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Mr. Jim Pardee
267 Stonecreek Court
Westlake Village, CA 91361

**RE: Results of an Updated Biological Resources Field Survey and Cumulative Impacts Analysis for the West Lilac Farms I & II Tentative Map Project, TM 5276, Valley Center**

Dear Mr. Pardee:

This brief letter presents the results of an updated biological resource field survey of the proposed West Lilac Farms I & II Tentative Map Project Site, TM 5276. The subject project involves an approximately 92.78-acre property supporting nearly 100 percent active agricultural land, situated south of Lilac Road and northeast of Via Ararat Drive and Mt. Ararat Way in the Bonsall Community Planning Area of unincorporated San Diego County. Approval of the TM 5276 project would result in the creation of 28 legal residential lots, with access provided from the east off Aqueduct Road and from the west off Via Ararat Drive.

**SITE DESCRIPTION**

The subject project site consists of two adjoining parcels that make contact at a 45-degree angle, as shown on the Vicinity Map in Attachment A. The southwesterly parcel is more-or-less square, and the northeasterly parcel is irregularly rectangular. Both parcels support agricultural lands (orchards). Elevations onsite vary between approximately 680 and 885 feet MSL. The southwesterly parcel slopes gently to the south and west and the northeasterly parcel slopes to the north and west. Drainages are found adjacent to lots #1-#5 and offsite to the northeast of lot #16. The remaining areas of the site are planted with orchard trees and are in active agricultural production.

**METHODS**

A biological survey of this property was completed by Ms. Shannon M. Allen, Biological Consultant, on the afternoon of 8 August 2001, between the hours of approximately 14:00 and 16:00. Weather conditions were conducive to field surveying, with moderate temperatures (80˚s F), clear skies, and a light northerly breeze. The entire property was walked, and all plants, animals, and habitats encountered were identified

in the field. A directed Stephen's Kangaroo Rat Habitat Evaluation was completed, as were directed searches for other sensitive species known from the vicinity. Drainage areas were examined for the presence of County Resource Protection Ordinance (RPO) and state and federal jurisdictional wetland indicators, and all onsite vegetation and adjoining offsite vegetation was mapped. The onsite and adjoining offsite vegetation communities were delineated using a 200'-scale aerial photograph and a 100'-scale topographic map of the property. All collected data are utilized in the analysis of project impacts for this report.

In response to recent changes to the RPO, a directed RPO wetlands survey was conducted for the project by the author and Ms. Julia L. Groebner, Associate Biologist, on June 24, 2008. The results of the RPO wetlands survey can be found in "Results of a Directed RPO Wetland Survey for the West Lilac I and II Project, TM 5276" (Attachment D). Furthermore, the author conducted an updated biological field survey of the TM 5276 project site on the afternoon of October 28, 2008, between the hours of approximately 12:00 and 13:00. During this time period, weather conditions were characterized by clear skies, temperatures in the low 80˚s F, and no wind. The results of this updated field survey have been incorporated into this report and all accompanying attachments. The author and Ms. Groebner visited the site on July 30, 2009 to reassess the original RPO wetland mapping. Weather conditions at that time were suitable for field surveying, with clear skies, temperatures in the mid 70˚s F, and a light westerly breeze.

## RESULTS

### Plant Communities

Four plant communities or habitats are found on or adjoining the TM 5276 project site. These include the following:

Orchards and Vineyards (Holland Code #18100) - 90.93 acres
The vast majority of the property supports an active orchard. This habitat is indicated by Avocado *(Persea americana),* Orange *(Citrus sinensis)*, and Lemon (*C. limon*) groves, with occasional orchard weeds, such as Scarlet Pimpernel (*Anagallis arvensis*), Common Horseweed (*Conyza* sp.), Russian Thistle (*Salsola pestifer*), and Sow Thistle (*Sonchus asper*) in the understory beneath the trees. At the time of the 2008 biological survey, all areas of the site originally mapped as Non-native Grassland (Holland Code #42200) had been planted with young Lime (*C. aurantifolia*) and Avocado trees and various ornamental flowers, including Silver Wattle (*Acacia dealbata*), Protea *(Protea* spp.*)*, Kangaroo Paw *(Anigozanthos* sp.*)* and various others. Additional areas of active agriculture are found offsite on adjoining properties. This habitat-type is of no significant local or regional biological resource value.

