

Aerial Source: USGS High Resolution Orthoimagery: <http://viewer.nationalmap.gov/basic>. Data Source: NRCS Soils: <http://websoilsurvey.sc.egov.usda.gov/App/WebSoilSurvey.aspx>.

3.0 DELINEATION RESULTS

3.1 Local Watershed

The survey area is located in the Medea Creek watershed (HUC 180701040102) within the larger Santa Monica Bay watershed (HUC 18070104). The un-named drainage conveys waters from upland residential areas and traverses through the property from north to south, en route to a culvert under US-101 to Medea Creek, and the Pacific Ocean.

3.2 Local Soil Types

The survey area is characterized by two (2) soil type that primarily consist of loams and sandy/silt loams (Figure 5). A brief description of the soil type is given below:

- URBAN LAND-CROPLEY, FILL COMPLEX 0 TO 8 PERCENT SLOPES, COMMERCIAL (437) - The Cropley series consists of very deep, moderately well and well drained soils that formed in alluvium from mixed rock sources. Cropley soils are on alluvial fans, floodplains and in small basins. Slopes range from 0 to 15 percent. This soil association does not meet hydric criteria.
- URBAN LAND-SAPWI, LANDSCAPED-KAWENGA, LANDSCAPED COMPLEX, 0 TO 20 PERCENT SLOPES, RESIDENTIAL (452) - The Kawenga and Sapwi series consists of moderately deep to bedrock, well drained soils that formed in residuum and colluvium derived from sandstone. Sapwi soils are on hills and mountains. Slopes are 15 to 75 percent. This soil association does not meet hydric criteria.

3.3 Vegetation Communities

Habitats for plants and animals consist primarily of riparian woodland in the northern portion supplanted by annual and herbaceous cover in the remaining areas where it has been mechanically disced, or planted with landscape ornamentals and trees along the western property boundary.

The vegetative cover in the riparian area is virtually complete. This vegetation community is classified as valley oak woodland, which occurs valley bottoms seasonally saturated soils that may intermittently flooded, lower slopes, summit valleys. The drainage enters near the northwestern corner of the site where a terrace drain feeds surface water directly to the head of the drainage. Historically, the drainage may have continued further north, upstream, into the hills that are now developed as a residential subdivision and a system of terrace drains. The status of the flow regime of the original stream is unknown. Wetlands were identified within the riparian woodland in 2005 and were presumed to be fed by water associated with irrigation from private residences north of the project site that had percolated into the ground and either created, or augmented sub-surface water flows, emanating as a spring at the base of the fill slope. There, it flowed onto the surface under the riparian tree canopy, and saturates. Currently, there is no surface or subsurface flow of water within the riparian canopy and no wetlands were identified. The prolonged drought and related irrigation restrictions likely reduced the available water sources. Nevertheless, potential contributions from an unknown spring plus current irrigation practices continue to support a well-developed riparian community. Still, the lack of obligate wetland species and the emergence of coast live oak, European olive (*Olea europaea*), and Peruvian peppertree (*Schinus molle*) compared to species observed in 2005 suggest a transition to drier conditions.

The drainage continues south, downstream from the oak-willow woodland and contains a large patch of Baltic rush (*Juncus balticus*) (FACW), bristly ox-tongue (*Helminthotheca echioides*) (FAC) and an emergent valley oak. This vegetation community is classified as Baltic rush marsh, which occurs in wet and mesic meadows; along stream banks, rivers, lakes, ponds, fens, and sloughs; and freshwater, brackish, and alkaline marshes where soils are poorly drained, often with a thick, organic layer.

The remaining portion of the drainage continues south (downstream) from the Baltic rush marsh community and transitions into a native and non-native annual grasses and forbs vegetation community. Dominant species observed were various annual, non-native herbaceous plants such as bristly-ox tongue, Italian thistle (*Carduus pycnocephalus*), slender wild oats (*Avena barbata*) and Mediterranean mustard (*Hirschfeldia incana*). Few hydrophytic plants were observed, but not in numbers sufficient to meet the hydrophytic dominance criterion for wetland determination.

Two (2) small wetted areas were observed within the study area just north of the culvert and adjacent to a culvert outfall from the adjacent Center Court Medical Plaza. These areas supported hydrophytic species including southern cattail (*Typha domingensis*) (OBL) and a non-native dock (*Rumex* sp.) (OBL). The presence of these species appears to be directly attributable to irrigation and landscape practices from the adjacent development.

Table 1, Dominant Plant Species Including Wetland Indicator Status at All Plot Locations, lists the plant species that were determined to be dominant at the test plots, and gives their Wetland Indicator Status (Lichvar 2016).

Table 1
Dominant Plant Species Including Wetland Indicator Status at All Plot Locations

<i>Scientific Name</i>	Common Name	Indicator Status*
<i>Avena barbata</i>	slender oat	none
<i>Helminthotheca echioides</i>	bristly-ox tongue	FAC
<i>Juncus balticus</i>	Baltic rush	FACW
<i>Malvella leprosa</i>	alkali mallow	FACU
<i>Quercus agrifolia</i>	coast live oak	none
<i>Quercus lobata</i>	valley oak	FACU
<i>Salix lasiolepis</i>	arroyo willow	FACW
<i>Typha domingensis</i>	southern cattail	OBL
<i>Vitis vinifera</i>	wine grape	none

Codes:

OBL = Obligate Wetland – Occur almost always (estimated probability >99%) under natural conditions in wetlands.

FACW = Facultative Wetland – Usually occur in wetlands (estimated probability 67%-99%), but occasionally found in non-wetlands.

FAC = Facultative – Equally likely to occur in wetlands or non-wetlands (estimated probability 34%-66%).

FACU = Facultative Upland – Usually occur in non-wetlands (estimated probability 67%-99%), but occasionally found in wetlands (estimated probability 1%-33%).

UPL = Obligate Upland – Occur in wetlands in another region, but occur almost always (estimated probability >99%) under natural conditions in non-wetlands in the region specified. If a species does not occur in wetlands in any region, it is not on the National List.

* None = Plant species not listed are considered UPL for wetland delineation purposes (Lichvar 2016).

3.4 Wildlife

Wildlife species observed during the survey of the site by Envicom in 2016 were species common or relatively common to the region. In general, species observed constitute a sample of the non-special-status wildlife species that can be expected to utilize habitats at the site for cover, foraging, and reproduction. Several species (e.g., reptiles, birds, small mammals) undoubtedly reproduce at the site, and a wide range of larger or mobile species can be expected to utilize the site's resources routinely, such as foraging raptors, and medium to large-sized mammals, such as for example striped skunk, coyote, and mule deer. Bird species observed consisted primarily of year-round and summer residents, and potential migrants. Several bird species likely nest at the site in any given year.

3.5 Jurisdictional Waters/Habitat

The ephemeral drainage would be regulated as a federal and state jurisdictional feature (**Table 2, Potential Jurisdictional Feature in Survey Area** and **Figure 8**). The drainage (DR1) appears to be hydrologically connected to the Pacific Ocean, which is navigable water. Therefore, the drainage is subject to both federal and state jurisdiction. Thus, all features observed were recorded per both ACOE and CDFW guidance. Within the survey area, data for five (5) soil test points were collected using ACOE methodology described above to delineate wetlands. One (1) area within the drainage met all three (3) ACOE wetland parameters (hydrophytic vegetation, hydric soils, and hydrology) to be classified as a wetland. Based on the results of the test plots, the remainder of the drainage does not meet wetland criteria and is classified as non-wetland waters, a significant departure from the previous 2005 report.

The drainage is incised in the northern portion of the site and conveys water from upland areas to the south and off-site via a culvert under Canwood Street. Here, the drainage has a discernible bed and OHWM indicators. Upland environs were determined based on the limits of upland indicators including breaks in the bank, drainage pattern, woody debris, and the development of soil. Riparian habitat associated with drainage includes the contiguous tree canopy, which is dependent on the perennial spring and irrigation flow. As the drainage trends to the south, including areas of mechanical discing, the channel flattens out and water is conveyed across the site through a loosely defined channel along the western margins of the property, bounded by fill from the adjacent site and landscape plantings. A box culvert from the adjacent development that drains into the project site had standing water and a well-established hydrophytic plant community. This water source drains into the main channel and provides a supplemental source that supports a wetland depression area just north of the culvert under Canwood Street.



Aerial Source: USGS High Resolution Orthoimagery: <http://viewer.nationalmap.gov/basic/>. Data Source: Delineation by Envicom Corporation, 2016.

