-site monitoring by a qualified biologist	Community Development Department/ Planning Division	Ongoing through grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-17 (continued) <ul style="list-style-type: none"> Conduct a field review of the staking (to be set by the surveyor) designating the limits of all construction activity areas immediately adjacent to riparian areas or other special-status resources may be flagged or temporarily fenced by the monitor, at his/her discretion. Conduct meetings with the contractor and other key construction personnel describing the importance of restricting work to designated areas. The monitor should also discuss procedures for minimizing harm or harassment of wildlife encountered during construction. Periodically visit the site during construction to coordinate and monitor compliance with the above provisions. 				
	4.6-18 Construction personnel shall be prohibited from entry into areas outside the designated construction area, except for necessary construction related activities, such as surveying. All such construction activities shall be coordinated with the construction monitor.	On-site monitoring by a qualified biologist	Community Development Department/ Planning Division	Ongoing through grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-19 Construction activities shall be limited to the following areas of temporary disturbance:</p> <ul style="list-style-type: none"> • an 85-foot-wide zone that extends into the river from the base of the rip rap or gunite bank protection where it intercepts the river bottom; • 100 feet on either side of the outer edge of the Vista Canyon Road bridge and the haul route (located within bridge zone); • 50-foot-wide corridor for all utility lines; and • 20-foot-wide temporary access ramps and roads to reach construction sites. • The locations of these temporary construction sites and the routes of all access roads within CDFG or USACE jurisdiction shall be shown on maps submitted to the CDFG and USACE. Any variation from these limits shall be noted, with a justification for a variation. The construction plans should indicate what type of vegetation, if any, would be temporarily disturbed, and the post construction activities to facilitate natural revegetation of the temporarily disturbed areas. The boundaries of the construction site and any temporary access roads within the riverbed shall be marked in the field with stakes and flagging. No construction activities, vehicular access, equipment storage, stockpiling, or significant human intrusion shall occur outside the work area and access roads. 	<p>On-site monitoring by a qualified biologist</p> <p>Submit routes for approval</p>	<p>Community Development Department/ Planning Division</p>	<p>Ongoing through grading and construction activities</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-20 Equipment shall not be operated in areas of ponded or flowing water within CDFG or USACE jurisdiction unless there are no practicable alternative methods to accomplish the construction work, and only after prior approval by the CDFG and the USACE. Approval shall be acquired by submitting a request to CDFG and USACE no later than 30 days prior to construction. The request must contain a biological evaluation demonstrating that no sensitive fish, amphibians, or reptiles are currently present, or likely to be present during construction, at the construction site or along access roads.	Submit request for approval of equipment use	Community Development Department/ Planning Division CDFG and USACE	Submit 30 days prior to construction	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-21 Temporary sediment retention ponds shall be constructed downstream of construction sites that are located in River Corridor under the following circumstances:</p> <ul style="list-style-type: none"> the construction site contains flowing or ponded water that drains off site into the undisturbed streamflow or ponds; or streamflow is diverted around the construction site, but the work is occurring in the period November 1st through April 15th when storm flows could inundate the construction site. The sediment ponds shall be constructed of riverbed material and shall prevent sediment laden water from reaching undisturbed ponds or streamflows. To the extent possible, ponds shall be located in barren or sandy river bottom areas devoid of existing riparian scrub, riparian woodland, or aquatic habitat. The ponds shall be maintained and repaired after flooding events, and shall be restored to pre-construction grades and substrate conditions within 30 days after construction has ended at that particular site. The location and design of sediment retention ponds shall be included in the Storm Water Pollution Prevention Plan (SWPPP) prepared by the applicant for all construction activities that require a NPDES General Construction Activity Storm Water Permit. 	Preparation of SWPPP	Community Development Department/ Planning Division	During grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-22 Installation of bridges, culverts, or other structures shall not impair movement of fish and aquatic life. Bottoms of temporary culverts shall be placed at or below channel grade. Bottoms of permanent culverts shall be placed below channel grade.	Review of Construction Plans	Community Development Department/ Planning Division	During grading activities	
	4.6-23 Water containing mud, silt, or other pollutants from construction activities shall not be allowed to enter a flowing stream or be placed in locations that may be subject to normal storm flows during periods when storm flows can reasonably be expected to occur.	Conduct site inspection	Community Development Department/ Planning Division	During construction activities	
	4.6-24 Vehicles shall not be driven or equipment operated in areas of ponded or flowing water, or where wetland vegetation, riparian vegetation, or aquatic organisms may be destroyed, except as otherwise provided for in the CWA section 404 permit or CDFG 1603 agreement.	Conduct site inspection	Community Development Department/ Planning Division	During construction activities	
	4.6-25 Silt settling basins, installed during the construction process, shall be located away from areas of ponded or flowing water to prevent discolored, silt bearing water from reaching areas of ponded or flowing water during normal flow regimes.	Review of Construction Plans	Community Development Department/ Planning Division	During grading activities	
	4.6-26 If a stream channel has been altered during the construction or maintenance operations, its low flow channel shall be returned as nearly as possible to pre project topographic conditions without creating a possible future bank erosion problem or a flat wide channel or sluice like area.	Conduct on- site inspection	Community Development Department/ Planning Division	During construction and ongoing	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-27 Temporary structures and associated materials not designed to withstand strong seasonal flows shall be removed to areas above the high water mark before such flows occur.	Conduct on- site inspection	Community Development Department/ Planning Division	Prior to seasonal flows	
	4.6-28 Staging and storage areas for construction equipment and materials shall be located outside of the CDFG or USACE jurisdiction.	Review of Construction Plans Conduct on-site inspection	Community Development Department/ Planning Division	During grading activities	
	4.6-29 Any equipment or vehicles driven or operated within or adjacent to the River Corridor shall be checked and maintained daily, to prevent leaks of materials that if introduced to water could be deleterious to aquatic life.	Conduct on-site inspection	Public Works Department/ Development Services Division	Daily during construction activities	
	4.6-30 Stationary equipment such as motors, pumps, generators, and welders which may be located within the River Corridor construction zone shall be positioned over drip pans. No fuel storage tanks shall be allowed in the River Corridor.	Conduct on-site inspection	Public Works Department/ Development Services Division	Daily during construction activities	