Disturbed Habitat (Holland Code #11300) - 1.85 acres
A well-defined watercourse, supporting Disturbed Habitat, traverses the southwestern portion of the property, crossing proposed parcels #1 through #5. The drainage does not support a predominance of woody vegetation, with weedy, herbaceous upland species as the dominant cover. These include Ripgut

Brome (*Bromus diandrus*), Tree Tobacco (*Nicotiana glauca*), Perennial Mustard (*Brassica geniculata*), Indian Fig (*Opuntia ficus-indica*), Bristly Ox-tongue (*Picris echioides*), and Wild Radish (*Raphanus sativus*). Facultative hydrophytic species, such as Sedge *(Cyperus* sp.*)*, Curly Dock (*Rumex crispus*), and others, are occasional in the Disturbed Habitat, but not to the extent that would qualify this agricultural drainage as a wetland. The drainage also supports a handful of scrubby hydrophytic Southwestern Willows (*S. gooddingii)*. However, these trees do not constitute a discrete habitat-type, and are considered part of the Disturbed Habitat for analysis purposes. Grove activities are present on either side of this drainage, and it appears to be mostly an erosional feature created by run-off from the surrounding agriculture.

This drainage does not qualify as an "RPO Wetland", as defined by the RPO, and we saw no evidence that the drainage would qualify as either a state (CDFG) or federal (Army Corps of Engineers (ACOE)) wetland. The drainage, however, probably qualifies as state and federal "waters". This is discussed in more detail subsequently. Various other drainage features are also present on the property. However, none of these support any wetland indicators, and all are essentially erosion ditches associated with the grove runoff. Within the habitat are various metal and plastic pipes and other similar materials associated with grove activities. These are short, makeshift pipes used to drain the orchard access dirt road. Many of these pipes no longer function (they are silted in); however, they will be left in place following development, as removing them could create an erosion problem. The Disturbed Habitat onsite is of low biological resource value.

Southern Coast Live Oak Riparian Forest (Holland Code #61310) - offsite
A drainage supporting disturbed Southern Coast Live Oak Riparian Forest (SCLORF) is present offsite to the northwest and southeast of the northeastern corner of proposed parcel #16. Indicators in the SCLORF include Coast Live Oaks (*Quercus agrifolia*) with Willows *(Salix* spp.*)* and other hydrophytes scattered throughout the drainage. Understory species include Desert Grape (*Vitis girdiana*), Cattails *(Typha)*, with a few Mule Fat (*Baccharis glutinosa*) and Salt Cedar (*Tamarix* sp.) shrubs in open places. This SCLORF does not extend into the project site.

Urban/Developed habitat (Holland Code #12000) - offsite
Development is present onsite in the form of paved grove roads (which are mapped as part of the Orchards and Vineyards habitat category) and offsite on surrounding developed properties. Several homes are present offsite, and two paved roads border the property. Via Ararat forms the western property boundary, near proposed lots #6, #7, and #8, and Mount Ararat forms the southern boundary, near proposed lots #1, #5, and #6.

**Flora/Fauna**

A total of seventy-three species of plants and twelve species of animals were detected in association with the TM 5276 project site. These represent species common in this part of San Diego County, most associated with disturbed areas or groves. All of the plants and animals detected on the property are locally-common species, and no "listed" species or "narrow endemics" are expected to be dependent on

this site. One wide-ranging sensitive species was detected (Turkey Vulture) – this is discussed subsequently. A list of the flora and fauna associated with the TM 5276 property is presented in Table 1.

**Sensitive Habitats**

None of the plant communities found in association with TM 5276 are considered sensitive in the County pursuant to the Guidelines for Determining Significance (2008).

**Sensitive Species**

No sensitive plants were detected on the TM 5276 project site. Given the disturbed nature of the property, none are anticipated. Sensitive plant species known to occur in the general vicinity of this property are listed in Attachment B.

One sensitive animal species was detected flying across the edge of the property during the site surveys:

> **Turkey Vulture**
> ***Cathartes aura***
> **Listing**: "Blue-list" (Tate, 1986)
> "Declining" (Unitt, 1984)
> County status: San Diego County Sensitive Animal List, Group 1 (DPLU, 2006)
> Federal/State status: none
> **Distribution**: Ranges from southern Canada to Argentina
> **Habitat(s)**: Open areas, farmlands, grasslands. Usually seen soaring overhead or sometimes perched on poles, dead trees, or on the ground.
> **Status on Site**: A single mature Turkey Vulture was observed flying across the edge of the property during the site survey. Nesting habitat is not present onsite or nearby, nor does the site constitute a significant foraging or roosting area for this large, wide-ranging bird.