Table 2
Potential Jurisdictional Feature in Survey Areas

Feature	Location (GPS Coordinates)*		Size**		
	Latitude	Longitude	ACOE Non-Wetland Waters/RWQCB (Acres/Linear Feet)	ACOE Wetland Waters/RWQCB (Acres/Linear Feet)	CDFW Riparian (Acres/Linear Feet)
DR1	34.148747	-118.766185	0.09/713	0.004/27	0.41/760
<p>* North American Datum 1983, California State Plane Zone V. GPS coordinates are given for the upstream point of the feature as accessed during field survey.</p> <p>** Linear feet calculations are based on the centerline of the feature within the extent of the surveyed areas. CDFW Riparian habitat based on aerial and field assessment. ACOE/RWQCB value based on field assessment. Values are approximate due to rounding.</p>					

4.0 IMPACTS AND MITIGATION

4.1 Impacts

Based on the information provided in the project's Application, we understand the project includes the construction of a senior living facility. A site plan prepared by Huitt-Zollars dated August 8, 2017 is provided as Appendix 1.

As described above, Envicom conducted a jurisdictional delineation within the survey area. One (1) feature was identified within the survey area and delineated in accordance with the ACOE Wetlands Delineation Manual and the Regional Supplement. The project limits of disturbance are based on the limits of disturbance overlaid on potential jurisdictional areas as illustrated in **Figure 9, Jurisdictional Delineation Impacts Map**. Temporary impacts associated with the construction process include a five-foot buffer from the edge of the planned retaining walls and hydraulic energy dissipators on the western edge of the development. The jurisdictional acreage within the drainage that would be impacted by the project is provided in **Table 3**.

Table 3
Impacts to ACOE and CDFW Jurisdictional Areas

	Wetland ACOE Waters of U.S. (Acres / Linear Feet)		Non-wetland ACOE Waters of U.S. (Acres / Linear Feet)		CDFW (Acres / Linear Feet)	
	Temporary	Permanent	Temporary	Permanent	Temporary	Permanent
DR1	0.002/87	0.001/44	0.002/87	0.004/174	0.013/566	0.034/1,481

The proposed project's impacts to potential jurisdictional areas would be subject to the review and approval of the Trustee Resource Agencies. Impacts to jurisdictional areas would be considered a significant impact. Implementation of Mitigation Measure (MM) BIO-1 would reduce potentially significant impacts to a less-than-significant level.



Source: Huitt-Zollars, Aug. 8, 2017.

4.2 Recommended Mitigation Measures

The following mitigation measures are recommended to reduce potentially significant impacts to a less than significant level:

BIO -1(a) Agency Consultation: The applicant shall (prior to issuance of grading permits) consult with CDFW, ACOE, and the RWQCB and obtain applicable permits for the proposed impacts to jurisdictional waters. A Clean Water Act Section 404 permit would be required from the ACOE for the discharge of fill to any of the ACOE-jurisdictional wetlands or non-wetland waters of the U.S. onsite. Additionally, a Section 401 water quality certification would be required from the RWQCB. These permits typically require mitigation to reduce impacts to water quality and quantity, vegetation, and wildlife. The project applicant shall demonstrate to the City of Agoura Hills that the requirements of agencies with jurisdiction over waters and riparian habitat onsite can be met prior to obtaining grading permits. This will include, but not be limited to, consultation with those agencies, securing the appropriate permits, waivers or agreements, and arrangements with a local or regional mitigation bank including in lieu fees, as needed.

Although the ACOE and CDFW will require specific mitigation as part of their permitting processes, the following measures provide minimum mitigation requirements for impacts to the important water resources habitats under the City's jurisdiction.

BIO-1 (b) Replacement Ratio. Federal and State protected waters and riparian habitat shall be replaced at a minimum ratio of 2:1 of habitat, at the same or greater quality, for every 1.0-acre removed. Replacement shall be at an Agoura Hills Planning and Community Development Department approved location or by providing adequate funding for the replacement of suitable equivalent habitat to an organization currently conducting restoration of habitat. The organization and its activities are to be approved by an Agoura Hills Planning and Community Development Department approved biologist prior to issuance of grading permits.

BIO-1 (c) Habitat Mitigation and Monitoring Program. In the event that onsite mitigation is to be done instead of the use of in-lieu fees or offsite mitigation, the project applicant shall submit a Habitat Mitigation and Monitoring Program (HMMP) for review and approval by an Agoura Hills Planning and Community Development Department staff and, as necessary, a City approved biologist or qualified landscape specialist. The project shall implement the requirements of the final approved Habitat Mitigation and Monitoring Program, which shall mitigate for impacts to CDFW jurisdictional habitat and ACOE "non-wetland" Waters of the United States at a 2:1 ratio for permanent impacts and a 1:1 ratio for temporary impacts, or as otherwise approved by the Trustee Agencies.

The Habitat Mitigation and Monitoring Program shall mitigate for impacts to jurisdictional areas via an acceptable mitigation approach that involves one or a combination of the on-site or off-site restoration or enhancement of degraded in-kind habitats, preservation of in-kind habitats, or by a contribution to an in-lieu fee program approved by the City, ACOE, RWQCB, and the CDFW.

The final Habitat Mitigation and Monitoring Program shall be developed by a qualified biologist, restoration ecologist or resource specialist and submitted to and approved by the

City, ACOE, RWQCB, and CDFW, in compliance with Clean Water Act Sections 401 and 404 and California Fish and Game Code 1602 and supporting regulations, prior to issuance of a grading permit for the project. The Program shall be based on the ACOE Final Mitigation Guidelines and Monitoring Requirements (April 19, 2004) and the ACOE Los Angeles District's Recommended Outline for Draft and Final Compensatory Mitigation and Monitoring Plans. In broad terms, this Program shall at a minimum include:

- Description of the project/impact and mitigation sites;
- Specific objectives;
- Success criteria;
- Plant palette;
- Implementation plan;
- Maintenance activities;
- Monitoring plan; and
- Contingency measures.

Success criteria shall at a minimum be evaluated based on appropriate survival rates and percent cover of planted native species, as well as eradication and control of invasive species within the restoration area.

The target species and native plant palette, as well as the specific methods for evaluating whether the project has been successful at meeting the above-mentioned success criteria shall be determined by the qualified biologist, restoration ecologist, or resource specialist and included in the mitigation program.

The mitigation project shall be implemented over a five-year period and shall incorporate an iterative process of annual monitoring and evaluation of progress and allow for adjustments to the program, as necessary, to achieve desired outcomes and meet success criteria. Annual reports discussing the implementation, monitoring, and management of the mitigation project shall be submitted to the City, ACOE, RWQCB, and the CDFW. Five years after project start, a final report shall be submitted to the City, ACOE, RWQCB, and CDFW, which shall at a minimum discuss the implementation, monitoring and management of the mitigation project over the five-year period, and indicate whether the mitigation project has been successful based on established success criteria. The annual reports and the final report shall include as-built plans submitted as an appendix to the report. Restoration will be considered successful after the success criteria have been met for a period of at least 2 years without any maintenance or remediation activities other than invasive species control. The project shall be extended if success criteria have not been met at the end of the five-year period to the satisfaction of the City, ACOE, RWQCB, and the CDFW.

5.0 CONCLUSION

Based on the delineation, a total of approximately 0.094 acres (740 linear feet) are considered potential jurisdictional WOUS by the ACOE and WOS by the RWQCB and 0.41 acres (760 linear feet) are potential CDFW jurisdiction. Activities that affect the delineated features within the survey area would potentially be subject to requirements under Section 404 and 401 of the CWA and California Fish and Game Code section 1600 *et seq.*

6.0 REFERENCES

- Baker, R. J., L. C. Bradley, R. D. Bradley, J. W. Drago, M. D. Engstrom, R. S. Hoffman, C. A. Jones, F. Reid, D. W. Rice, and C. Jones. 2003. Revised checklist of North American mammals north of Mexico, 2003. Museum of Texas Tech University Occasional Papers 229:1-23.
- Brady, Roland H. III, Kris Vyverberg. 2013. Methods to Describe and Delineate Episodic Stream Processes on Arid Landscapes for Permitting Utility-Scale Solar Power Plants. California Energy Commission. Publication Number: CEC-500-2014-013.
- California Department of Fish and Game (CDFG). 2010. Vegetation Classification and Mapping Program, List of Vegetation Alliances and Associations. September 2010. http://www.dfg.ca.gov/biogeodata/vegcamp/natural_comm_list.asp
- Groundwater Information Center. 2016. Interactive Map Application. Available at: <https://gis.water.ca.gov/app/gicima/>. Accessed on May 10, 2016.
- Envicom Corporation 2005. CDFG/ACOE Jurisdictional Delineation and Biota Report for 29501 Canwood Street.
- Evens, J. and T. Keeler-Wolf. 2006 (January). Vegetation Classification of the Santa Monica Mountains National Recreation Area and Environs in Ventura and Los Angeles Counties, California. California Department of Fish and Game and California Native Plant Society.
- Garrett, K., Dunn, J., and Morse, B. 2006. Birds of the Los Angeles Region. R.W. Morse Company. Olympia, WA.
- Garrett, K. and J. Dunn. 1981. Birds of Southern California; Status and distribution. Los Angeles Audubon Society, Los Angeles, California.
- Google Earth Pro. 2013. Version 7.1.2.2041. Build Date 10/7/2013.
- Jennings, M.R., and M.P. Hayes. 1994. Amphibian and Reptile Species of Special Concern in California. Final Report to the California Department of Fish and Game, Inland Fisheries Division, Rancho Cordova, California.
- Lichvar, R.W., D.L. Banks, W.N. Kirchner, and N.C. Melvin. 2016. The National Wetland Plant List: 2016 wetland ratings. *Phytoneuron* 2016-30: 1-17. Published 28 April 2016. ISSN 2153 733X
- Microsoft. 2016. Bing Bird's Eye Map. 2010 – 2014. Variable Scale. Available at: <http://www.bing.com/maps/>. Accessed on October 17, 2016.
- Munsell Color. 2013. Munsell Soil-Color Charts. Division of X-Rite Incorporated. Grand Rapids, Michigan.
- Natural Resources Conservation Service (NRCS). 2016. Web Soil Survey. Soil Survey Staff, Natural Resources Conservation Service, United States Department of Agriculture. Web Soil Survey. Available online at <http://websoilsurvey.nrcs.usda.gov/>. Accessed October 17, 2016.

