

## **Appendix H**

---

### *Mitigation Monitoring and Reporting Program*



# Mitigation Monitoring and Reporting Program

## Crestridge Senior Housing Project EIR

*Prepared for:*

**City of Ranchos Palos Verdes**  
30940 Hawthorne Boulevard  
Rancho Palos Verdes, California 90275  
Contact: Eduardo Schonborn, AICP  
(310) 544-5228

*Prepared with the assistance of:*

**Rincon Consultants, Inc.**  
180 North Ashwood Avenue  
Ventura, California 93003

**October 2012**

## **MITIGATION MONITORING AND REPORTING PROGRAM**

CEQA requires that a reporting or monitoring program be adopted for the conditions of project approval that are necessary to mitigate or avoid significant effects on the environment (Public Resources Code 21081.6). The mitigation monitoring and reporting program is designed to ensure compliance with adopted mitigation measures during project implementation. For each mitigation measure recommended in the EIR, specifications are made herein that identify the action required and the monitoring that must occur. In addition, a responsible agency is identified for verifying compliance with individual conditions of approval contained in the Mitigation Monitoring and Reporting Program (MMRP).

To implement this MMRP, the City of Rancho Palos Verdes will designate a Project Mitigation Monitoring and Reporting Coordinator (“Coordinator”). The coordinator will be responsible for ensuring that the mitigation measures incorporated into the project are complied with during project implementation. The coordinator will also distribute copies of the MMRP to those responsible agencies identified in the MMRP, which have partial or full responsibility for implementing certain measures. Failure of a responsible agency to implement a mitigation measure will not in any way prevent the lead agency from implementing the proposed project.

The following table will be used as the coordinator’s checklist to determine compliance with required mitigation measures.



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<b>AESTHETICS</b>						
<p><b>AES-1 Landscape Maintenance.</b> Prior to issuance of building permits, the applicant shall prepare and submit for City review and approval a landscape maintenance plan for the project site. The plan shall demonstrate that:</p> <p>The plan shall demonstrate that:</p> <ul style="list-style-type: none"> <li>• The mature heights of all landscaping/foliage at the project site would not exceed the roof ridgeline of the adjacent or closest structure;</li> <li>• Foliage/Trees selected shall be of a species that can be maintained at such heights;</li> <li>• Landscaping at the site shall be maintained on an on-going basis to ensure that foliage does not exceed the roof ridgeline of the closest structure; and</li> <li>• Landscape planting and maintenance requirements shall be maintained for the life of the project.</li> </ul>	Once prior to issuance of building permits, once prior to occupancy clearance	Community Development Department – Planning and Zoning Division	Review landscape plan for compliance with the measure, and ensure implementation in the field			
<b>AIR QUALITY</b>						
<p><b>AQ-1(a) Construction Equipment Controls.</b> The following shall be implemented during construction to minimize emissions of NOx associated with diesel-fuelled construction equipment.</p> <ol style="list-style-type: none"> <li>1. All diesel construction equipment shall meet Interim Tier 4 EPA emission standards.</li> <li>2. Construction contractors shall minimize equipment idling time throughout construction. Engines shall be turned off if idling would be for more than five minutes.</li> <li>3. Equipment engines shall be maintained in good condition and in proper tune as per manufacturers' specifications.</li> <li>4. The number of pieces of equipment operating simultaneously shall be minimized.</li> <li>5. Construction contractors shall use alternatively fueled construction equipment (such as compressed natural gas, liquefied natural gas, or electric), when feasible.</li> <li>6. The engine size of construction equipment shall be</li> </ol>	Periodically during grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verification of implementation in the field during grading and construction			

Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p>the minimum practical size.</p> <p>7. Heavy-duty diesel-powered construction equipment manufactured after 1996 (with federally mandated clean diesel engines) shall be utilized wherever feasible.</p> <p>8. During the smog season (May through October), the construction period should be lengthened so as to minimize the number of vehicles and equipment operating at the same time.</p>						
<p><b>AQ-1(b) Fugitive Dust Control Measures.</b> The following shall be implemented during construction to minimize fugitive dust emissions:</p> <p>1. All exposed, disturbed, and graded areas onsite shall be watered three times (3x) daily until completion of project construction to minimize the entrainment of exposed soil.</p> <p>2. Pre-grading/excavation activities shall include watering the area to be graded or excavated before commencement of grading or excavating activities. Application of water (preferably reclaimed, if available) should penetrate sufficiently to minimize fugitive dust during grading activities.</p> <p>3. Fugitive dust produced during grading, excavation, and construction activities shall be controlled by the following activities:</p> <ul style="list-style-type: none"> <li>• Trucks transporting material on and off the site must be tarped from the point of origin or must maintain at least one foot of freeboard.</li> <li>• All graded and excavated material, exposed soil areas, and active portions of the construction site, including unpaved on-site roadways, shall be treated to prevent fugitive dust. Treatment shall include, but not necessarily be limited to, periodic watering, application of environmentally-safe soil stabilization materials, and/or roll-compaction as appropriate. Watering shall be done as often as necessary and reclaimed water shall be used whenever</li> </ul>	Periodically during grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verification of implementation in the field during grading and construction			