Additional sensitive animal species known to occur in the general vicinity of this property are listed in Attachment B.

<u>Stephen's Kangaroo Rat Habitat Evaluation</u>

Stephen's Kangaroo Rat (*Dipodomys stephensi*) is a State and Federally-listed "Threatened Species", subject to protection under both the Federal and State Endangered Species Acts (FESA, CESA). This secretive, nocturnal mammal is not specifically known to occur in (Bonsall), although specimens are known from the San Luis Rey River to the west, from the Ramona Valley to the south, and from the Fallbrook Naval Weapons Facility to the northwest. All of these known populations are many miles from the TM 5276 site. Stephen's Kangaroo Rat (SKR) occurs in open habitats dominated by low forbs, such as Red-stem Filaree (*Erodium cicutarium*), with scattered, low perennial shrubs, including Flat-top Buckwheat (*Eriogonum fasciculatum*), California Sagebrush (*Artemisia californica*), and others. Ideal

habitat is characterized by the presence of friable, loamy soils, where the rats can construct underground burrows, and extensive open areas between shrubs for foraging, breeding, etc. Apparently not tolerated is the presence of dense brush or a heavy thatch of annual weedy grasses. Also not tolerated is the presence of nearby development, as this species suffers extirpation in the presence of feral pets and other "edge effects". Moore-Craig (1984), working at the San Jacinto Wildlife Area, reported that successful trapping sites for SKR had an average of only 9.1 percent vegetative cover. In Non-native Grassland, occurrence and relative abundance of SKR is directly related to the proportion of annual forbs to annual grasses. Annual forbs provide critical greens in the spring, furnish temporary cover, produce many large seeds, then dry and disarticulate rapidly, creating patches of preferred open ground. Annual grasses, on the other hand, tend to persist for years, forming dense mats of dead materials presumably impeding ease of SKR movement (O'Farrell and Uptain, 1989).

Surveying for this completely nocturnal species involved searching the site for characteristic scats, diggings, and burrows. This was completed as a part of the baseline biology survey of the property. Numerous California Ground Squirrel *(Spermophilus beecheyi)* and Valley Pocket Gopher *(Thomomys bottae)* burrows were seen, and other small rodents probably occur onsite *(Peromyscus*, others). No signs of *Dipodomys* were detected.

Because *Dipodomys* does not appear to occur on the TM 5276 project site, the likelihood that SKR is a resident species is considered extremely low and recruitment is considered unlikely. As discussed above, the 2008 biological survey found that the property no longer supports any measurable amounts of Non-native Grassland. Therefore, the proper habitat for SKR is not present onsite. Given the current and surrounding land-use (orchards) and distance to known populations, the TM 5276 project site is considered unoccupied by SKR.

**Wetlands**

As discussed above, in June 2008 a directed RPO wetlands survey was conducted on the TM 5276 project site in response to recent changes to the RPO. This survey found that RPO wetlands are not present onsite, although RPO wetlands are present offsite to the northeast, within the adjoining SCLORF. The complete results of the RPO wetlands survey are contained in "Results of a directed RPO Wetland Survey for the West Lilac I and II Project, TM 5276" (Scheidt, June 24, 2008) included as Attachment B.

The drainages offsite of the northeastern corner of proposed parcel #16 and crossing proposed parcels #1 through #5 likely fall under the jurisdiction of the U.S. Army Corps of Engineers (ACOE) and the California Regional Water Quality Control Board (CRWQCB) as "non-wetland waters", and under the jurisdiction of the California Department of Fish and Game (CDFG) as "state waters". The drainage offsite to the northeast of proposed parcel #16 also likely qualifies as "state wetlands". This wetland area does not extend into the project site and no ACOE wetlands are located on the project site.

**Wildlife Corridors**

No regional wildlife corridors were detected onsite. However, the canopy of the offsite SCLORF qualifies as a local wildlife corridor, and this corridor crosses the northeastern corner of proposed lot #16, although the SCLORF itself is located offsite. This canopy is used by avifauna and possibly other wildlife, connecting onsite and offsite area. Also, some wildlife uses the understory of the groves to move between open areas.