-
- Reid, Fiona. A Field Guide to Mammals of North America, 4th ed., Houghton Mifflin Company, New York, New York, 2006.
- Sawyer, J.O., T. Keeler-Wolf, and J. M. Evens, A Manual of California Vegetation, 2nd ed., California Native Plant Society Press, Sacramento, California, 2009.
- Shuford, W. D., and Gardali, T., editors. 2008. California Bird Species of Special Concern: A ranked assessment of species, subspecies, and distinct populations of birds of immediate conservation concern in California. Studies of Western Birds 1. Western Field Ornithologists, Camarillo, California, and California Department of Fish and Game, Sacramento.
- Sibley, D.A., 2003. The Sibley Field Guide to Birds of Western North America. A.A. Knopf, New York.
- Stebbins, Robert C. (Robert Cyril). A Field Guide to Western Reptiles and Amphibians, 3rd ed., Houghton Mifflin Company, New York, New York, 2003.
- U.S. Army Corps of Engineers (ACOE). 1987. Corps of Engineers Wetlands Delineation Manual. Technical Report Y-87-1. ACOE, U.S. Army Engineer Waterways Experiment Station, Vicksburg, MS.
- _____. 2008a. Regional Supplement to the Corps of Engineers Wetland Delineation Manual: Arid West Region (Version 2.0). ERDC/EL TR-08-28. Vicksburg, MS: U.S. Army Engineer Research and Development Center.
- _____. 2008b. A Field Guide to the Identification of the Ordinary High Water Mark (OHWM) in the Arid West Region of the Western United States: A Delineation Manual. R.W. Lichvar and S.M. McColley. ERDC/CRREL TR-08-12. Hanover, NH: U.S. Army Engineer Research and Development Center.
- _____. 2010. Updated Datasheet for the Identification of the Ordinary High Water Mark (OHWM) in the Arid West Region of the Western United States. July 2010.
- U.S. Climate Data. 2016. Climate for Los Angeles, CA. Available at: <http://www.usclimatedata.com/climate/los-angeles/california/united-states/usca1339>. Accessed on October 17, 2016.
- U.S. Department of Agriculture (USDA) Soil Conservation Service. 1993. Soil Survey Manual. Washington, D.C.
- U.S. Fish and Wildlife Service (USFWS). 2016. National Wetland Inventory (NWI). <http://www.fws.gov/wetlands/Data/Mapper.html>. Accessed October 17, 2016, 2016.
- Zeiner, D.C, W.F. Laudenslayer, Jr., K.E. Mayer, and M. White. 1988 (May). California's Wildlife. Vol. I Amphibians and Reptiles. California Statewide Wildlife Habitat Relationships System, California Department of Fish and Game, Sacramento, California.
-

- Zeiner, D.C, W.F. Laudenslayer, Jr., K.E. Mayer, and M. White. 1990a (April). California's Wildlife. Vol. III Mammals. California Statewide Wildlife Habitat Relationships System, California Department of Fish and Game, Sacramento, California.
- Zeiner, D.C, W.F. Laudenslayer, Jr., K.E. Mayer, and M. White. 1990b (November). California's Wildlife. Vol. II Birds. California Statewide Wildlife Habitat Relationships System, California Department of Fish and Game, Sacramento, California.

APPENDIX 1

Site Plan, Huitt-Zollars, August 8, 2017

TRACT NO 23760
M.R. 792 / 56-58

A

TRACT NO 062211
MB 1338-149-50

APN: 2053-001-005
POR LOT 54
RS 15-8/9
911.00 PAD
910.00 FF

POR LOT 53
RS 15-8/9

CANWOOD STREET

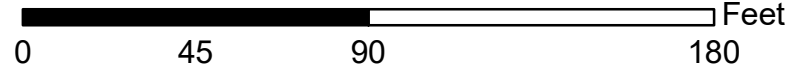
CANWOOD STREET

August 8th, 2017



Oakmont of Agoura Final Plan

1 inch = 50 feet



APPENDIX 2

Wetland Determination Data Forms

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: Oakmont Senior / CANWOOD City/County: AGORA HILLS Sampling Date: 10/31/16
 Applicant/Owner: OAKMONT SENIOR LIVING State: CA Sampling Point: FP2 TPI
 Investigator(s): T. BAKS Section, Township, Range: Los Virgenes Civil Land Grant
 Landform (hillslope, terrace, etc.): depression Local relief (concave, convex, none): concave Slope (%): 1-2
 Subregion (LRR): LARC Lat: 34.14885092 Long: -118.7660653 Datum: NAD83
 Soil Map Unit Name: Urban land-Saguai, landscaped-Kawonga, landscaped complex, 0-20% res. NWI classification: N/A
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Hydric Soil Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Remarks: <u>FP2 located in depression area south of TPI, under riparian canopy. Previous delineation (2005) found wetland at this location (with standing water and gleyed soils). Severe drought conditions.</u>	

VEGETATION - Use scientific names of plants. No longer a wetland.

Tree Stratum (Plot size: <u>20'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. <u>Averus gymbilis</u>	<u>60</u>	<u>Y</u>	<u>NL</u>	Number of Dominant Species That Are OBL, FACW, or FAC: <u>1</u> (A)
2. <u>Averus lobata</u>	<u>20</u>	<u>Y</u>	<u>FACU</u>	Total Number of Dominant Species Across All Strata: <u>5</u> (B)
3. <u>Sax. lasiopsis</u>	<u>20</u>	<u>Y</u>	<u>FACW</u>	Percent of Dominant Species That Are OBL, FACW, or FAC: <u>(1/5) 20%</u> (A/B)
4. _____				Prevalence Index worksheet:
Sapling/Shrub Stratum (Plot size: <u>10'</u>)				Total % Cover of: _____ Multiply by: _____
1. <u>Averus gymbilis</u>	<u>20</u>	<u>Y</u>	<u>NL</u>	OBL species _____ x 1 = _____
2. _____				FACW species <u>20</u> x 2 = <u>40</u>
3. _____				FAC species _____ x 3 = _____
4. _____				FACU species <u>20</u> x 4 = <u>80</u>
5. _____				UPL species <u>85</u> x 5 = <u>425</u>
Herb Stratum (Plot size: <u>5'</u>)				Column Totals: <u>125</u> (A) <u>585</u> (B)
1. _____				Prevalence Index = B/A = <u>4.36</u>
2. _____				Hydrophytic Vegetation Indicators:
3. _____				<input type="checkbox"/> Dominance Test is >50%
4. _____				<input type="checkbox"/> Prevalence Index is ≤3.0 ¹
5. _____				<input type="checkbox"/> Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet)
6. _____				<input checked="" type="checkbox"/> Problematic Hydrophytic Vegetation ¹ (Explain)
7. _____				¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.
8. _____				Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Woody Vine Stratum (Plot size: <u>5'</u>)				
1. <u>Vitis vinifera</u>	<u>5</u>	<u>Y</u>	<u>NL</u>	
2. _____				
% Bare Ground in Herb Stratum <u>0</u> % Cover of Biotic Crust _____				

Remarks:
ground covered 100% with leaf litter. The area is under extreme drought conditions. Previous delineation indicated larger percentage of FACW species occurring. Multiple photos taken. No hydric soils or hydrology

SOIL

Sampling Point: TP1

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-2-0	VEGETATION	DETRITUS	10 YR 3/2	5	C	PL	clay loam	leaf litter
0-6	10 YR 3/2	95	5 YR 3/4	5	C	PL	clay loam	roots
6-18	10 YR 3/2	100				M	clay loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

Indicators for Problematic Hydric Soils³:

- | | | |
|--|---|---|
| <input type="checkbox"/> Histosol (A1) | <input type="checkbox"/> Sandy Redox (S5) | <input type="checkbox"/> 1 cm Muck (A9) (LRR C) |
| <input type="checkbox"/> Histic Epipedon (A2) | <input type="checkbox"/> Stripped Matrix (S6) | <input type="checkbox"/> 2 cm Muck (A10) (LRR B) |
| <input type="checkbox"/> Black Histic (A3) | <input type="checkbox"/> Loamy Mucky Mineral (F1) | <input type="checkbox"/> Reduced Vertic (F18) |
| <input type="checkbox"/> Hydrogen Sulfide (A4) | <input type="checkbox"/> Loamy Gleyed Matrix (F2) | <input type="checkbox"/> Red Parent Material (TF2) |
| <input type="checkbox"/> Stratified Layers (A5) (LRR C) | <input type="checkbox"/> Depleted Matrix (F3) | <input type="checkbox"/> Other (Explain in Remarks) |
| <input type="checkbox"/> 1 cm Muck (A9) (LRR D) | <input type="checkbox"/> Redox Dark Surface (F6) | |
| <input type="checkbox"/> Depleted Below Dark Surface (A11) | <input type="checkbox"/> Depleted Dark Surface (F7) | |
| <input type="checkbox"/> Thick Dark Surface (A12) | <input type="checkbox"/> Redox Depressions (F8) | |
| <input type="checkbox"/> Sandy Mucky Mineral (S1) | <input type="checkbox"/> Vernal Pools (F9) | |
| <input type="checkbox"/> Sandy Gleyed Matrix (S4) | | |

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No

Remarks:

Evidence of previous saturation but no through redox in pore linings but no other indicators observed. Previously, saturated w/ gleyed matrix. Don't soil does not meet the minimum req's for stratified layers.

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)

Secondary Indicators (2 or more required)

- | | | |
|--|--|--|
| <input type="checkbox"/> Surface Water (A1) | <input type="checkbox"/> Salt Crust (B11) | <input type="checkbox"/> Water Marks (B1) (Riverine) |
| <input type="checkbox"/> High Water Table (A2) | <input type="checkbox"/> Biotic Crust (B12) | <input type="checkbox"/> Sediment Deposits (B2) (Riverine) |
| <input type="checkbox"/> Saturation (A3) | <input type="checkbox"/> Aquatic Invertebrates (B13) | <input type="checkbox"/> Drift Deposits (B3) (Riverine) |
| <input type="checkbox"/> Water Marks (B1) (Nonriverine) | <input type="checkbox"/> Hydrogen Sulfide Odor (C1) | <input checked="" type="checkbox"/> Drainage Patterns (B10) |
| <input type="checkbox"/> Sediment Deposits (B2) (Nonriverine) | <input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3) | <input type="checkbox"/> Dry-Season Water Table (C2) |
| <input type="checkbox"/> Drift Deposits (B3) (Nonriverine) | <input type="checkbox"/> Presence of Reduced Iron (C4) | <input type="checkbox"/> Crayfish Burrows (C8) |
| <input type="checkbox"/> Surface Soil Cracks (B6) | <input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6) | <input type="checkbox"/> Saturation Visible on Aerial Imagery (C9) |
| <input type="checkbox"/> Inundation Visible on Aerial Imagery (B7) | <input type="checkbox"/> Thin Muck Surface (C7) | <input type="checkbox"/> Shallow Aquitard (D3) |
| <input type="checkbox"/> Water-Stained Leaves (B9) | <input type="checkbox"/> Other (Explain in Remarks) | <input type="checkbox"/> FAC-Neutral Test (D5) |

Field Observations:

Surface Water Present? Yes _____ No Depth (inches): _____

Water Table Present? Yes _____ No Depth (inches): _____

Saturation Present? (includes capillary fringe) Yes _____ No Depth (inches): _____

Wetland Hydrology Present? Yes _____ No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Low depressed area that collects water but appears not to retain water as previously observed. Concentration in pore lining to start on not on living roots.

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: OAKMONT SENIOR / CHANWOOD City/County: AGORA HILLS Sampling Date: 10/31/10
 Applicant/Owner: OAKMONT SENIOR LIVING State: CA Sampling Point: TP2
 Investigator(s): T. BARNES Section, Township, Range: LAS VIRGENES CIVIL LAND GRANT
 Landform (hillslope, terrace, etc.): hillslope w/ drainage Local relief (concave, convex, none): CONCAVE Slope (%): 3
 Subregion (LRR): LRR C Lat: 34.14871908 Long: -118.7660674 Datum: NAD 83
 Soil Map Unit Name: Urban land-Sagevi, landscaped-Kawanga, landscaped Complex, 0-20% rrs NWI classification: N/A
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Hydric Soil Present?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>		
Wetland Hydrology Present?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>		
Remarks: <u>Downstream from TP1 - under riparian canopy. Severe drought conditions.</u>			

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: <u>20'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:	
1. <u>Quercus lobata</u>	<u>40</u>	<u>Y</u>	<u>FACU</u>	Number of Dominant Species That Are OBL, FACW, or FAC:	<u>0</u> (A)
2. <u>Quercus agrifolia</u>	<u>30</u>	<u>Y</u>	<u>NL</u>	Total Number of Dominant Species Across All Strata:	<u>3</u> (B)
3. <u>Fraxinus latifolia</u>	<u>10</u>	<u>N</u>	<u>FACW</u>	Percent of Dominant Species That Are OBL, FACW, or FAC:	<u>0</u> (A/B)
4. <u>Schinus molle</u>	<u>5</u>	<u>N</u>	<u>NL</u>		
		<u>85</u> = Total Cover			
Sapling/Shrub Stratum (Plot size: <u>15'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Prevalence Index worksheet:	
1. <u>Quercus lobata</u>	<u>20</u>	<u>Y</u>	<u>FACU</u>	Total % Cover of:	Multiply by:
2. <u>Olea europaea</u>	<u>2</u>	<u>N</u>	<u>NL</u>	OBL species	x 1 =
3. _____				FACW species <u>10</u>	x 2 = <u>20</u>
4. _____				FAC species	x 3 =
5. _____				FACU species <u>60</u>	x 4 = <u>240</u>
		<u>22</u> = Total Cover			
Herb Stratum (Plot size: <u>10'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	UPL species <u>37</u>	x 5 = <u>185</u>
1. <u>N/A</u>				Column Totals: <u>107</u> (A)	<u>445</u> (B)
2. _____				Prevalence Index = B/A = <u>4.15</u>	
3. _____				Hydrophytic Vegetation Indicators:	
4. _____				<input type="checkbox"/> Dominance Test is >50%	
5. _____				<input type="checkbox"/> Prevalence Index is ≤3.0 ¹	
6. _____				<input type="checkbox"/> Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet)	
7. _____				<input type="checkbox"/> Problematic Hydrophytic Vegetation ¹ (Explain)	
8. _____				¹ Indicators of hydric soil and wetland hydrology must be present, unless disturbed or problematic.	
Woody Vine Stratum (Plot size: _____)	Absolute % Cover	Dominant Species?	Indicator Status	Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
1. _____					
2. _____					
		_____ = Total Cover			
% Bare Ground in Herb Stratum <u>0</u>		% Cover of Biotic Crust _____			
Remarks: <u>Ground 100% covered w/ leaf litter</u>					

SOIL

Sampling Point: TP2

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
2-0	leaf litter							leaf litter
0-3	10YR 3/2	95	5YR 3/4	5	C	M/PL	clay loam	roots
3-12	10YR 3/2	100						

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

<input type="checkbox"/> Histosol (A1)	<input type="checkbox"/> Sandy Redox (S5)	<input type="checkbox"/> 1 cm Muck (A9) (LRR C)
<input type="checkbox"/> Histic Epipedon (A2)	<input type="checkbox"/> Stripped Matrix (S6)	<input type="checkbox"/> 2 cm Muck (A10) (LRR B)
<input type="checkbox"/> Black Histic (A3)	<input type="checkbox"/> Loamy Mucky Mineral (F1)	<input type="checkbox"/> Reduced Vertic (F18)
<input type="checkbox"/> Hydrogen Sulfide (A4)	<input type="checkbox"/> Loamy Gleyed Matrix (F2)	<input type="checkbox"/> Red Parent Material (TF2)
<input type="checkbox"/> Stratified Layers (A5) (LRR C)	<input type="checkbox"/> Depleted Matrix (F3)	<input type="checkbox"/> Other (Explain in Remarks)
<input type="checkbox"/> 1 cm Muck (A9) (LRR D)	<input type="checkbox"/> Redox Dark Surface (F6)	
<input type="checkbox"/> Depleted Below Dark Surface (A11)	<input type="checkbox"/> Depleted Dark Surface (F7)	
<input type="checkbox"/> Thick Dark Surface (A12)	<input type="checkbox"/> Redox Depressions (F8)	
<input type="checkbox"/> Sandy Mucky Mineral (S1)	<input type="checkbox"/> Vernal Pools (F9)	
<input type="checkbox"/> Sandy Gleyed Matrix (S4)		

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):
 Type: _____
 Depth (inches): _____

Hydric Soil Present? Yes _____ No

Remarks:
No additional indicators of hydric soils. Oxidation in pore lining, but not on living roots.