	4.6-31 The applicant shall use best efforts to ensure that no debris, bark, slash sawdust, rubbish, cement or concrete or washing thereof, oil, petroleum products, or other organic material from any construction, or associated activity of whatever nature, shall be allowed to enter into, or be placed where it may be washed by rainfall or runoff into, watercourses included in the permit. When construction operations are completed, any excess materials or debris shall be removed from the work area.	Conduct on-site inspection	Public Works Department/ Development Services Division	During and at the terminus of construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-32 No equipment maintenance shall be done within or near the River Corridor where petroleum products or other pollutants from the equipment may enter this area.	Conduct on-site inspection	Public Works Department/ Development Services Division	During construction activities	
	4.6-33 As the project reach of the Santa Clara River typically has no surface flows, any water diversions shall utilize: <ul style="list-style-type: none"> Pilot channels constructed to divert flows around work areas shall be sized to maintain existing water velocities, with wide, shallow channels being utilized. The channel should be kept as small as possible, extending no more than 25 feet upstream and downstream of the work area. Construction of pilot channels should start downstream. Once water is diverted into the new channel, the original channel should be visually inspected and any stranded animals shall be removed and returned to the water downstream of the diversion. Once the diversion is no longer needed, the area shall be restored as closely as possible to its original configuration. The use of a pump to divert flows around a work site is also acceptable. The pump must have at least a 0.25-inch screen. Water should be discharged downstream, within 25 feet of the work area. Any dams installed across flowing water for the diversion shall be removed upon completion of construction and the area shall be restored as closely as possible to its original configuration. 	Review of Construction Plans Alert City Department of Planning and USACE of work that may adversely impact Endangered species and implement any mitigation measures required Field verification	Community Development Department/ Planning Division USACE and CDFG	Prior to issuance of Construction Permits, and at least 2 weeks prior to work	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-33 (continued)</p> <ul style="list-style-type: none"> The Operator shall alert the USACE and the Department of work to be performed at least two weeks in advance of the work. If the work may adversely impact Endangered species, the USACE, the Department and the City shall meet in the field to resolve the issue. The City may contact the USACE and the Department to identify areas of potential Endangered species habitat. If the USACE and the Department believe the work may adversely impact Endangered species or its habitat resources or the City wishes to consult with the USACE and the Department, a field meeting will be scheduled. At the field meeting, the USACE and the Department will provide information regarding Endangered or Threatened species that could be impacted by the project. If take of an Endangered species will occur, the appropriate Endangered species permits will be required. To the extent that a USFWS Section 7 and a CDFG Section 2081 Memorandum of Agreement have been completed for the species present, the mitigation measures shall be implemented and construction may proceed as outlined in these documents. 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-33 (continued)</p> <ul style="list-style-type: none"> Standard dust control measures shall be implemented to reduce impacts on nearby plants and wildlife. This includes replacing ground cover in disturbed areas as quickly as possible; watering active sites at least twice daily; suspending all excavating and grading operations when wind speeds (as instantaneous gusts) exceed 25 mph; and restricting traffic speeds on all unpaved roads to 15 mph or less in areas within 200 feet of vegetation. Upon completion of construction, the contractor shall be held responsible to restore any haul roads and access roads that are outside of approved grading limits. This restoration shall be done in consultation with the construction monitor. 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-34 If the Oak Tree Permit is approved by the City Council, the applicant shall have permission to remove the following oak trees on the project site (Heritage Trees are in bold): No. 4, No. 25, No. 26, No. 27, No. 28, No. 29, No. 30, No. 31, and No. 32.</p> <p>If approved by the City Council, the applicant shall have permission to encroach into the protected zone of the following oak trees (Heritage Trees are shown in bold): No. 1, No. 3, No. 33, No. 34, No. 38, No. 47, No. 50, No. 52, and No. 71. If approved by the City Council, the applicant shall have permission to trim livewood in excess of 2 inches in diameter of the following trees: No. 1, No. 3, No. 33, No. 34, No. 38, and No. 52.</p> <p>If approved by the City Council, the applicant shall have permission to encroach within the protected zone of the following off-site oak trees (Heritage Trees shown in bold):</p> <p>Tree No. 25B (Lost Canyon Road/Sand Canyon Road Option 3 - encroachment and trimming)</p> <p>Tree No. 45 (Lost Canyon Road/Sand Canyon Road Option 3 – encroachment and trimming)</p>	Conduct on-site inspection	Public Works Department/ Urban Forestry	Prior to issuance of Grading Permit(s)	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-35 The applicant and all their contractors shall be in compliance with the City of Santa Clarita Oak Tree Ordinance and Preservation and Protection Guidelines at all times throughout the project. Failure to comply with these requirements shall be considered non-compliant and may result in the issuance of a Stop All Work notice, construction delays and additional fees.	Conduct site inspection to confirm compliance	Public Works Department/ Urban Forestry	Throughout grading and construction activities	
	4.6-36 The applicant and all their contractors shall adhere to all recommendations issued by the applicant's Arborist of Record (AOR) both during on-site monitoring as well as those listed within the project's oak tree reports and addendums. Failure to comply with these recommendations shall be considered non-compliant and may result in the issuance of a Stop All Work notice, construction delays and additional fees.	Conduct site inspection to confirm compliance	Public Works Department/ Urban Forestry	Throughout grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-37 Mitigation for the oak tree impacts referenced above shall include dedication to the City of Santa Clarita of the 2-acre oak tree preserve located adjacent to the Oak Park. Dedication of this 2-acre property to the City shall occur in conjunction with dedication of the Oak Park. A deed restriction shall be recorded over this 2-acre preserve restricting its use to open space only and prohibiting any future development or grading. Signage shall be posted along the trail adjacent to the preserve indicating that this area is an oak tree preserve/mitigation area.</p> <p>Additionally, the applicant shall be required to plant mitigation oak trees on this 2-acre parcel as well as a portion of the Town Green parcel to the satisfaction of the Director of Community Development. The oak preserve and Town Green shall be the primary oak mitigation areas for the project. Secondary oak tree mitigation or planting areas shall include trail corridors throughout the project site. Group plantings of native oaks are encouraged in areas that will accommodate the trees for future growth. Examples are passive parks, break areas, open landscape areas, new trails and the entrance to commercial and residential portions of the project.</p>	<p>Review deed restriction</p> <p>Conduct site inspection to confirm signage is posted and mitigation trees planted</p>	Public Works Department/ Urban Forestry Community Development Department	Prior to issuance of Building Permits in PA-3	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-37 (continued) The planting of on-site mitigation oak trees referenced above shall be equal to or exceed the International Society of Arboriculture (ISA) dollar value of all oak trees proposed for removal, presently estimated at \$404,990 (includes the 9 oak trees on site and the one potential oak tree off site). Prior to the issuance of grading permits and the start of any construction, the applicant shall be required to bond for the International Society of Arboriculture (ISA) dollar value of all oak trees proposed for removal.				