**IMPACTS**

Approval of the TM 5276 project and the development of the property, as presently proposed, will result in both direct and indirect impacts to biological resources found on and in association with this site. As required by CEQA, a "worst-case" scenario is always examined when determining potential project-related impacts. Impacts are assessed at a level which is either "significant" or "less than significant" under provisions of CEQA. Also, an assessment is made as to whether or not those project-related impacts determined to be significant are fully mitigable, reducing their effects to less than significant. In this instance, all anticipated impacts are considered mitigable within the context of an appropriately-conditioned project approval.

Direct impacts result from the removal of habitat, plants, and animals from the site through grading and brushing, clearing, or thinning for fire protection purposes, agriculture, etc. These direct impacts are considered permanent because they result in a conversion of habitats to landscaped areas, structures, roads, etc. Indirect impacts also affect plants, animals, and habitats that occur on or near a project site. These are not the direct result of grading or development, but are the result of changes in land use as a by-product of adjacency. Examples of indirect impacts include the introduction of exotic species, human or pet intrusions into natural areas, lighting, traffic, and noise. Indirect impacts are often called "edge effects".

The following potential project-related impacts have been identified in association with the TM 5276 project:

(1) Direct and indirect losses (grading, fire clearing, etc.) affecting up to approximately 34.30 acres of Orchards and Vineyards vegetation. This impact is considered **less than significant**. The project as designed will maintain at least 56.63 acres of the onsite Orchards and Vineyards as active agriculture.

(2) Direct and indirect losses (fire clearing, etc.) affecting up to approximately 1.85 acres of Disturbed Habitat. This impact is considered **less than significant**.

(3) A loss of foraging and potential roosting habitat for Turkey Vulture. This impact is considered **less than significant**.

(4) Direct and indirect impacts (fire clearing, etc.) to the onsite portion of the local wildlife corridor that crosses the northeastern corner of proposed lot #16. This impact is considered **less than significant**.

(5) Direct and indirect impacts (grading, fire clearing, noise, lighting, etc) to the onsite wildlife populations. This impact is considered **less than significant**.

Street "E", as proposed, will be placed over a dirt road that has been used for some time to access the existing orchards. This road qualifies as Urban/Developed Habitat. Improvements to Street "E" in the existing road footprint will not involve any new impacts to the adjoining drainage. As previously discussed, this drainage qualifies as state and federal "waters". Although grading is shown at the point where the drainage meets the proposed street improvements, the proposed improvements, the future road setback, and any types of rails or walls between the road and the drainage will occur entirely within the Urban/Developed Habitat of the existing dirt road. Walking trails are not proposed, and no other improvements that could extend into the drainage are proposed. The construction of Street "E" will thus not impact jurisdictional "waters".

The Stormwater Management Plan proposes the use of bio-filters to manage project stormwater runoff. While bio-filtration may be suitable to this project, the onsite drainage may not act as a bio-filter in any way for project runoff. The onsite drainage shall be placed within an agricultural Limited Building Zone Easement (LBZ), where it will not be impacted by grading, home construction, or the placement of fill or any other material.

Furthermore, the project includes a minimum 100-foot LBZ at the northeastern corner of proposed lot #16 (Attachment A). This LBZ will prohibit the construction of any habitable structures that might require offsite fire clearing into the adjoining SCLORF. This LBZ may be subsumed into a larger agricultural LBZ. The project also includes the implementation of all necessary BMPs, both during and post construction, in order to preclude potential indirect impacts to the offsite SCLORF caused by grading and home occupation.

## GUIDELINES FOR DETERMINATION OF SIGNIFICANCE

### Sensitive Species

Impacts to Sensitive Species associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA. The determination of impact significance is based on the following criteria:

*Would the project have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?*

No sensitive plant species were observed on the project site. Additionally, sensitive plant species known to occur in the project vicinity are considered to have a low potential to occur onsite. Therefore, project implementation will **not impact** any sensitive plant species.

Turkey Vulture is the only sensitive animal species detected onsite. However, nesting habitat is not present onsite or nearby, and the site does not constitute a significant foraging or potential roosting area for this large, wide-ranging species. Therefore, project impacts to Turkey Vulture are considered **less than significant**.

The SCLORF offsite to the northeast of proposed lot #16 could support sensitive species and/or provide areas for raptor nesting and foraging. However, the project as designed will **not impact** this offsite area.