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)		Secondary Indicators (2 or more required)
<input type="checkbox"/> Surface Water (A1)	<input type="checkbox"/> Salt Crust (B11)	<input type="checkbox"/> Water Marks (B1) (Riverine)
<input type="checkbox"/> High Water Table (A2)	<input type="checkbox"/> Biotic Crust (B12)	<input type="checkbox"/> Sediment Deposits (B2) (Riverine)
<input type="checkbox"/> Saturation (A3)	<input type="checkbox"/> Aquatic Invertebrates (B13)	<input type="checkbox"/> Drift Deposits (B3) (Riverine)
<input type="checkbox"/> Water Marks (B1) (Nonriverine)	<input type="checkbox"/> Hydrogen Sulfide Odor (C1)	<input checked="" type="checkbox"/> Drainage Patterns (B10)
<input type="checkbox"/> Sediment Deposits (B2) (Nonriverine)	<input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3)	<input type="checkbox"/> Dry-Season Water Table (C2)
<input type="checkbox"/> Drift Deposits (B3) (Nonriverine)	<input type="checkbox"/> Presence of Reduced Iron (C4)	<input type="checkbox"/> Crayfish Burrows (C8)
<input type="checkbox"/> Surface Soil Cracks (B6)	<input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6)	<input type="checkbox"/> Saturation Visible on Aerial Imagery (C9)
<input type="checkbox"/> Inundation Visible on Aerial Imagery (B7)	<input type="checkbox"/> Thin Muck Surface (C7)	<input type="checkbox"/> Shallow Aquitard (D3)
<input type="checkbox"/> Water-Stained Leaves (B9)	<input type="checkbox"/> Other (Explain in Remarks)	<input type="checkbox"/> FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No <input checked="" type="checkbox"/>	Depth (inches): _____	Wetland Hydrology Present? Yes _____ No <input checked="" type="checkbox"/>
Water Table Present? Yes _____ No <input checked="" type="checkbox"/>	Depth (inches): _____	
Saturation Present? Yes _____ No <input checked="" type="checkbox"/> (includes capillary fringe)	Depth (inches): _____	

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:
Clearly w/in a drainage feature. Oxidation on living roots not obvious. Concentrations mainly w/in matrix. Oxidation does not meet criteria for C3 indicators.

WETLAND DETERMINATION DATA FORM – Arid West Region

Project/Site: OAKMONT SENIOR/CANWOOD City/County: AGOURA MILLS Sampling Date: 10/31/16
 Applicant/Owner: OAKMONT SENIOR LIVING State: CA Sampling Point: TP3
 Investigator(s): T. BARNES Section, Township, Range: Las Virgenes Civil Land BEANT
 Landform (hillslope, terrace, etc.): Depression/hillslope/foe of slope Local relief (concave, convex, none): Concave Slope (%): 2
 Subregion (LRR): LRR C Lat: 34.14853744 Long: -118.7661711 Datum: NAD83
 Soil Map Unit Name: Urban land-Sapini, landscaped-Kawaga, landscaped complex, 0-20% res NWI classification: N/A
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation N, Soil N, or Hydrology N significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present?	Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	Is the Sampled Area within a Wetland?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Hydric Soil Present?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>		
Wetland Hydrology Present?	Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>		
Remarks: <u>TP3 is located at confluence of concrete V-ditch and primary drainage. Location is at foe of slope (east) and terminus of oak woodland (north) adjacent to developed area (west). That is severe drought conditions</u>			

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: <u>15'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:	
1. <u>Spartina lasiocarpa</u>	<u>10</u>	<u>Y</u>	<u>FACW</u>	Number of Dominant Species That Are OBL, FACW, or FAC:	<u>2</u> (A)
2. <u>Quercus lobata</u>	<u>10</u>	<u>Y</u>	<u>FACW</u>	Total Number of Dominant Species Across All Strata:	<u>4</u> (B)
3. _____				Percent of Dominant Species That Are OBL, FACW, or FAC:	<u>50</u> (A/B)
4. _____				Prevalence Index worksheet:	
				Total % Cover of:	Multiply by:
				OBL species <u>110^m</u>	x 1 = <u>110 TB</u>
				FACW species <u>110</u>	x 2 = <u>220</u>
				FAC species _____	x 3 = _____
				FACU species <u>12</u>	x 4 = <u>48</u>
				UPL species _____	x 5 = _____
				Column Totals:	<u>122</u> (A) <u>268</u> (B)
				Prevalence Index = B/A = <u>2.19</u>	
Sapling/Shrub Stratum (Plot size: <u>10'</u>)				Hydrophytic Vegetation Indicators:	
1. <u>Quercus lobata</u>	<u>2</u>	<u>Y</u>	<u>FACU</u>	___ Dominance Test is >50%	
2. _____				___ Prevalence Index is ≤3.0 ¹	
3. _____				___ Morphological Adaptations ¹ (Provide supporting data in Remarks or on a separate sheet)	
4. _____				___ Problematic Hydrophytic Vegetation ¹ (Explain)	
5. _____				___	
Herb Stratum (Plot size: <u>5'</u>)				___	
1. <u>Juncus balticus</u>	<u>100</u>	<u>Y</u>	<u>FACW</u>	___	
2. _____				___	
3. _____				___	
4. _____				___	
5. _____				___	
6. _____				___	
7. _____				___	
8. _____				___	
Woody Vine Stratum (Plot size: _____)				___	
1. _____				___	
2. _____				___	
_____ = Total Cover				___	
_____ = Total Cover				___	
% Bare Ground in Herb Stratum <u>0</u> % Cover of Biotic Crust _____				Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>	
Remarks: <u>Degraded Juncus with emergent Quercus lobata. Area appears to be transitioning from wetter area to drier upland.</u>					

SOIL

Sampling Point TP3

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-6	10 YR 2/1	95	7.5 YR 4/6	5	C	PL	clay loam	roots
6-18	10 YR 2/1	100					clay loam	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

Indicators for Problematic Hydric Soils³:

- | | | |
|--|---|---|
| <input type="checkbox"/> Histosol (A1) | <input type="checkbox"/> Sandy Redox (S5) | <input type="checkbox"/> 1 cm Muck (A9) (LRR C) |
| <input type="checkbox"/> Histic Epipedon (A2) | <input type="checkbox"/> Stripped Matrix (S6) | <input type="checkbox"/> 2 cm Muck (A10) (LRR B) |
| <input type="checkbox"/> Black Histic (A3) | <input type="checkbox"/> Loamy Mucky Mineral (F1) | <input type="checkbox"/> Reduced Vertic (F18) |
| <input type="checkbox"/> Hydrogen Sulfide (A4) | <input type="checkbox"/> Loamy Gleyed Matrix (F2) | <input type="checkbox"/> Red Parent Material (TF2) |
| <input type="checkbox"/> Stratified Layers (A5) (LRR C) | <input type="checkbox"/> Depleted Matrix (F3) | <input type="checkbox"/> Other (Explain in Remarks) |
| <input type="checkbox"/> 1 cm Muck (A9) (LRR D) | <input type="checkbox"/> Redox Dark Surface (F6) | |
| <input type="checkbox"/> Depleted Below Dark Surface (A11) | <input type="checkbox"/> Depleted Dark Surface (F7) | |
| <input type="checkbox"/> Thick Dark Surface (A12) | <input type="checkbox"/> Redox Depressions (F8) | |
| <input type="checkbox"/> Sandy Mucky Mineral (S1) | <input type="checkbox"/> Vernal Pools (F9) | |
| <input type="checkbox"/> Sandy Gleyed Matrix (S4) | | |

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____
Depth (inches): _____

Hydric Soil Present? Yes _____ No

Remarks:

S_{0.1} does not meet criteria for stratified layers; nearly uniform w/ exception of concentrations in the pore linings.