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p>possible.</p> <p>4. Ground cover must be replaced in disturbed areas as quickly as possible.</p> <p>5. During periods of high winds (i.e., wind speed sufficient to cause fugitive dust to affect adjacent properties), all clearing, grading, earth moving, and excavation operations shall be curtailed to the degree necessary to prevent fugitive dust from being an annoyance or hazard, either off-site or on-site.</p> <p>6. The contractor must provide adequate loading/unloading areas that limit track-out onto adjacent roadways through the utilization of wheel washing, rumble plates, or another method achieving the same intent.</p> <p>7. Adjacent streets and roads shall be swept at least once per day, preferably at the end of the day, if visible soil material is carried over to adjacent streets and roads.</p> <p>8. Personnel involved in grading operations, including contractors and subcontractors, shall wear respiratory protection in accordance with California Division of Occupational Safety and Health regulations.</p> <p>9. All residential units located within 500 feet of the construction site must be sent a notice regarding the construction schedule of the proposed project. A sign legible at a distance of 50 feet must also be posted in a prominent and visible location at the construction site, and must be maintained throughout the construction process. All notices and the signs must indicate the dates and duration of construction activities, as well as provide a telephone number where residents can inquire about the construction process and register complaints.</p> <p>10. Visible dust beyond the property line emanating from the project must be prevented to the maximum</p>						



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p>extent feasible.</p> <p>11. Signs shall be posted on-site limiting construction traffic to 15 miles per hour or less.</p> <p>12. Dust control requirements shall be shown on all grading plans.</p> <p>13. These control techniques must be indicated in project specifications. Compliance with the measure shall be subject to periodic site inspections by the City.</p>						
<b>BIOLOGICAL RESOURCES</b>						
<p><b>BIO-3 Nesting Bird Surveys and Avoidance.</b> Site disturbance shall be prohibited during the general avian nesting season (February 1 – August 30), if feasible. If breeding season avoidance is not feasible, a qualified biologist shall conduct a preconstruction nesting bird survey to determine the presence/absence, location, and status of any active nests on or adjacent to the project site. The surveys shall be conducted by a qualified biologist approved by the Community Development Department. The extent of the survey buffer area surrounding the site shall be established by the qualified biologist to ensure that direct and indirect effects to nesting birds are avoided. To avoid the destruction of active nests and to protect the reproductive success of birds protected by MBTA and the Fish and Game Code of California, nesting bird surveys shall be performed twice per week during the three weeks prior to the scheduled vegetation clearance. In the event that active nests are discovered, a suitable buffer (e.g. 30-50 feet for passerines) should be established around such active nests and no construction within the buffer allowed until a qualified biologist has determined that the nest is no longer active (e.g. the nestlings have fledged and are no longer reliant on the nest). No ground disturbing activities shall occur within this buffer until the City-approved biologist has confirmed that breeding/nesting is completed and the young have fledged the nest. Nesting birds surveys are not required for construction activities occurring between August 16 and February 1.</p>	<p>Once prior to initiating grading or construction; if work planned during nesting season, periodically during grading and construction</p>	<p>Community Development Department – Planning and Zoning Division</p>	<p>Verification of completed surveys, if applicable; verification that prescribed measures taken if species observed</p>			