	4.6-38 Prior to the issuance of grading permits and the start of any construction, the applicant shall have all required protective fencing installed around the oak trees. Oak trees that are proposed for encroachment shall have the protective fence placed at the furthest point away from the trunk that will allow for the necessary construction. All remaining oak trees shall have the fence installed at the protected zone located 5 feet out from edge of dripline.	Conduct on-site inspection of fencing for oak trees not removed	Public Works Department/ Urban Forestry	Prior to issuance of Grading Permit(s)	
	4.6-39 Protective fencing shall consist of 5-foot standard chain link material supported by steel post driven directly into the ground and evenly spaced at 8 feet on center. 36-inch silt fencing shall be installed at the base of all protective fencing and be maintained in good repair throughout all phases of construction.	Conduct on-site inspection of fencing	Public Works Department/ Urban Forestry	Fencing shall be placed around oak trees prior to grading activities and monitored during grading and construction	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-40 A maximum of one non-gated 3-foot-wide opening shall be left open on the opposite side of construction to allow for required monitoring by City staff and the applicant's Arborist of Record. Openings shall be spaced every 100 feet or at a rate of one per tree.	Conduct on-site inspection of fencing	Public Works Department/ Urban Forestry	Fencing shall be placed around oak trees prior to grading activities	
	4.6-41 The applicant shall be required to install proper signage that reads "THIS FENCE IS FOR THE PROTECTION OF OAK TREES AND SHALL NOT BE REMOVED OR RELOCATED WITHOUT WRITTEN AUTHORIZATION BY THE CITY ARBORIST"	Confirm that signage is installed	Public Works Department/ Urban Forestry	Signage shall be placed prior to grading activities	
	4.6-42 The applicant shall be required to submit a copy of all future site plans including but not limited to grading plans, street improvement plans, construction plans and landscape plans to the City of Santa Clarita Oak Tree Specialist. All site plans shall require written approval from the City's Urban Forestry Division.	Review all future site plans	Public Works Department/ Urban Forestry	Obtain approval prior to implementation of future site plans	
	4.6-43 Any oak tree approved for relocation (presently Tree No. 31 is proposed for relocation) shall be completed by an approved qualified tree relocating company.	Retain qualified tree locating company for tree relocation	Public Works Department/ Urban Forestry	Prior to tree removal	
	4.6-44 Any oak tree proposed for relocation shall be considered a removal. Any oak tree that has been approved for relocation shall require an up to 90-day side box waiting period before bottom roots may be removed. The final waiting period shall be established by the Arborist of Record and the City's Oak Tree Specialist.	Conduct on-site inspection by Project Arborist Establish waiting period	Public Works Department/ Urban Forestry	Establish and implement waiting period prior to relocation	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	4.6-45 Any oak tree which has been approved for relocation shall require a minimum five year mitigation period, which shall include the submittal of all maintenance and monitoring records completed on the tree. Monitoring reports shall be submitted at the end of each month for the first two years, quarterly (four times per year) for the following two years and biannually for the final year. The bond (based upon a value equivalent to the oak tree's ISA value) for the relocated tree will not be exonerated until the completion of the required mitigation period.	Conduct on-site inspection by Project Arborist and submit monitoring reports	Public Works Department/ Urban Forestry	Submit monitoring reports monthly for the first 2 years, quarterly for the following 2 years and biannually for the final year (a total of 5 years of monitoring)	
	4.6-46 The applicant shall be required to incorporate large-scale trees, which include 48 inch and 60 inch box trees into its mitigation plan. This may also include the installation of specimen size trees that range from 72 inch box in size up to 84 inch box trees.	Conduct on-site inspection by Project Arborist	Public Works Department/ Urban Forestry	During implementation of tree mitigation plan	
	4.6-47 Mitigation oak trees may include the following native species of oak; Coast live oak (<i>Quercus agrifolia</i>), or Canyon oak (<i>Quercus chrysolepis</i>). Incorporating additional native species in areas immediately adjacent to where established oak trees are present may have a negative impact on the existing oak trees and is not permitted.	Conduct on-site inspection by Project Arborist	Public Works Department/ Urban Forestry	During implementation of tree mitigation plan	
	4.6-48 The applicant shall comply with all additional requirements of the projects adopted oak tree permit.	Conduct on-site inspection by Project Arborist	Public Works Department/ Urban Forestry	During implementation of tree mitigation plan	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Biological Resources (continued)					
	<p>4.6-49 An integrated pest management plan that addresses the use of pesticides (including rodenticides and insecticides) on site within the River Corridor, including buried bank stabilization areas, will be prepared prior to the issuance of building permits for the initial tract map. The plan will implement appropriate Best Management Practices to avoid and minimize adverse effects on the natural environment, including vegetation communities, special-status species, species without special status, and associated habitats, including prey and food resources (e.g., insects, small mammals, seeds). Potential management practices include cultural (e.g., planting pest-free stock plants), mechanical (e.g., weeding, trapping), and biological controls (e.g., natural predators or competitors of pest species, insect growth regulators, natural pheromones, or biopesticides), and the judicious use of chemical controls, as appropriate (e.g., targeted spraying versus broadcast applications). The plan will establish management thresholds (i.e., not all incidences of a pest require management); prescribe monitoring to determine when management thresholds have been exceeded; and identify the most appropriate and efficient control method that avoids and minimizes risks to natural resources. Preparation of the CC&Rs for each tract map shall include language that prohibits the use of anticoagulant rodenticides in the project site.</p>	Review pest management plan, conduct monitoring, and prepare CC&Rs	Community Development Department/ Planning Division	Prior to issuance of Occupancy Permits	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Water Service					
	4.8-1 The proposed project shall implement a water recycling system in order to reduce the project's demand for imported potable water. The project shall install a distribution system to deliver recycled water to irrigate land uses suitable to accept reclaimed water, pursuant to Los Angeles County Department of Health Standards. Uses include retail, office, and commercial spaces. Such uses shall be dual-plumbed to receive recycled water for toilet facilities.	Inspect water recycling system	Public Works Department/ Development Services Division and Los Angeles County Department of Health	Prior to issuance of Occupancy Permits	
	4.8-2 Landscape concept plans shall include a palette rich in drought-tolerant and native plants.	Review landscape plans	Community Development Department/ Planning Division	During project development	
	4.8-3 Water conservation measures as required by the State of California shall be incorporated into all irrigation systems.	Review irrigation systems designs	Community Development Department/ Planning Division	During project development	