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)

Secondary Indicators (2 or more required)

- | | | |
|--|---|--|
| <input type="checkbox"/> Surface Water (A1) | <input type="checkbox"/> Salt Crust (B11) | <input type="checkbox"/> Water Marks (B1) (Riverine) |
| <input type="checkbox"/> High Water Table (A2) | <input type="checkbox"/> Biotic Crust (B12) | <input type="checkbox"/> Sediment Deposits (B2) (Riverine) |
| <input type="checkbox"/> Saturation (A3) | <input type="checkbox"/> Aquatic Invertebrates (B13) | <input type="checkbox"/> Drift Deposits (B3) (Riverine) |
| <input type="checkbox"/> Water Marks (B1) (Nonriverine) | <input type="checkbox"/> Hydrogen Sulfide Odor (C1) | <input checked="" type="checkbox"/> Drainage Patterns (B10) |
| <input type="checkbox"/> Sediment Deposits (B2) (Nonriverine) | <input checked="" type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3) | <input type="checkbox"/> Dry-Season Water Table (C2) |
| <input type="checkbox"/> Drift Deposits (B3) (Nonriverine) | <input type="checkbox"/> Presence of Reduced Iron (C4) | <input type="checkbox"/> Crayfish Burrows (C8) |
| <input type="checkbox"/> Surface Soil Cracks (B6) | <input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6) | <input type="checkbox"/> Saturation Visible on Aerial Imagery (C9) |
| <input type="checkbox"/> Inundation Visible on Aerial Imagery (B7) | <input type="checkbox"/> Thin Muck Surface (C7) | <input type="checkbox"/> Shallow Aquitard (D3) |
| <input type="checkbox"/> Water-Stained Leaves (B9) | <input type="checkbox"/> Other (Explain in Remarks) | <input type="checkbox"/> FAC-Neutral Test (D5) |

Field Observations:

Surface Water Present? Yes _____ No Depth (inches): _____
 Water Table Present? Yes _____ No Depth (inches): _____
 Saturation Present? Yes _____ No Depth (inches): _____
 (includes capillary fringe)

Wetland Hydrology Present? Yes No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

oxidation in pore linings but not evident on living roots. Indicator C3 not met. No concentric layers or transfer of iron. Area previously met hydrology based on wetter regime.

WETLAND DETERMINATION DATA FORM – Arid West Region

Project/Site: DAKIMONT SEMIAR / CAMWOOD City/County: AGOURA HILLS Sampling Date: 10/2/16
 Applicant/Owner: DAKIMONT SEMIAR LIVING State: CA Sampling Point: TP 4
 Investigator(s): T. BARNES Section, Township, Range: Las Virgenes Civil Land Grant
 Landform (hillslope, terrace, etc.): hillslope Local relief (concave, convex, none): Concave Slope (%): 3
 Subregion (LRR): LRR C Lat: 34.14721075 Long: -118.7663044 Datum: NAD83
 Soil Map Unit Name: Urbanland-Cropley, Fill complex 0-8% slopes, Commercial NWI classification: N/A
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation Y, Soil Y, or Hydrology Y significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS – Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Hydric Soil Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Wetland Hydrology Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>	
Remarks: Pit located north of culvert under Camwood in area dominated by <i>Helminthoglossum echinoides</i> but adjacent to wet area. AREA ^{adjacent only} filled portion of the site.	

VEGETATION – Use scientific names of plants.

Tree Stratum (Plot size: <u>15'</u>)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. <u>N/A</u>				Number of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A)
2.				Total Number of Dominant Species Across All Strata: <u>3</u> (B)
3.				Percent of Dominant Species That Are OBL, FACW, or FAC: <u>0</u> (A/B)
4.				
= Total Cover				
Sapling/Shrub Stratum (Plot size: <u>10'</u>)				
1. <u>N/A</u>				
2.				
3.				
4.				
5.				
= Total Cover				
Herb Stratum (Plot size: <u>5'</u>)				
1. <u><i>Helminthoglossum echinoides</i></u>	<u>40</u>	<u>Y</u>	<u>FAC</u>	Prevalence Index worksheet: Total % Cover of: _____ Multiply by: _____ OBL species _____ x 1 = _____ FACW species _____ x 2 = _____ FAC species <u>40</u> x 3 = <u>120</u> FACU species <u>20</u> x 4 = <u>80</u> UPL species <u>35</u> x 5 = <u>175</u> Column Totals: <u>95</u> (A) <u>375</u> (B) Prevalence Index = B/A = <u>3.9</u>
2. <u><i>Matricaria leprosa</i></u>	<u>20</u>	<u>Y</u>	<u>FACU</u>	
3. <u><i>Bromus diandrus</i></u>	<u>15</u>	<u>N</u>	<u>NL</u>	
4. <u><i>Avena barbata</i></u>	<u>20</u>	<u>Y</u>	<u>NL</u>	
5. <u><i>Helianthus annuus</i></u>	<u>21</u>	<u>N</u>	<u>FACU</u>	
6. <u><i>Rumex crispus</i></u>	<u>21</u>	<u>N</u>	<u>FAC</u>	
7.				
8.				
= Total Cover				
Woody Vine Stratum (Plot size: _____)				
1.				
2.				
= Total Cover				
% Bare Ground in Herb Stratum _____	% Cover of Biotic Crust _____			Hydrophytic Vegetation Present? Yes <input type="checkbox"/> No <input checked="" type="checkbox"/>
Remarks:				

SOIL

Sampling Point: TP9

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features			Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹		
0-12	10 YR 3/3	95	10 YR 5/6	2.5	C	M	clay loam
			10 YR 5/2	2.5	D	M	

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

<input type="checkbox"/> Histosol (A1)	<input type="checkbox"/> Sandy Redox (S5)	<input type="checkbox"/> 1 cm Muck (A9) (LRR C)
<input type="checkbox"/> Histic Epipedon (A2)	<input type="checkbox"/> Stripped Matrix (S6)	<input type="checkbox"/> 2 cm Muck (A10) (LRR B)
<input type="checkbox"/> Black Histic (A3)	<input type="checkbox"/> Loamy Mucky Mineral (F1)	<input type="checkbox"/> Reduced Vertic (F18)
<input type="checkbox"/> Hydrogen Sulfide (A4)	<input type="checkbox"/> Loamy Gleyed Matrix (F2)	<input type="checkbox"/> Red Parent Material (TF2)
<input type="checkbox"/> Stratified Layers (A5) (LRR C)	<input type="checkbox"/> Depleted Matrix (F3)	<input type="checkbox"/> Other (Explain in Remarks)
<input type="checkbox"/> 1 cm Muck (A9) (LRR D)	<input type="checkbox"/> Redox Dark Surface (F6)	
<input type="checkbox"/> Depleted Below Dark Surface (A11)	<input type="checkbox"/> Depleted Dark Surface (F7)	
<input type="checkbox"/> Thick Dark Surface (A12)	<input type="checkbox"/> Redox Depressions (F8)	
<input type="checkbox"/> Sandy Mucky Mineral (S1)	<input type="checkbox"/> Vernal Pools (F9)	
<input type="checkbox"/> Sandy Gleyed Matrix (S4)		

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes _____ No

Remarks:

Concentrations and depletions likely weathering parent material. No oxidation in pores.

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)		Secondary Indicators (2 or more required)
<input type="checkbox"/> Surface Water (A1)	<input type="checkbox"/> Salt Crust (B11)	<input type="checkbox"/> Water Marks (B1) (Riverine)
<input type="checkbox"/> High Water Table (A2)	<input type="checkbox"/> Biotic Crust (B12)	<input type="checkbox"/> Sediment Deposits (B2) (Riverine)
<input type="checkbox"/> Saturation (A3)	<input type="checkbox"/> Aquatic Invertebrates (B13)	<input type="checkbox"/> Drift Deposits (B3) (Riverine)
<input type="checkbox"/> Water Marks (B1) (Nonriverine)	<input type="checkbox"/> Hydrogen Sulfide Odor (C1)	<input checked="" type="checkbox"/> Drainage Patterns (B10)
<input type="checkbox"/> Sediment Deposits (B2) (Nonriverine)	<input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3)	<input type="checkbox"/> Dry-Season Water Table (C2)
<input type="checkbox"/> Drift Deposits (B3) (Nonriverine)	<input type="checkbox"/> Presence of Reduced Iron (C4)	<input type="checkbox"/> Crayfish Burrows (C8)
<input type="checkbox"/> Surface Soil Cracks (B6)	<input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6)	<input type="checkbox"/> Saturation Visible on Aerial Imagery (C9)
<input type="checkbox"/> Inundation Visible on Aerial Imagery (B7)	<input type="checkbox"/> Thin Muck Surface (C7)	<input type="checkbox"/> Shallow Aquitard (D3)
<input type="checkbox"/> Water-Stained Leaves (B9)	<input type="checkbox"/> Other (Explain in Remarks)	<input type="checkbox"/> FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No Depth (inches): _____

Water Table Present? Yes _____ No Depth (inches): _____

Saturation Present? Yes _____ No Depth (inches): _____ (includes capillary fringe)

Wetland Hydrology Present? Yes _____ No

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:

Remarks:

Poorly defined drainage due to filling.

WETLAND DETERMINATION DATA FORM - Arid West Region

Project/Site: DALMONT SENIOR / CANWOOD City/County: AGOURA HILLS Sampling Date: 10/31/16
 Applicant/Owner: DALMONT SENIOR LIVING State: CA Sampling Point: TP5
 Investigator(s): T. BARNES Section, Township, Range: Las Virgenes Civil Land Grant
 Landform (hillslope, terrace, etc.): hillslope Local relief (concave, convex, none): Concave Slope (%): 5
 Subregion (LRR): LRR-C Lat: 34.14714482 Long: -118.7662587 Datum: NAD 83
 Soil Map Unit Name: Urbanland-Cropley, fill complex, 0-8% slopes, commerrum NWI classification: N/A
 Are climatic / hydrologic conditions on the site typical for this time of year? Yes No (If no, explain in Remarks.)
 Are Vegetation Y, Soil Y, or Hydrology Y significantly disturbed? Are "Normal Circumstances" present? Yes No
 Are Vegetation N, Soil N, or Hydrology N naturally problematic? (If needed, explain any answers in Remarks.)