**Riparian Habitat and Sensitive Natural Communities**

Impacts to Riparian Habitats or Other Sensitive Natural Communities associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA. The determination of impact significance is based on the following criteria:

*Would the project have a substantial adverse effect on any riparian habitat or another sensitive natural community identified in local or regional plans, policies, regulations, or by the California Department of Fish and Game or U.S. Fish and Wildlife Service?*

Riparian habitats or other sensitive natural communities are not present onsite. Furthermore, the project as designed will not impact the SCLORF present offsite to the northeast of proposed lot #16. This area will be protected from offsite fire clearing by a dedicated agricultural LBZ, to extend no less than 100 feet outwards from the property boundary in the vicinity of the offsite SCLORF. This agricultural LBZ will prohibit the construction of any habitable structures that might require offsite fire clearing into the SCLORF. This agricultural LBZ may be subsumed into a larger agricultural LBZ. The project also includes the implementation of all necessary BMPs, both during and post construction, in order to preclude potential indirect impacts to the SCLORF caused by grading and home occupation. Therefore, the project as designed will **not impact** riparian habitats or sensitive natural communities.

Implementation of the Fire Protection Plan (Firewise, 2009) will require approximately 0.6 acre of offsite clearing adjacent to proposed Lots 20 and 21. A 60-foot easement for fire clearing is proposed to ensure these offsite areas are maintained. Vegetation within these offsite areas consists of Orchards and Vineyards as of October 2009. This vegetation is not considered sensitive. Thus, thinning per the requirements of the Fire Protection Plan will not impact riparian habitats or sensitive natural communities.

**Protected Wetlands**

Impacts to Protected Wetlands associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA.The determination of impact significance is based on the following criteria:

> *Would the project have a substantial adverse effect on federally protected wetlands as defined by Section 404 of the Clean Water Act (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption or other means?*

As discussed above, the project site does not support any federally protected wetlands, as defined by Section 404 of the Clean Water Act. Furthermore, the project as designed places the state and federal "waters" onsite within an agricultural LBZ, where they will not be impacted by grading, home construction, or the placement of fill or any other material. Therefore, the project as designed will **not impact** federal wetlands or state and federal "waters".

**Wildlife Corridors**

Impacts to Wildlife Corridors associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA. The determination of impact significance is based on the following criteria:

> *Would the project interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?*

As discussed above, regional wildlife corridors are not present onsite. However, the northeastern corner of proposed lot #16 is part of a local wildlife corridor associated with the offsite SCLORF. This local wildlife corridor connects onsite and offsite areas and is used by avifauna and possibly other wildlife. Also, some wildlife uses the understory of the groves to move between open areas. The majority of the local wildlife corridor associated with the SCLORF is actually offsite and will not be impacted by the project as designed. The onsite portion of the corridor will be minimally impacted by the project, as it will be placed within an agricultural LBZ that will prohibit the construction of habitable structures in this area. This will provide an adequate buffer from noise and light associated with the future residential development of the project site. Therefore, the function of this habitat as a local wildlife corridor will be preserved by the project as designed. Additionally, the project will retain at least 56.63 acres of the existing groves, so these areas will still be available for use by wildlife. Therefore, project impacts to wildlife corridors will be **less than significant**.

**Applicable Policies and Plans**

Impacts to Applicable Policies and Plans associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA. The determination of impact significance is based on the following criteria:

> *Would the project conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance? Would the project conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional or state habitat conservation plan?*

As discussed above, RPO wetlands are not present onsite, although RPO wetlands are present offsite to the northeast, within the adjoining SCLORF. The project as designed will not impact the offsite RPO wetlands, as it includes the dedication of an agricultural LBZ to preclude the need for offsite fire clearing in this area, as well as all BMPs necessary to prevent potential indirect impacts to the offsite wetlands caused by grading and occupation of the new homes. Therefore, the project complies with the RPO, which prohibits impacts to RPO wetlands, and **no impact** is identified.

None of the species identified for protection under the proposed North County Multiple Species Conservation Program (MSCP) Subarea Plan are present on the project site. The property is also not located within the Wildlife Agencies' Pre-approved Mitigation Area (PAMA). Therefore, the project will not interfere with the conservation and mitigation strategy of the proposed North County MSCP, and **no impact** is identified.

Because natural vegetation is not present on the project site, the property is not relevant for reserve planning. Therefore, development of the project site is not inconsistent with the Southern California Coastal Sage Scrub Natural Communities Conservation Planning Process (NCCP) Guidelines, and **no impact** is identified.