	4.8-4 In conjunction with the submittal of applications that permit construction, and prior to approval of any such permits, the City of Santa Clarita shall require the applicant of the permit to obtain written confirmation from the retail water agency identifying the source(s) of water available to serve the project concurrent with need.	Obtain written confirmation	Community Development Department/ Planning Division	Prior to map recordation that permits development	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Water Service (continued)					
	4.8-5 Prior to commencement of use, all uses of recycled water shall be reviewed and approved by the State of California Health and Welfare Agency, Department of Health Services.	Review uses of recycled water	Public Works Department/ Development Services Division State of California Health and Welfare Agency, Department of Health Services	Approval prior to issuance of Occupancy Permits	
	4.8-6 Prior to the issuance of building permits that allow construction, the applicant of the project shall finance the expansion costs of water service extension to the project through the payment of connection fees to the appropriate water agency(ies).	Finance the expansion costs to appropriate water agency	Public Works Department/ Development Services Division	Prior to approval of construction permits	
Water Quality					
	4.8.1-1 The project applicant shall be required to implement all Project Design Features (PDFs), as outlined in Subsection 5 (Project Design Features) of this section.	Review of Project Design Features and inspect features when implemented	Public Works Department/ Development Services Division and LACDPW	During project development	
Solid Waste Disposal					
	4.9-1 Recycling/separation areas will be located in close proximity to dumpsters for non-recyclables, elevators, loading docks, and primary internal and external access points.	Check Building and Site Plans	Public Works Department/ Environmental Services Division	During project development	
	4.9-2 Recycling/separation areas will not conflict with any applicable federal, state, or local laws relating to fire, building, access, transportation, circulation, or safety.	Check Building and Site Plans	Public Works Department/ Environmental Services Department	During project development	
	4.9-3 Recycling/separation areas will be conveniently located for those persons who deposit, collect, and load the recyclable materials.	Check Building and Site Plans	Public Works Department/ Environmental Services Division	During project development	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Solid Waste Disposal (continued)					
	4.9-4 Recycling containers/bins will be located so as to not block access to each other.	Check Building and Site Plans	Public Works Department/ Environmental Services Division	During project development	
	4.9-5 Yard waste will be reduced through the use of xeriscaping techniques and the use of drought-tolerant and native vegetation in common area landscaping, wherever possible.	Check Building and Landscape Plans	Community Development Department/ Planning Division	Prior to Building Permit issuance for each phase	
	4.9-6 For commercial developments and residential buildings having five or more living units, no refuse collection or recycling areas will be located between a street and the front of a building.	Check Building Plans	Public Works Department/ Environmental Services Division	Prior to permit issuance	
	4.9-7 On-site trash compactors will be installed for non-recyclables in all restaurants/food services areas.	Check Building Plans	Public Works Department/ Environmental Services Division	Prior to permit issuance	
	4.9-8 The project will comply with City recycling requirements, including the number and location of recycling and waste bins.	Check Building Plans	Public Works Department/ Environmental Services Division	Prior to permit issuance	
	4.9-9 First-time buyers and businesses will receive educational material on the City's waste management efforts. Educational material shall be passed to consecutive buyers using the CC&Rs.	Provide information to merchant builders	Public Works Department/ Environmental Services Division	Prior to Certificate of Occupancy	
	4.9-10 The applicant shall comply with all applicable state, regional, and local regulations and procedures for the use, collection, and disposal of solid and hazardous wastes.	Conduct on-site inspection	Public Works Department/ Environmental Services Division	During grading and construction activities	
	4.9-11 During construction, recycling bins for glass, metals, paper, wood, plastic, greenwastes, and cardboard will be placed on site to ensure their use by construction workers and will be trucked to recycling/processing facilities.	Conduct on-site inspection	Public Works Department/ Environmental Services Division	During grading and construction activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Solid Waste Disposal (continued)					
	4.9-12 In construction specification and bid packages, building materials made of recycled materials will be required, to the extent possible and feasible.	Review of bid specifications	Public Works Department/ Environmental Services Division	Prior to issuance of contract to perform work	
Parks and Recreation					
	4.12-1 Consistent with the Vista Canyon Specific Plan, development of the project shall provide the following parks and open areas: <ul style="list-style-type: none"> • 10 acres of public parkland with improvements, including the Oak Park and the River Education Center; • Up to six private recreation facilities and over 4 miles of trails; and • Dedication of the Santa Clara River Corridor on site. 	Check Building Plans to verify compliance that the appropriate acreage of parkland has been provided	Parks, Recreation and Community Services Department	During project development	
	4.12-2 The project applicant, or its designee, will meet City parkland requirements by providing either the dedication of land, payment of in-lieu fees, construction of park amenities, or any combination of the three as approved by the Director of Parks, Recreation and Community Services, prior to issuance of building permits.	Collect fees, dedicate land or construct facilities Conduct field inspections	Parks, Recreation and Community Services Department	Prior to the issuance of Building Permits	
Fire Services					
Access Requirements	4.13-1 Due to the size of the proposed development the applicant shall provide multiple means of access as required by the Los Angeles County Fire Department.	On-site inspection	Public Works Department/ Development Services Division Los Angeles County Fire Department	During construction process	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-2 Access shall be provided onto the project site as noted on the tentative tract map.	Review tentative tract map	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-3 Access to the proposed project site shall comply with Section 503 of the Fire Code, which requires all weather access. All weather access pay requires paving.	On-site inspection Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-4 Fire Department Access shall be extended to within 150 feet distance of any exterior portion of all structures. On-site vehicular access shall be required for any building exceeding 150 feet from the public street.	On-site inspection Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-5 Where driveways extend further than 150 feet and are of single access design, turnarounds suitable for fire protection equipment use shall be provided and shown on the final tract map. Turnarounds shall be designed, constructed and maintained to insure their integrity for Fire Department use. Where topography dictates, turnarounds shall be provided for driveways that extend over 150 feet in length.	On-site inspection Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-6 Private driveways shall be indicated on the final tract map as "Private Driveway and Fire Lane" with the widths clearly depicted and shall be maintained in accordance with the Fire Code. All required fire hydrants shall be installed, tested and accepted by the County of Los Angeles Fire Department prior to the commencement of construction.	Review of final tract map	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to approval of final tract map	