SUMMARY OF FINDINGS - Attach site map showing sampling point locations, transects, important features, etc.

Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Hydric Soil Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> Wetland Hydrology Present? Yes <input type="checkbox"/> No <input type="checkbox"/>	Is the Sampled Area within a Wetland? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>
Remarks: <i>Pit located in saturated area south of culvert from adjacent development (w/water) and ~5' north of culvert under Canwood street. Culvert supplements H₂O source. Area covered w/ rip rap and debris.</i>	

VEGETATION - Use scientific names of plants.

Tree Stratum (Plot size: _____)	Absolute % Cover	Dominant Species?	Indicator Status	Dominance Test worksheet:
1. <u>N/A</u>				Number of Dominant Species That Are OBL, FACW, or FAC: <u>2</u> (A) Total Number of Dominant Species Across All Strata: <u>3</u> (B) Percent of Dominant Species That Are OBL, FACW, or FAC: <u>.66</u> (A/B)
2. _____				
3. _____				
4. _____				
= Total Cover				Prevalence Index worksheet: Total % Cover of: _____ Multiply by: OBL species _____ x 1 = _____ FACW species _____ x 2 = _____ FAC species _____ x 3 = _____ FACU species _____ x 4 = _____ UPL species _____ x 5 = _____ Column Totals: _____ (A) _____ (B) Prevalence Index = B/A = _____
Sapling/Shrub Stratum (Plot size: _____)				
1. <u>N/A</u>				
2. _____				
3. _____				
Herb Stratum (Plot size: <u>10'</u>)				
1. <u>Helianthus scaberrimus</u>	<u>40</u>	<u>Y</u>	<u>NL</u>	
2. <u>Typha latifolia</u>	<u>25</u>	<u>Y</u>	<u>OBL</u>	
3. <u>Helianthus annuus</u>	<u>5</u>	<u>N</u>	<u>FACU</u>	
4. <u>Sorghum intrans</u>	<u>5</u>	<u>N</u>	<u>FACU</u>	
5. <u>Zizania latifolia</u>	<u>25</u>	<u>Y</u>	<u>FACW</u>	
6. <u>Melilotus alba</u>	<u>5</u>	<u>N</u>	<u>FACU</u>	
7. <u>Bromus diandrus</u>	<u>2.5</u>	<u>N</u>	<u>NL</u>	
8. <u>Avena barbata</u>	<u>2.5</u>	<u>N</u>	<u>NL</u>	
= Total Cover				
Woody Vine Stratum (Plot size: _____)				
1. _____				
2. _____				
= Total Cover				
% Bare Ground in Herb Stratum <u>0</u> % Cover of Biotic Crust <u>0</u>				
Hydrophytic Vegetation Present? Yes <input checked="" type="checkbox"/> No <input type="checkbox"/>				

Remarks:
Vegetation likely attributed to irrigation/landscaping from adjacent development that has found depressional area.

SOIL

Sampling Point: TP 5

Profile Description: (Describe to the depth needed to document the indicator or confirm the absence of indicators.)

Depth (inches)	Matrix		Redox Features				Texture	Remarks
	Color (moist)	%	Color (moist)	%	Type ¹	Loc ²		
0-6	10 YR 3/2	95	10 YR 5/6	5	C	m	clay loam	roots
6-18	10 YR 3/2	95	10 YR 5/6	2.5	C	m		
			10 Y 5/6	2.5	D	m		

¹Type: C=Concentration, D=Depletion, RM=Reduced Matrix, CS=Covered or Coated Sand Grains. ²Location: PL=Pore Lining, M=Matrix.

Hydric Soil Indicators: (Applicable to all LRRs, unless otherwise noted.)

<input type="checkbox"/> Histosol (A1)	<input type="checkbox"/> Sandy Redox (S5)	<input type="checkbox"/> 1 cm Muck (A9) (LRR C)
<input type="checkbox"/> Histic Epipedon (A2)	<input type="checkbox"/> Stripped Matrix (S6)	<input type="checkbox"/> 2 cm Muck (A10) (LRR B)
<input type="checkbox"/> Black Histic (A3)	<input type="checkbox"/> Loamy Mucky Mineral (F1)	<input type="checkbox"/> Reduced Vertic (F18)
<input type="checkbox"/> Hydrogen Sulfide (A4)	<input type="checkbox"/> Loamy Gleyed Matrix (F2)	<input type="checkbox"/> Red Parent Material (TF2)
<input type="checkbox"/> Stratified Layers (A5) (LRR C)	<input type="checkbox"/> Depleted Matrix (F3)	<input checked="" type="checkbox"/> Other (Explain in Remarks)
<input type="checkbox"/> 1 cm Muck (A9) (LRR D)	<input type="checkbox"/> Redox Dark Surface (F6)	
<input type="checkbox"/> Depleted Below Dark Surface (A11)	<input type="checkbox"/> Depleted Dark Surface (F7)	
<input type="checkbox"/> Thick Dark Surface (A12)	<input type="checkbox"/> Redox Depressions (F8)	
<input type="checkbox"/> Sandy Mucky Mineral (S1)	<input type="checkbox"/> Vernal Pools (F9)	
<input type="checkbox"/> Sandy Gleyed Matrix (S4)		

³Indicators of hydrophytic vegetation and wetland hydrology must be present, unless disturbed or problematic.

Restrictive Layer (if present):

Type: _____

Depth (inches): _____

Hydric Soil Present? Yes No ~~TP~~

Remarks:
Earthworms + larval bodies. Given drought conditions, anaerobic conditions no longer present and the soils at this location appear displaced from adjacent construction

HYDROLOGY

Wetland Hydrology Indicators:

Primary Indicators (minimum of one required; check all that apply)	Secondary Indicators (2 or more required)
<input type="checkbox"/> Surface Water (A1)	<input type="checkbox"/> Salt Crust (B11)
<input checked="" type="checkbox"/> High Water Table (A2)	<input type="checkbox"/> Biotic Crust (B12)
<input checked="" type="checkbox"/> Saturation (A3)	<input type="checkbox"/> Aquatic Invertebrates (B13)
<input type="checkbox"/> Water Marks (B1) (Nonriverine)	<input type="checkbox"/> Hydrogen Sulfide Odor (C1)
<input type="checkbox"/> Sediment Deposits (B2) (Nonriverine)	<input type="checkbox"/> Oxidized Rhizospheres along Living Roots (C3)
<input type="checkbox"/> Drift Deposits (B3) (Nonriverine)	<input type="checkbox"/> Presence of Reduced Iron (C4)
<input type="checkbox"/> Surface Soil Cracks (B6)	<input type="checkbox"/> Recent Iron Reduction in Tilled Soils (C6)
<input type="checkbox"/> Inundation Visible on Aerial Imagery (B7)	<input type="checkbox"/> Thin Muck Surface (C7)
<input type="checkbox"/> Water-Stained Leaves (B9)	<input type="checkbox"/> Other (Explain in Remarks)
	<input type="checkbox"/> Water Marks (B1) (Riverine)
	<input type="checkbox"/> Sediment Deposits (B2) (Riverine)
	<input type="checkbox"/> Drift Deposits (B3) (Riverine)
	<input checked="" type="checkbox"/> Drainage Patterns (B10)
	<input type="checkbox"/> Dry-Season Water Table (C2)
	<input type="checkbox"/> Crayfish Burrows (C8)
	<input type="checkbox"/> Saturation Visible on Aerial Imagery (C9)
	<input type="checkbox"/> Shallow Aquitard (D3)
	<input type="checkbox"/> FAC-Neutral Test (D5)

Field Observations:

Surface Water Present? Yes _____ No Depth (inches): _____

Water Table Present? Yes _____ No Depth (inches): _____

Saturation Present? Yes No _____ Depth (inches): 2"

Wetland Hydrology Present? Yes No _____

Describe Recorded Data (stream gauge, monitoring well, aerial photos, previous inspections), if available:
Previously determined as wetland - drought conditions now

Remarks:
*Saturation likely from recent rain event. Potentially not hydrology in high-summer. Only water source appears to be from adjacent wetland w/ standing water. (development).
 Gluteny content but not readily apparent. Investigator was not able to squeeze water from soil.