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p><b>BIO-4(a) Construction Best Management Practices.</b> The following measures shall be employed as part of construction monitoring for the site:</p> <ul style="list-style-type: none"> <li>Contractors shall be educated regarding the off-site Reserve and the need to keep equipment and personnel within the project site prior to the initiation of construction.</li> <li>Temporary construction fencing shall be placed at the planned limits of disturbance adjacent to the Reserve.</li> </ul>	Once prior to initiating grading or construction, periodically during grading and construction	Onsite construction manager, Community Development Department	Verification in the field that education takes place and fencing erected and maintained			
<p><b>BIO-4(b) Provisions for Invasive Species and Native Habitat Elements in the Landscaping Plan.</b> No species listed in the Cal-IPC Invasive Plant Inventory (2006) or identified as potentially invasive ornamental species in the Rancho Palos Verdes NCCP Subarea Plan (2004) will be utilized in the landscaping plan for the site. Species listed in the Subarea Plan include everblooming acacia (<i>Acacia longifolia</i>), Sydney golden wattle (<i>Acacia cyclops</i>), Peruvian pepper tree (<i>Schinus molle</i>), Brazilian pepper tree (<i>Schinus terebenthifolia</i>), black locust (<i>Robinia pseudo-acacia</i>), myoporum (<i>Myoporum laetum</i>), gum tree (<i>Eucalyptus spp.</i>), and pines (<i>Pinus spp.</i>). In addition, to the extent feasible the proposed project shall incorporate native habitat elements into the landscaping plan for the 1.67-acre passive park with trails, scenic overlooks, and community gardens in the northern portion of the Crestridge Senior Housing development project. Native habitat elements include using locally sourced native shrubs such as toyon, California sagebrush, coastal bluff buckwheat, native grasses, and native perennial forbs as part of the planting palette.</p>	Once prior to issuance of grading or building permits, once prior to occupancy clearance	Community Development Department – Planning and Zoning Division	Review landscape plan for compliance with the measure, and ensure implementation in the field			
<p><b>BIO-4(c) Construction Staging and Stockpiling Areas.</b> Grading and building plans submitted for the proposed project for City review and approval shall identify areas for construction staging, fueling and stockpiling. These areas shall be located as far as practical from the Vista del Norte Preserve, and not closer than 70 feet from the Preserve boundary.</p>	Once prior to issuance of grading or building permits, periodically during grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Review plans for proper staging, fueling and stockpiling locations, verify compliance in field			



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<b>CULTURAL RESOURCES</b>						
<p><b>CR-1 Discovery Procedure.</b> If cultural resources are encountered during construction, the construction manager shall ensure that all ground disturbance activities are stopped, and shall notify the City Building and Safety Department immediately to arrange for a qualified archaeologist to assess the nature, extent, and potential significance of any cultural resources. If such resources are determined to be significant, appropriate actions to mitigate impacts to the resources must be identified in consultation with a qualified archaeologist. Depending upon the nature of the find, such mitigation may include avoidance, documentation, or other appropriate actions to be determined by a qualified archaeologist. The archeologist shall complete a report of excavations and findings, and shall the report to the South Central Coastal Information Center. After the find is appropriately mitigated, work in the area may resume.</p>	Ongoing during site preparation and grading	Onsite construction manager, Community Development Department – Planning and Zoning Division	If potential cultural resources are encountered, verify that work is stopped and found materials are properly assessed and addressed			
<p><b>CR-2 Paleontological Monitoring.</b> Prior to the commencement of grading, the applicant shall retain a qualified paleontologist approved by the City to monitor grading and excavation. Monitoring onsite shall occur whenever grading activities are occurring. Additional monitors in addition to one full-time monitor may be required to provide adequate coverage if earth-moving activities are occurring simultaneously. Any cultural resources discovered by construction personnel or subcontractors shall be reported immediately to the paleontologist. In the event undetected buried resources are encountered during grading and excavation, work shall be halted or diverted from the area and the paleontologist shall evaluate the resource and propose appropriate mitigation measures. Measures may include testing, data recovery, reburial, archival review and/or transfer to the appropriate museum or educational institution.</p> <p>All testing, data recovery, reburial, archival review or transfer to to research institutions related to monitoring discoveries shall be determined by the qualified paleontologist and shall be reported to the City.</p>	Ongoing during site preparation and grading	Onsite construction manager, Community Development Department – Building and Safety and Planning and Zoning Divisions	Verify that qualified paleontologist is retained and on site during grading, and that all measures are taken if resources discovered			