	4.13-7 Vehicular access shall be provided and maintained serviceable to all fire hydrants throughout the construction period of the proposed project.	On-site inspection	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-8 For buildings that are less than three stories in height and/or less than 35 feet in height, an unobstructive driveway with a minimum width of 26-feet, clear-to-sky, shall be posted with a sign that reads, "No Parking – Fire Lane."	On-site inspection to confirm signage installed	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-9 For buildings that are more than three stories and/or 35 feet or greater in height, an unobstructive driveway with a minimum width of 28-feet, clear-to-sky, shall be posted with a sign that reads, "No Parking – Fire Lane." The center line of the access roadway shall be located parallel to and within 30-feet of the exterior wall on at least one side of each proposed building.	On-site inspection Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-10 For each building to be developed in Planning Area's 1 and 2, access shall be required to within 150 feet of all exterior portions of the building with a minimum driveway width of 28 feet, clear-to-sky, and shall be posted with a sign that reads, "No Parking – Fire Lane."	On-site inspection to confirm signage installed	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-11 The center-line of the access roadway shall be located parallel to and within 30 feet of the exterior wall on at least one side of each proposed building.	On-site inspection Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-12 For streets or driveways separated by an island and that provide a minimum unobstructive driveway width of 20-feet, clear-to-sky, shall be posted with a sign that reads, "No Parking – Fire Lane." This requirement shall also be implemented for the eastern connection to Lost Canyon Road.	On-site inspection to confirm signage installed	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-13 All Fire Department turnarounds shall be clearly identified and shall be posted with a sign that reads, "No Parking – Fire Lane."	On-site inspection to confirm signage installed	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	
	4.13-14 Additional access issues shall be addressed with the submittal of the revised plans during building plan check with consultation between the client and the Los Angeles County Fire Department.	Review of Site Plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Building Permits for each phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-15 The project applicant shall provide Los Angeles County Fire Department or City approved street signs and building access numbers prior to occupancy of the buildings on the project site.	On-site inspection	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Occupancy Permits	
Water System Requirements	4.13-16 The project construction engineer shall provide water mains, fire hydrants and fire flows as required by the County of Los Angeles Fire Department, for all land uses on the tract map, and shall be recorded as so.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-17 The project construction engineer ensure that fire flow requirements for Planning Area 1 is 3,500 gallons per minute at 20 pounds per square inch for 3 hours. All proposed structures and buildings shall be constructed to be fully fire sprinklered and have a minimum of Type V-1 hour construction or greater.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-18 The project construction engineer shall ensure that fire flow requirements for Planning Area 2 is 3,500 gallons per minute at 20 pounds per square inch for 3 hours. All proposed structures and buildings shall be required to be fully fire sprinklered and have a minimum of Type V-1 hour construction or greater.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-19 The project construction engineer shall ensure that fire flow requirements for Planning Area 3A and 3B is 2,500 gallons per minute at 20 pounds per square inch for 2 hours. All proposed structures and buildings shall be required to be fully sprinklered and have a minimum of Type 1-V construction or greater. The exact fire flow, with a possible flow reduction, shall be determined during the building plan process.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-20 The project construction engineer shall ensure that fire flow requirements for Planning Area 3C and 3D is 1,500 gallons per minute at 20 pounds per square inch for 2 hours.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-21 The project construction engineer shall ensure that fire flow requirements for Planning Area 4 is 2,500 gallons per minute at 20 pounds per square inch for 2 hours. All proposed structures and buildings shall be fully fire sprinklered and have a minimum of Type V-1 hour construction or greater. The exact fire flow, with a possible flow reduction, shall be determined during the building plan process.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-22 The project construction engineer shall ensure that the required fire flow for private on-site hydrants is 2,500 gallons per minute at 20 pounds per square inch and that each private on-site hydrants must be capable of flowing 1,250 gallons per minute at 20 pounds per square inch with two hydrants flowing simultaneously, one of which shall be the furthest from the public water source.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
	4.13-23 The project construction engineer shall install 59 public fire hydrants. The location for the on-site fire hydrants shall be determined during building plan check.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-24 All fire hydrants shall measure 6-inches by 4 inches by 2.5 inches brass or bronze, and conform to current AWWA standard C503 or approved equal standard. All on-site hydrants shall be installed a minimum of 25-feet from a structure or protected by a 2 hour rated firewall.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
	4.13-25 All required fire hydrants shall be installed, tested and approved by the County of Los Angeles Fire Department prior to Final Map approval.	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to approval of Final Map	
Additional Information Requirements	4.13-26 Considering that the project site is located within the area described by the Fire Department as "Very High Fire Hazard Severity Zone" (formerly Fire Zone 4), the client shall develop and submit to the County of Los Angeles Fire Department a Fuel Modification Plan prior to final map approval. Any questions regarding the content of the Fuel Modification Plan shall be addressed to the Fuel Modification Unit, Fire Station #32, 605 North Angeleno Avenue, Azusa, California 91702-2904, phone (626) 969-5205.	Review Fuel Modification Plan	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to the issuance of Building Permits	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Fire Services (continued)					
Submittal Requirements	4.13-27 The project applicant shall submit a minimum of four copies of the water plans indicating the public fire hydrants to be installed to the Fire Department's Land Development Unit for review prior to final tract map approval.	Review water plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to final tract map approval	
	4.13-28 The project applicant shall submit to the Fire Department's Land Development Unit for review if any changes to the tentative tract map occur.	Review any changes to the tentative tract map	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to final tract map approval	
	4.13-29 The project construction engineer shall submit the building construction plans to the Fire Department's Engineering Unit-Santa Clarita, (661) 286-8821.	Submit construction plans	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to final tract map approval	