**Reduction of Wildlife Populations**

Impacts to Wildlife Populations associated with the TM 5276 project are assessed as being either "significant" or "less than significant", as defined by CEQA. The determination of impact significance is based on the following criteria:

> *Does the project have the potential to degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels, threaten to eliminate a plant or animal community, or reduce the number or restrict the range of a rare or endangered plant or animal species?*

Implementation of the project will not degrade the quality of the environment, substantially reduce the habitat of a fish or wildlife species, cause a fish or wildlife population to drop below self-sustaining levels,

threaten to eliminate a plant or animal community, or reduce the number or restrict the range of a rare or endangered plant or animal species. No rare or endangered plant species were identified on the project site. Turkey Vulture is the only sensitive animal species detected, with a single specimen observed flying across the edge of the property. No Turkey Vultures were found roosting or nesting on the project site during any of the site surveys, and nesting habitat for this species is not present on site or nearby and the site does not constitute a significant foraging or potential roosting area for this large, wide-ranging species. Therefore, the project's impacts to Turkey Vulture are **less than significant**. The project's impact to up to 34.30 acres of Orchards and Vineyards and 1.85 acres of Disturbed Habitat is not significant because no rare or endangered plant or animal species are expected to be dependent on these habitat-types. Therefore, project impacts to wildlife populations will be **less than significant**.

**CUMULATIVE IMPACTS ANALYSIS**

The County of San Diego Department of Planning and Land Use pursuant to CEQA requires a cumulative biological impacts analysis for most current projects. In a letter dated 10 August 2004, Staff requested that the TM 5276 project provide such an analysis in order to ensure that the project will not result in any significant, unmitigated cumulative impacts to biological resources.

According to Section 15130(a) of the CEQA Guidelines, cumulative impacts must be discussed when project impacts, even though individually limited, are cumulatively considerable. Cumulatively considerable means the incremental effects of an individual project are considerable when viewed in connection with the effects of past projects, other current projects, and probable future projects.

A list of projects was assembled by reviewing County files in order to establish a biological resources cumulative study area. This area included projects impacting or potentially impacting the same or similar biological resources as are associated with TM 5276. Because the project's potential for biological impacts are to agricultural drainages and wildlife movement corridors, the cumulative biological impact analysis focuses on these resource types. The cumulative study area includes projects that could impact nearby drainages in the same watershed as TM 5276 because these areas are generally used by wildlife as movement corridors. Additionally, any projects in the cumulative study area that could impact orchards were identified, as orchards can also provide areas for wildlife movements.

Projects included in the biological resources cumulative study area are the subject project (TM 5276), the McNulty Minor Subdivision (TPM 20763), the Woodhead project (TPM 20541), the Dabbs TPM project, the Pfaff project (TPM 21016), the Hukari project (TPM 20830), the Nira Kohl project (TPM 20319), the Brisa del Mar project (TM 5492), the Marquart Ranch project (TM 5410), the Rawhide Ranch project (TPM 20845), the Dressen project (TPM 2072), the Stehly project (Camino Quieto, TPM 20799), the Champagne Lakes project (ER 70-212-02), the Mustafa project (TPM 20811 RPL7), the Fitzpatrick project (TPM 20842), and the Polo Club project (MUP 92-019-M2). Each of these projects includes full mitigation for their respective impacts to biological resources. Attachment C shows the location of each of

these cumulative projects, as well as projects that are relevant to other areas of environmental review associated with the project other than biological resources.

**Wetlands**

The McNulty Minor Subdivision site supports wetlands, but the project proposes a biological open space easement to avoid any impacts to this resource. The Woodhead project also proposes a biological open space easement to avoid impacts to both drainage and wetland areas on the project site. The Mustafa site supports wetlands; however, they will be protected in a biological open space easement and will not be impacted. The Champagne Lakes project will avoid impacts to onsite wetlands through the dedication of a proposed biological open space easement. Similarly, the Fitzpatrick project will avoid impacts to onsite Southern Willow Scrub through the dedication of a biological open space easement and wetland buffer.