Mitigation Measure/Condition of Approval	Monitoring Milestone/ Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<b>GEOLOGY AND SOILS</b>						
<b>GEO-2(a)</b> Compliance with the recommendations included in the previous geotechnical studies undertaken at the site shall be required. These recommendations include maintenance of a uniform, near optimum moisture content in the slope soils, and avoidance of over-drying or excess irrigation, which will reduce the potential for softening and strength loss. In addition, slope maintenance shall include the immediate planting of the slope with approved, deep rooted, lightweight, drought resistant vegetation, as well as proper care of erosion and drainage control devices, and a continuous rodent control program. Brow ditches and terraces shall be cleaned each fall, before the rainy season, and shall be frequently inspected and cleaned, as necessary, after each rainstorm. Access to the slopes, including foot traffic outside of designated pedestrian footpaths, should be minimized to avoid local disturbance to surficial soils. The City of Ranch Palos Verdes Public Works Department shall review and approve all final plans for slope maintenance prior to issuance of a grading permit.	Once prior to issuance of grading permits, ongoing during project grading and site preparation	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<b>GEO-2(b)</b> The proposed retaining wall at the top of the existing cut slope at the eastern boundary of the site shall be designed as a buried retaining wall to support the project and underlying adverse geologic structure. The system requires a design and depth of embedment that would safeguard onsite improvements in the event the offsite slope failed.	Once prior to issuance of grading permits, ongoing during project grading and site preparation	Onsite construction manager, Community Development Department – Building and Safety Division	Verify that plans comply with measure, and implementation during grading and construction			
<b>GEO-2(c)</b> An as-graded geotechnical report shall be prepared by the project geotechnical consultant following completion of grading. The report shall include the results of in-grading density tests, and a map clearly depicting buttress fill keyway locations and depths, removal area locations and depths, sub-drainage system locations and depths and geological conditions exposed during grading.	Once following completion of grading	Onsite construction manager, Community Development Department – Building and Safety Division	Review as-graded report			
<b>GEO-2(d)</b> The applicant shall install permanent inclinometer stations at the site to allow the northern slope to be monitored for possible movement following implementation of the project. The number and location of the inclinometer stations shall be determined by the	Once following completion of grading; every six months during the lifetime of the project	Onsite construction manager, Community Development	Verify implementation during grading and construction			

Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p>City Geologist. The applicant shall submit a record of inclinometer readings along with any recommendations from a geotechnical engineer to the City every six months during the lifetime of the project or until the City Geologist agrees that semi-annual readings are no longer necessary. In addition, readings and geotechnical recommendations shall be submitted to the City following a heavy rainfall event (&gt;2 times average monthly rainfall) or following a magnitude 5.0 or greater seismic event within 20 miles of the project site.</p> <p>If the geotechnical engineer determines that sufficient movement has taken place that warrants further corrective or preventative action, the project applicant shall be responsible for all expenses associated with the costs of implementing any remediation recommended by the geotechnical engineer to ensure that the slope remains stable. Further monitoring by inclinometers may be required, if recommended by the geotechnical engineer or required by the City.</p>	<p>or until the City Geologist agrees that semi-annual readings are no longer necessary</p>	<p>Department – Building and Safety Division</p>				
<p><b>GEO-3(a) Geotechnical Recommendations.</b> Prior to issuance of any Grading Permit or Building Permit, the project applicant shall comply with all recommendations contained within the Geology and Geotechnical Investigation prepared by Group Delta Consultants (2003) including:</p> <ul style="list-style-type: none"> <li>Following grading, the expansion potential of the exposed subgrade shall be tested. The design of foundations and slabs shall consider the high expansion potential. Following completion of grading and until slabs and footings are poured, the exposed soil and bedrock materials shall be periodically wetted to prevent them from drying out. Pre-saturation is also recommended.</li> </ul>	<p>Once prior to issuance of building or grading permits, once following completion of grading</p>	<p>Onsite construction manager, Community Development Department – Building and Safety Division</p>	<p>Verify implementation following grading and construction</p>			
<p><b>GEO-3(b) Expansive Soil Removal and/or Treatment.</b> Suitable measures to reduce impacts from expansive soils could include one or more of the following techniques, as determined by a qualified geotechnical engineer and approved by the City of Rancho Palos Verdes Public Works Department:</p> <ul style="list-style-type: none"> <li>Excavation of existing soils and importation of non-</li> </ul>	<p>Once prior to issuance of building or grading permits, periodically during grading</p>	<p>Onsite construction manager, Community Development Department – Building and Safety Division</p>	<p>Verify implementation during grading and construction</p>			

Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<p>expansive soils. All imported fill shall be tested and certified by a registered Geotechnical Engineer and certified for use as a suitable fill material; and</p> <ul style="list-style-type: none"> <li>On-site foundations shall be designed to accommodate certain amounts of differential expansion in accordance with Chapter 18, Division III of the UBC.</li> </ul>						
<b>NOISE</b>						
<p><b>N-1(a) Noise Mitigation and Monitoring Program.</b>                      The applicant shall provide, to the satisfaction of the Community Development Director, a Noise Mitigation and Monitoring Program that requires all of the following:</p> <ul style="list-style-type: none"> <li>Construction contracts that specify that all construction equipment, fixed or mobile, shall be equipped with properly operating and maintained mufflers and other state required noise attenuation devices.</li> <li>That property owners and occupants located within 0.25 miles of the project site shall be sent a notice, at least 15 days prior to commencement of construction of each phase, regarding the construction schedule of the project. All notices shall be reviewed and approved by the Community Development Director prior to the mailing or posting and shall indicate the dates and duration of construction activities, as well as provide a contact name and telephone number where residents can inquire about the construction process and register complaints.</li> <li>That prior to issuance of any Grading or Building Permit, the Applicant shall demonstrate to the satisfaction of the City's Building Official how construction noise reduction methods such as shutting off idling equipment and vehicles, installing temporary acoustic barriers around stationary construction noise sources, maximizing the distance between construction equipment staging and parking areas and occupied residential areas, and electric air compressors and similar power tools, rather than diesel equipment, shall be used where feasible.</li> </ul>	Once prior to issuance of grading and building permits; ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Review and approve plan, verify implementation during grading and construction			



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
<ul style="list-style-type: none"> <li>That during construction, stationary construction equipment shall be placed such that emitted noise is directed away from sensitive noise receivers.</li> </ul>						
<p><b>N-1(b) Construction Vehicle Idling.</b> During demolition, construction and/or grading operations, trucks shall not park, queue and/or idle at the project site or in the adjoining public rights-of-way before 7:00 am, Monday through Saturday, in accordance with the permitted hours of construction.</p>	Ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<p><b>N-1(c) Staging Area.</b> The construction contractor shall provide staging areas onsite to minimize off-site transportation of heavy construction equipment. These areas shall be located to maximize the distance between activity and sensitive receptors (neighboring residences and institutional uses). This would reduce noise levels associated with most types of idling construction equipment.</p>	Once prior to grading and construction; ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<p><b>N 1(d) Diesel Equipment Mufflers.</b> All diesel equipment shall be operated with closed engine doors and shall be equipped with factory recommended mufflers.</p>	Ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<p><b>N 1(e) Electrically-Powered Tools and Facilities.</b> Electrical power shall be used to run air compressors and similar power tools and to power any temporary structures, such as construction trailers or caretaker facilities.</p>	Ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<p><b>N-1(f) Restrictions on Excavation and Foundation/Conditioning.</b> Excavation, foundation-laying, and conditioning activities shall be restricted to between the hours of 10:00 AM and 3:00 PM, Monday through Friday and located to maximize the distance between activity and sensitive receptors (neighboring</p>	Ongoing during project grading and construction	Onsite construction manager, Community Development Department –	Verify implementation during grading and construction			



Mitigation Measure/Condition of Approval	Monitoring Milestone/Frequency	Responsible Agency or Party	Action Indicating Compliance	Compliance Verification		
				Initials	Date	Comments
residences and institutional uses).		Building and Safety Division				
<b>N-1(g) Additional Noise Attenuation Techniques.</b> For all noise-generating construction activity on the project site, additional noise attenuation techniques shall be employed to reduce noise levels to the maximum extent feasible. Such techniques may include, but are not limited to, the use of sound blankets on noise generating equipment and the construction of temporary sound barriers between construction sites and nearby sensitive receptors.	Ongoing during project grading and construction	Onsite construction manager, Community Development Department – Building and Safety Division	Verify implementation during grading and construction			
<b>TRAFFIC AND CIRCULATION</b>						
<b>T-4 Site Access.</b> Install a stop sign and stop bar at the proposed project driveway on Crestridge Road. This feature shall be shown on all project plans submitted for building permit review.	Once prior to issuance of building permits, once prior to occupancy	Onsite construction manager, Community Development Department – Building and Safety Division	Review plans for compliance with the measure, and verify implementation in the field			
<b>T-5 Maintain Sight Distance.</b> Final project plans shall show that landscaping and/or hardscape at or near the proposed project driveway is designed such that a driver's clear line of sight is not obstructed. In addition, curbside parking shall be prohibited along the property frontage within the identified sight visibility lines shown on Figure 4.8-5 of the EIR.	Once prior to issuance of building permits, once prior to occupancy	Onsite construction manager, Community Development Department – Building and Safety Division	Review plans for compliance with the measure, and verify implementation in the field			