Forestry Division – Other Environmental Concerns Requirements	4.13-30 The project applicant shall comply with Fuel Modification requirements as indicated in Mitigation Measure 4.13-26 .	Conduct on-site inspections	Public Works Department/ Development Services Division Los Angeles County Fire Department	Prior to issuance of Certificate of Occupancy	
Sheriff Services					
	4.14-1 During construction, the project applicant, or its designee, shall retain the services of a private security firm to patrol the project site.	Conduct on-site inspection	Public Works Department/ Development Services Division	Ongoing during construction activities	
	4.14-2 Prior to construction activities, the project applicant shall have a construction traffic control plan approved by the City of Santa Clarita.	Review traffic control plan	Public Works Department/ Development Services Division	Prior to issuance of Grading Permit	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Sheriff Services (continued)					
	4.14-3 As final development plans are submitted to the City of Santa Clarita for approval in the future, the Sheriff Department design requirements that reduce demands for service and ensure adequate public safety shall be incorporated into the building design. The design requirements for this project shall include: <ul style="list-style-type: none"> • Proper lighting in open areas and parking lots; • Sufficient street lighting for the proposed project's streets; • Good visibility of doors and windows from the streets and between buildings on the project site; and, • Building address numbers on both residential and commercial/retail uses are lighted and readily apparent from the streets for emergency response agencies. 	Review of Building Plans to ensure that safety measures have been incorporated	Community Development Department/ Planning Division Los Angeles County Sheriff Department	Prior to issuance of Building Permits	
	4.14-4 Project design shall include, to the extent feasible, low-growing groundcover and shade trees, rather than a predominance of shrubs that could conceal potential criminal activity around buildings and parking areas.	Review of Building Plans to ensure that safety measures have been incorporated	Community Development Department/ Planning Division Los Angeles County Sheriff Department	Prior to issuance of Building Permits	
	4.14-5 The project applicant, or designee, shall pay the City's law enforcement facilities impact fee in effect at the time of issuance of a building permit.	Payment of fee	Public Works Department/ Development Services Division Los Angeles County Sheriff Department	Prior to issuance of Building Permits	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Human Hazards					
	4.15-1 Prior to grading, areas of the project site indicated on Figure 4.15-1 shall be sampled for the presence of metals, total petroleum hydrocarbons, volatile organic compounds, and pesticides. If the presence of hazards is identified, the area(s) shall be remediated in accordance with federal and state law prior to grading of that portion of the project site.	Conduct soil sampling	Public Works Department/ Development Services Division	Prior to issuance of Grading Permit	
	4.15-2 Prior to demolition activities, an asbestos survey shall be conducted by a qualified environmental professional to determine the presence or absence of asbestos at the existing, on-site, single-family residence. The survey shall be submitted to the City of Santa Clarita. If present, asbestos removal shall be performed by a State-certified asbestos containment contractor in accordance with the Toxic Substance Control Act (15 U.S.C. Section 2601 et. seq.).	Conduct asbestos survey	Public Works Department/ Development Services Division	Prior to demolition activities	
Visual Resources					
	4.16-1 The project applicant, or designee, shall require that the use of nighttime lighting during project construction be limited to only those features on the construction site requiring illumination.	Conduct field inspections	Public Works Department/ Development Services Division	During grading and construction	
	4.16-2 The project applicant, or designee, shall require that all security lights be properly shielded and projected downwards during construction, such that light is directed only onto the work site.	Conduct field inspections	Public Works Department/ Development Services Division	During grading and construction	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Visual Resources (continued)					
	4.16-3 The project applicant, or designee, shall require that all outdoor lighting along the project site boundary consist of low-intensity downlights, or be equipped with louvers, shields, hoods or other screening devices.	Conduct field inspections Check Street and Trail Lighting Plan/Program and subsequent Building Plan specifications	Community Development Department/ Planning Division	Prior to permit issuance for applicable phase	
	4.16-4 The project applicant, or designee, shall require that all outdoor lighting along the project site boundary be projected downwards to illuminate the intended surface and minimize light spillover and glare generation.	Conduct field inspections Check Street and Trail Lighting Plan/Program and subsequent Building Plan specifications	Community Development Department/ Planning Division	Prior to permit issuance for applicable phase	
	4.16-5 The project applicant, or designee, shall require that only low-reflective building materials be used on building exteriors.	Conduct field inspections Check Street and Trail Lighting Plan/Program and subsequent Building Plan specifications	Community Development Department/ Planning Division	Prior to permit issuance for each applicable phase	
Cultural Resources					
	4.18-1 Site VC-2/H contains the remains of the Mitchell family homestead, which may contain important subsurface archeological deposits. A Phase III data recovery (salvage excavation) program shall be conducted on Site VC-2/H prior to grading activities.	Conduct Phase III data recovery program	Community Development Department/ Planning Division	Prior to issuance of Grading Permit for that area of the project	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Cultural Resources (continued)					
	<p>4.18-2 In the event that cultural resources are found during construction, activity shall stop and a qualified archaeologist shall be contacted to evaluate the resources. If the find is determined to be a historical or unique archaeological resource, contingency funding and a time allotment sufficient to allow for implementation of avoidance measures or appropriate mitigation will be made available. Construction on other parts of the project site may proceed in accordance with Public Resources Code section 21083.2(i).</p>	Inspection during grading activities	Community Development Department/ Planning Division	During project development	
	<p>4.18-3 If, during any phase of project construction, there is the discovery or recognition of any human remains in any location other than a dedicated cemetery, the following steps, which are based on Public Resources Code section 5097.98 and <i>State CEQA Guidelines</i> section 15064.5(e), shall be taken:</p> <ol style="list-style-type: none"> 1. There will be no further excavation or disturbance of the site or any nearby area reasonably susceptible to overlying adjacent human remains until: <ol style="list-style-type: none"> a. The Los Angeles County Coroner is contacted to determine that no investigation of the cause of death is required; and 	Inspections during project grading	Community Development Department/ Planning Division	During project development	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Cultural Resources (continued)					