The Brisa del Mar project is still under environmental review, but the project may impact wetlands. However; mitigation for potential wetlands impacts would occur in a manner to ensure “no net loss” of habitat, since this is mandated by both Federal law and the County’s RPO. The Rawhide Ranch project has mitigated its potential impacts to biological resources to less than significant through the dedication of a biological open space easement over the onsite SCLORF and the purchase of credits in a mitigation bank. The Polo Club project will result in impacts to 1.6 acres of SCLORF, 3.3 acres of Southern Riparian Forest, and 1.6 acres of Southern Willow Scrub. However, impacts to these wetland habitats will be reduced to below a level of significance through both on and offsite preservation and the implementation of appropriate habitat restoration plans.

All of the projects considered in this cumulative analysis will avoid impacts to wetlands by protecting them in dedicated biological open space or will provide mitigation for any wetland impacts through a combination of on and offsite habitat conservation. Therefore no net loss of wetlands will occur, and no significant cumulative biological impacts will result from the implementation of the subject project in combination with other anticipated development in the area.

**Sensitive Species**

As discussed above, the TM 5276 project has the potential to impact Turkey Vulture foraging habitat. This impact is individually less than significant, since no Turkey Vultures were found roosting or nesting on the project site during multiple site surveys, and its nesting is not present onsite or nearby. The site does not support locally or regionally significant foraging or roosting habitat for this large, wide-ranging species. Other projects in the vicinity with the potential to impact Turkey Vulture include the McNulty Minor Subdivision, the Woodhead project, the Dabbs TPM project, the Pfaff project, the Brisa del Mar project, the Rawhide Ranch project, the Mustafa project, the Fitzpatrick project, the Polo Club project, and the Champagne Lakes project. However, as discussed above, all of these projects either avoid impacts to sensitive species via the protection of habitats that support sensitive plant or animal species in biological

open space, or include mitigation to ensure that their impacts will be less than significant. Therefore, the TM 5276 project will not have cumulatively considerable impacts to sensitive species.

**Wildlife Corridors**

As discussed above, the TM 5276 project has the potential to impact the local wildlife corridor that crosses the northeastern corner of proposed lot #16. However, this impact is less than significant, as the majority of the local wildlife corridor is actually offsite and will not be impacted by the project as designed, and the onsite portion of the corridor will only be minimally impacted by the project in light of the proposed limited building zone proposed in this area. However, cumulative projects in the area were analyzed for the potential loss of wildlife movement caused by the conversion of Orchards and Vineyards to developed areas, as wildlife can utilize the understory of groves for movement. As shown on Attachment C, there are three subdivision cumulative projects that abut the project site on the northwest where similar development occurs between the project site and West Lilac Road (Dabbs – 10 acres of citrus trees and row crops, Stehley – 4 acres of citrus and avocado trees, and Pfaff – 1 acre of non-native grassland).

Otherwise, the cumulative projects do not affect the connectivity of the agricultural lands to the south or west of the project site (Marquart Ranch – 9 acres of avocado trees, Hukari – 7 acres of avocado trees, Nira Kohl – 5 acres of avocado trees, Woodhead – 150 individual avocado trees, Dressen - 2 acres of citrus and avocado trees, and McNulty – 2 acres of orchards and vineyards). In addition, the proposed project will result in the loss of 34.30 acres of citrus and avocado trees. The proposed project, in conjunction with the other cumulative projects that will remove Orchards and Vineyards, will result in a total loss of 150 individual avocado trees and 73.3 acres of Orchards and Vineyards, which are generally used by wildlife as movement corridors. This loss does not represent a significant cumulative impact, since agricultural lands are not a sensitive or biologically-regulated resource, and each of the cumulative projects, including the TM 5276 project, will retain Orchards and Vineyards on their project site. Extensive agricultural uses will still exist within the cumulative study area. Therefore, the TM 5276 project will not have cumulatively considerable impacts to wildlife movement.

**Reduction of Wildlife Populations**

As discussed above, the TM 5276 project has the potential to impact the populations of its resident wildlife species. This impact is individually less than significant because no rare or endangered plant species were identified on the project site, impacts to the single Turkey Vulture observed flying over the site are not significant. No rare or endangered plant or animal species are expected to be dependent on the habitat-types affected by the project as designed. All of the other projects in the vicinity have a potential to impact wildlife populations. However, as discussed above, all of these projects either avoid impacts to wildlife populations via the protection of habitats with the potential to support significant wildlife populations in biological open space, or include mitigation to ensure that their impacts will be less than significant. Therefore, the TM 5276 project will not have cumulatively considerable impacts to wildlife populations.