Biological Resources Assessment Report

APPENDIX D2



**Biological Resources Assessment Report
Oakmont of Agoura Hills
City of Agoura Hills, Los Angeles County, California**

Prepared for:
Oakmont Senior Living
8779 Soothing Court
Corona, CA 92883

Contact: Wayne Sant

Prepared by:
FirstCarbon Solutions
11755 Wilshire Blvd., Suite 1660
Los Angeles, CA 90025
888.826.5814

Contact: Jason Brandman, Project Director

Date: June 10, 2016

THIS PAGE INTENTIONALLY LEFT BLANK

Table of Contents

Acronyms and Abbreviations v

Section 1: Introduction and Background 1

 1.1 - Project Location..... 1

 1.2 - Project Description 1

Section 2: Methods 9

 2.1 - Literature Search 9

 2.2 - Field Survey 10

Section 3: Regulatory Considerations 19

 3.1 - Federal Endangered Species Act 19

 3.2 - Migratory Bird Treaty Act 19

 3.3 - Bald and Golden Eagle Protection Act..... 19

 3.4 - Executive Order 13112—Invasive Species..... 20

 3.5 - Clean Water Act Section 404 20

 3.6 - Clean Water Act Section 401 21

 3.7 - California Fish and Game Code 21

 3.8 - California Porter-Cologne Water Quality Control Act 22

Section 4: Environmental Setting 23

 4.1 - Vegetation Communities and Land Cover Types 23

 4.2 - Potential Jurisdictional Waters of the U.S. 23

 4.3 - Special-status Species..... 23

 4.3.1 - Special-status Plants..... 24

 4.3.2 - Special-status Wildlife 24

Section 5: Potential Constraints to Future Site Development and Recommendations 25

 5.1 - Potential Constraints to Development from the Presence (or Possible Presence) of
 Special-status Species..... 25

 5.1.1 - Special-status Wildlife 25

Section 6: References 27

Appendix A: CNDDDB and CNPS Inventory Results

Appendix B: Site Photographs

List of Tables

Table 1: Special-status Plant Species Potentially Occurring within the Project Site..... 13

Table 2: Special-status Wildlife Species Potentially Occurring within the Project Site..... 14

List of Exhibits

Exhibit 1: Regional Location Map 3

Exhibit 2: Local Vicinity Map, Aerial Base..... 5

Exhibit 3: Site Plan 7

Exhibit 4: CNDDDB Occurrence of Special-status Species 11

THIS PAGE INTENTIONALLY LEFT BLANK

ACRONYMS AND ABBREVIATIONS

BGEPA	Bald and Golden Eagle Protection Act
CDFG	California Department of Fish and Game
CDFW	California Department of Fish and Wildlife
CEQA	California Environmental Quality Act
CESA	California Endangered Species Act
CNDDDB	California Natural Diversity Database
CNPS	California Native Plant Society
CWA	Clean Water Act
EO	Executive Order
EPA	United States Environmental Protection Agency
FESA	Federal Endangered Species Act
FGC	Fish and Game Code
MBTA	Migratory Bird Treaty Act
RWQCB	Regional Water Quality Control Board
USACE	United States Army Corps of Engineers
USC	United States Code
USDA	United States Department of Agriculture
USFWS	United States Fish and Wildlife Service
USGS	United States Geological Survey

THIS PAGE INTENTIONALLY LEFT BLANK

SECTION 1: INTRODUCTION AND BACKGROUND

Oakmont of Agoura Hills submitted an application to the City of Agoura Hills to develop an assisted living and memory care community at 29353 Canwood Street in Agoura Hills.

The State of California Department of Social Services will license the two-story structure as a Residential Care Facility for the Elderly. To facilitate the environmentally sustainable and regulatory-compliant construction of the project, FCS proposes to prepare technical studies analyzing the potential impacts of the proposed assisted-living facility on air quality, noise, and biological resources on-site.

This survey and report addresses potential impacts to biological resources by the proposed development of the site. Potential impacts to special-status plant or wildlife species known from the general area are specifically discussed.

1.1 - Project Location

The project site consists of 5.7 acres located within the city limits of Agoura Hills, California. The project site is bordered by an existing single-family residential development to the north, by commercial office land use to the west, and by a vacant, undeveloped parcel to the east. U.S. Highway 101 is immediately south of Canwood Street with commercial and light industrial uses located beyond. The project site is located in an unincorporated section of the City of Agoura Hills U.S. Geological Survey (USGS) Thousand Oaks 7.5-minute Quadrangle.

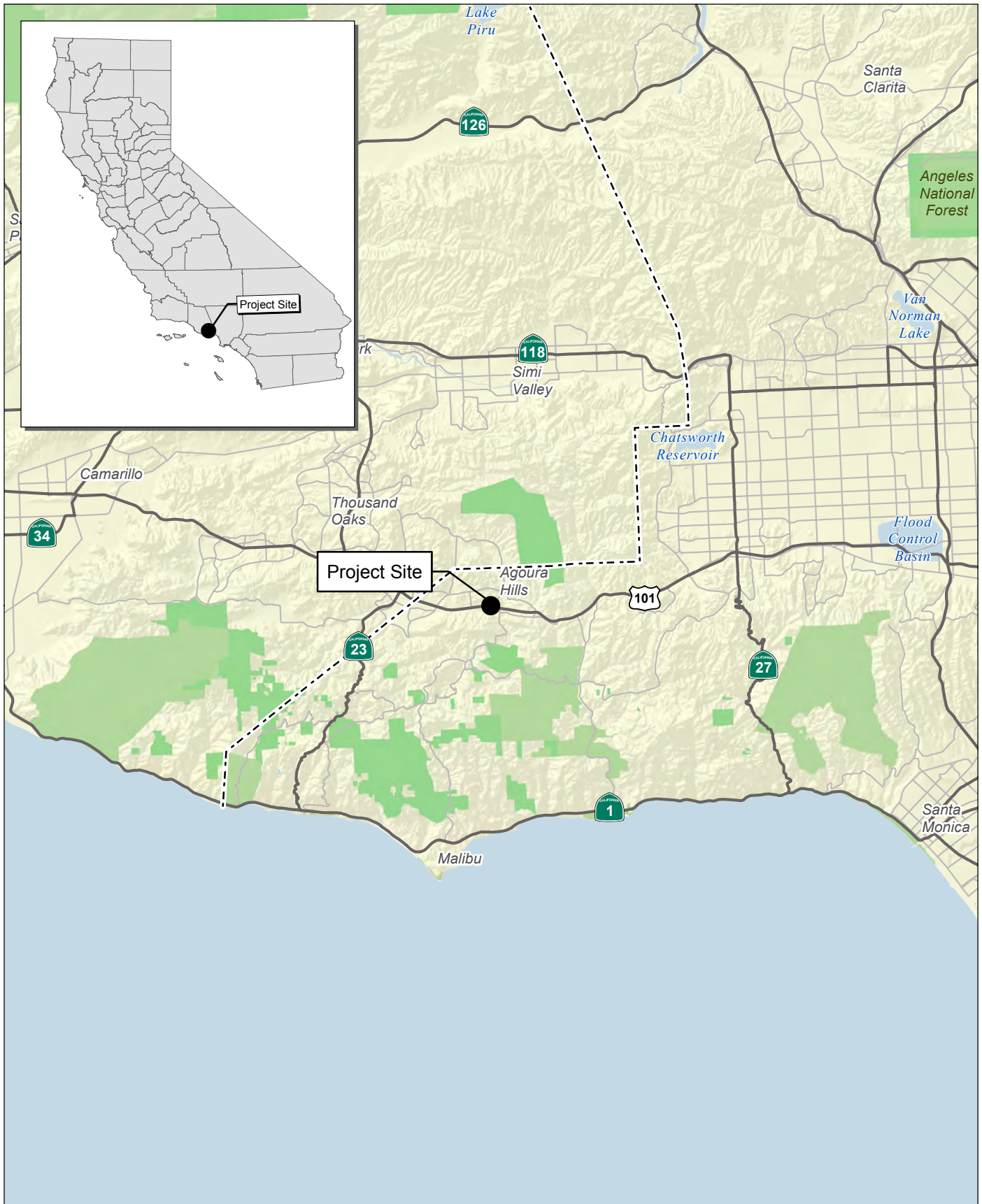
The site is bounded as follows:

- North—single-family residential development
- West—commercial office land use
- South—Canwood Street and U.S. Highway 101
- East—undeveloped parcel

1.2 - Project Description

Oakmont of Agoura Hills submitted an application to the City of Agoura Hills to develop an assisted living and memory care community (project) on a 5.7-acre site at the southwest corner of Haven Avenue and Church Street (Exhibit 1, Exhibit 2, and Exhibit 3). The State of California Department of Social Services will license the two-story structure as a Residential Care Facility for the Elderly.

THIS PAGE INTENTIONALLY LEFT BLANK



Source: Census 2000 Data, The CaSIL, FCS GIS 2013.

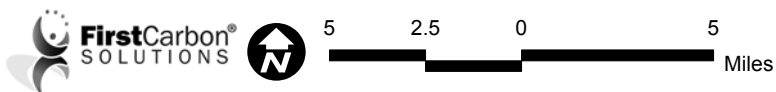


Exhibit 1 Regional Location Map

THIS PAGE INTENTIONALLY LEFT BLANK



Source: ESRI Imagery, 2014

Exhibit 2

Local Vicinity Map

Aerial Base



THIS PAGE INTENTIONALLY LEFT BLANK