	<p>4.18-3 (continued)</p> <p>b. If the Coroner determines the remains to be Native American:</p> <p>(i) The Coroner shall contact the Native American Heritage Commission within 24 hours;</p> <p>(ii) The Native American Heritage Commission shall identify the person or persons it believes to be the most likely descendant from the deceased Native American; and</p> <p>(iii) The most likely descendent may make recommendations to the Project applicant for means of treating or disposing of, with appropriate dignity, the human remains and any associated grave goods as provided in Public Resources Code section 5097.98, or,</p>				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Cultural Resources (continued)					
	<p>4.18-3 (continued)</p> <p>2. Where the following conditions occur, the project applicant, or its designee, shall reburial the Native American human remains and associated grave goods with appropriate dignity on the property in a location not subject to further subsurface disturbance:</p> <p>a. The Native American Heritage Commission is unable to identify a most likely descendant or the most likely descendant failed to make a recommendation within 24 hours after being notified by the Commission;</p> <p>b. The descendant identified fails to make a recommendation; or</p> <p>c. The project applicant, or its designee, rejects the recommendation of the descendant, and mediation by the Native American Heritage Commission fails to provide measures acceptable to the project applicant.</p>				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis					
Potential impact on Santa Clara River Corridor	<p>4.20-1 The project applicant shall implement the Wetlands Plan, 2009, in order to:</p> <ul style="list-style-type: none"> (a) Satisfy the mitigation requirements of local, state, and federal agencies for wetland and riparian habitat; (b) Create or restore riparian and riverine vegetation communities suitable for nesting, foraging, and breeding by native animal species; (c) Create or restore vegetation communities to be compatible with the fluvial morphology and hydrology of the stream channel corridor; (d) Create or restore vegetation communities to be consistent with adjacent, existing riparian vegetation communities; and (e) Create or restore vegetation communities to be self-sustaining and functional beyond the maintenance and monitoring period. <p>In implementing the Wetlands Plan, 2009, the applicant shall implement the maintenance activities during the specified monitoring, the monitoring plan for the mitigation areas, the reporting requirements, and the contingency measures specified in that plan. The applicant also must satisfy the performance standards and success criteria set forth in that plan. The maintenance and monitoring will be subject to approval of the City's Community Development Department.</p> <p>In conjunction with implementation of the Wetlands Plan, 2009, permanent impacts within the California Department of Fish and Game's jurisdictional delineation limits shall be restored with similar habitat at the rate of 1 acre replaced for 1 acre lost.</p>	<p>Implement Wetlands Plan, 2009</p> <p>Conduct on-site inspection</p>	<p>Community Development Department</p> <p>CDFG</p>	<p>Timing specified by Wetlands Plan, 2009</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis					
	<p>4.20-2 Prior to grading and construction activities, a qualified biologist shall be retained to conduct a worker environmental awareness program for all construction/contractor personnel. A list of construction personnel who have completed training prior to the start of construction shall be maintained on site and this list shall be updated as required when new personnel start work. No construction worker may work in the field for more than five days without participating in the program. The qualified biologist shall provide ongoing guidance to construction personnel and contractors to ensure compliance with environmental/permit regulations and mitigation measures. The qualified biologist shall perform the following:</p> <ul style="list-style-type: none"> • Provide training materials and briefings to all personnel working on site. The material shall include but not be limited to the identification and status of plant and wildlife species, significant natural plant community habitats (e.g., riparian), fire protection measures, and review of mitigation requirements; 	Qualified biologist to conduct worker awareness program	Community Development Department/ Planning Division	Prior to and during construction and grading activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	<p>4.20-2 (continued)</p> <ul style="list-style-type: none"> • A discussion of the federal and state Endangered Species Acts, Bald and Golden Eagle Protection Act, Migratory Bird Treaty Act, other state or federal permit requirements and the legal consequences of non-compliance with these acts; • Attend the pre-construction meeting to ensure that timing/location of construction activities do not conflict with other mitigation requirements (e.g., seasonal surveys for nesting birds, pre-construction surveys, or relocation efforts); • Conduct meetings with the contractor and other key construction personnel describing the importance of restricting work to designated areas. Maps showing the location of special-status wildlife or populations of rare plants, exclusion areas, or other construction limitations (e.g., limitations on nighttime work) will be provided to the environmental monitors and construction crews prior to ground disturbance; • Discuss procedures for minimizing harm to or harassment of wildlife encountered during construction and provide a contact person in the event of the discovery of dead or injured wildlife; 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	<p>4.20-2 (continued)</p> <ul style="list-style-type: none"> Review/designate the construction area in the field with the contractor in accordance with the final grading plan; Ensure that haul roads, access roads, and on-site staging and storage areas are sited within grading areas to minimize degradation of vegetation communities adjacent to these areas (if activities outside these limits are necessary, they shall be evaluated by the biologist to ensure that no special-status species habitats will be affected); Conduct a field review of the staking (to be set by the surveyor) designating the limits of all construction activity; Flag or temporarily fence any construction activity areas immediately adjacent to riparian areas; Ensure and document that required pre-construction surveys and/or relocation efforts have been implemented; and Be present during initial vegetation clearing and grading. 				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	4.20-3 Prior to construction the applicant shall develop a relocation plan for coast horned lizard, silvery legless lizard, and other special-status reptile species. The plan shall include, but not be limited to, the timing and location of the surveys that would be conducted for each species; identify the locations where more intensive efforts should be conducted; identify the habitat and conditions in the proposed relocation site(s); the methods that would be utilized for trapping and relocating the individual species; and provide for the documentation/recording of the species and number of the animals relocated. The plan shall be submitted to the City 60 days prior to any ground disturbing activities within potentially occupied habitat.	Qualified biologist to develop relocation plans for coast horned lizard, silvery legless lizard, and other special-status reptile species	Community Development Department/ Planning Division	Submit plan and complete surveys 60 days prior to grading or any other ground disturbing activities	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	<p>4.20-3 (continued)</p> <p>The plan shall include the specific survey and relocation efforts that would occur for construction activities during the activity period of the special-status species (generally March to November) and for periods when the species may be present in the work area but difficult to detect due to weather conditions (generally December through February). Thirty days prior to construction activities in coastal scrub, chaparral, oak woodland, riparian habitats, or other areas supporting these species, qualified biologists shall conduct surveys to capture and relocate individual coast horned lizard, silvery legless lizard, and other special-status reptile species in order to avoid or minimize impacts to such species. The plan shall require a minimum of two (2) surveys conducted during the time of year/day when each species is most likely to be observed. Individuals shall be relocated to nearby undisturbed areas with suitable habitat. If construction is scheduled to occur during the low activity period (generally December through February), the surveys shall be conducted prior to this period if possible. The qualified biologist will be present during ground-disturbing activities immediately adjacent to or within habitat that supports populations of these species. Clearance surveys for special-status reptiles shall be conducted by a qualified biologist prior to the initiation of construction each day.</p> <p>Results of the surveys and relocation efforts shall be provided to City in an annual mitigation status report.</p>				

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	<p>4.20-4 Within 30 days of ground-disturbing activities associated with construction or grading that would occur during the nesting/breeding season of native bird species potentially nesting on site (typically March through August in the project region, or as determined by a qualified biologist), the applicant shall have surveys conducted by a qualified biologist to determine if active nests of bird species protected by the Migratory Bird Treaty Act and/or the California Fish and Game Code are present in the disturbance zone or within 300 feet of the disturbance zone. Pre-construction surveys shall include nighttime surveys to identify active rookery sites. The total number of surveys shall be determined by the on-site qualified biologist based on the construction/grading schedule.</p> <p>If active nests are found, clearing and construction within 300 feet of the nest shall be postponed or halted, at the discretion of the biologist in consultation with CDFG, until the nest is vacated and juveniles have fledged, as determined by the biologist, and there is no evidence of a second attempt at nesting. Limits of construction to avoid an active nest shall be established in the field with flagging, fencing, or other appropriate barriers and construction personnel shall be instructed on the sensitivity of nest areas. The biologist shall serve as a construction monitor during those periods when construction activities will occur near active nest areas to ensure that no inadvertent impacts to these nests occur. Results of the surveys shall be provided to CDFG in an annual mitigation status report.</p>	<p>Qualified biologist to conduct pre-construction surveys</p> <p>Comply with construction restrictions described if rookeries are identified</p> <p>Conduct on-site monitoring</p>	<p>Community Development Department</p> <p>CDFG</p>	<p>Within 30 days of ground-disturbing activities during nesting/breeding season of native bird species</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Santa Clara River Corridor Analysis (continued)					
	<p>4.20-5 Thirty days prior to construction activities in grassland, scrub, oak woodland, riverbank, or other suitable habitat, a qualified biologist shall conduct a survey within the proposed construction disturbance zone and within 200 feet of the disturbance zone for San Diego black-tailed jackrabbit and other special-status mammals.</p> <p>If San Diego black-tailed jackrabbits or other special-status species are present, non-breeding mammals shall be flushed from areas to be disturbed. Occupied dens, depressions, nests, or burrows shall be flagged and ground-disturbing activities avoided within a minimum of 200 feet during the pup-rearing season (February 15 through July 1). This buffer may be reduced based on the location of the den upon consultation with the City and CDFG. Occupied maternity dens, depressions, nests, or burrows shall be flagged for avoidance, and a biological monitor shall be present during construction. If unattended young are discovered, they shall be relocated to suitable habitat by a qualified biologist. The applicant shall document all San Diego black-tailed jackrabbit identified, avoided, or moved and provide a written report to the City with a copy to CDFG.</p>	<p>Qualified biologist to conduct pre-construction surveys</p> <p>Conduct on-site monitoring</p>	<p>Community Development Department</p> <p>CDFG</p>	<p>Within 30 days of construction activities in grassland, scrub, oak woodland, riverbank, or other suitable habitat for San Diego black-tailed jackrabbit and other special-status mammals.</p>	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Wastewater Disposal					
	4.21-1 Upon completion of the WRP, the applicant shall dedicate the WRP property to the City of Santa Clarita.	Dedicate property to City	Public Works Department/ Development Services Division	Prior to the issuance of Building Permits	
	4.21-2 A 395,411 gallon per day water reclamation plant shall be constructed on the Vista Canyon Specific Plan site, pursuant to local, regional, state and federal design standards (as applicable), to serve the Vista Canyon Specific Plan. The project applicant shall assign the responsibility for ownership, operation, and maintenance of the water reclamation plant to the City of Santa Clarita.	Construct water reclamation plant and assign ownership to City	Public Works Department/ Development Services Division	Prior to the issuance of Occupancy Permits	
	4.21-3 All facilities of the sanitary sewer system, including the siphon, will be designed and constructed for maintenance by the City of Santa Clarita in accordance with the applicable manuals, criteria, and requirements.	Design and construct sanitary system	Public Works Department/ Development Services Division	Prior to the issuance of Building Permits	
	4.21-4 The project applicant shall require construction contractors to provide portable, on-site sanitation facilities that will be serviced by approved disposal facilities and/or treatment plants.	On-site inspections	Public Works Department/ Development Services Division	During grading and construction	
	4.21-5 Prior to issuance of building permits, the project applicant shall obtain a "will-serve" letter from the County Sanitation Districts of Los Angeles County verifying that treatment capacity is adequate.	Review will-serve letter from County Sanitation Districts of Los Angeles County	Public Works Department/ Development Services Division	Prior to issuance of first Building Permit of each construction phase	
	4.21-6 All local wastewater lines within the project boundaries are to be constructed by the project applicant and dedicated to the City of Santa Clarita Transportation and Engineering Services Department.	Review final map to ensure that appropriate notations have dedicated local wastewater lines	Public Works Department/ Development Services Division	Prior to building permit for each phase	

Environmental Issue	Mitigation Measure	Method of Review Verification	Responsible Agency	Timing	Status of Implementation
Wastewater Disposal (continued)					
	4.21-7 Prior to issuance of building permits, the project applicant shall pay applicable wastewater connection fees.	Collect/verify payment of fees to Sanitation District	Public Works Department/ Development Services Division Department	Prior to issuance of building permits	
	4.21-8 Prior to issuance of the first occupancy and the use or installation of any recycled water infrastructure, plans must be submitted to the State of California Department of Public Health and to the County Department of Public Health-Environmental Health Division for review and approval.	Submit recycled water plans	State of California Department of Public Health and County Department of Public Health- Environmental Health Division	Prior to issuance of first occupancy	