**MITIGATION**

Lot 16 includes a 100-foot agricultural LBZ to protect the offsite oak riparian forest, which is currently tree crop agriculture. This provides enough distance to reduce most noise impacts that would arise from construction on this lot. However, grading activities on Lot 16 will be assessed for potential to impact sensitive riparian bird breeding should sensitive birds be present. Therefore, as part of the design features for the project, site brushing, grading, and/or the removal of vegetation on Lot 16 from 1 January to 31 August will require a pre-construction nesting survey to preclude sensitive nesting birds in the adjacent riparian areas. If the pre-construction survey indicates the presence of sensitive birds, then a noise report shall be prepared and submitted to the County and shall include measures to reduce noise during construction in the occupied habitat to maintain noise at or below the standard noise levels of 60 dB(A), or the noise producing construction activities shall be prohibited until after the breeding season.

Because the project as designed does not result in any significant impacts to any biological resources, no further mitigation is recommended or required.

Please contact me should you need further information or clarification.

Sincerely,

Vincent N. Scheidt, MA
Certified Biological Consultant

Attachments: Table 1. Flora and Fauna Detected
Table 2. Impact/Mitigation Table
Attachment A. Biological Resources
Attachment B. Sensitive Species Known from the Vicinity
Attachment C. Cumulative Projects Area
Attachment D. Results of a Directed RPO Wetland Survey

**Table 1. Flora and Fauna Detected - West Lilac Farms I & II Tentative Map Project, TM 5276**

| Scientific Name | Common Name |
|---|---|
| Plants | |
| *Acacia dealbata* * | Silver Wattle |
| *Aesculus californica* | California Buckeye |
| *Amaranthus albus* * | White Tumbleweed |
| *Amaranthus* sp. | Tumbleweed |
| *Anagallis arvensis* * | Scarlet Pimpernel |
| *Anigozanthos* sp. * | Kangaroo Pod |
| *Artemisia californica* | California Sagebrush |
| *Baccharis glutinosa* | Mule Fat |
| *Baccharis pilularis* | Coyote Brush |
| *Brachypodium distachyon* * | Purple False-brome |
| *Brassica geniculata* * | Perennial Mustard |
| *Brassica* sp. * | Mustard |
| *Bromus diandrus* * | Ripgut Brome |
| *Bromus mollis* * | Soft Brome |
| *Bromus rubens* * | Foxtail Brome |
| *Camissonia bistorta* | Southern Sun Cup |
| *Chamaesyce maculata* * | Spotted Spurge |
| *Chamaesyce sp.* | Spurge |
| *Chenopodium murale* * | Goosefoot |
| *Chloris* sp.* | Chloris |
| *Cirsium vulgare* * | Bull Thistle |
| *Citrus limon* * | Lemon |
| *Citrus sinensis* * | Orange |
| *Citrus* sp. | Lime |
| *Conyza canadensis* * | Common Horseweed |
| *Cortaderia* sp. * | Pampas Grass |
| *Cynodon dactylon* * | Bermuda Grass |
| *Cyperus alternifolius* * | Umbrella Sedge |
| *Cyperus* sp. | Sedge |
| *Epilobium* sp. | Fireweed |
| *Eremocarpus setigerus* | Dove Weed |
| *Eriogonum fasciculatum* | Flat-top Buckwheat |
| *Erodium cicutarium* * | Red-stem Stork's-bill |
| *Eucalyptus globulus* * | Blue Gum |
| *Festuca megalura* * | Foxtail Fescue |
| *Foeniculum vulgare* * | Wild Anise |
| *Hedypnois cretica* * | Hedypnois |
| *Heliotropium curvassavicum* | Wild Heliotrope |
| *Heterotheca grandiflora* * | Telegraph Weed |
| *Lactuca serriola* * | Wild Lettuce |
| *Lantana* sp.* | Lantana |
| *Lonicera subspicata* | Wild Honeysuckle |
| *Lotus scoparius* | Deer weed |
| *Lotus* sp. | Lotus |
| *Malosma laurina* | Laurel Sumac |
| *Malva parviflora* * | Cheeseweed |
| *Melilotus albus* * | White Sweet Clover |
| *Melilotus indicus* * | Indian Sweet Clover |
| *Melilotus* sp. * | Sweet Clover |
| *Mesembryanthemum edule* * | Hottentot Fig |

**Table 1. Flora and Fauna Detected - West Lilac Farms I & II Tentative Map Project, TM 5276**

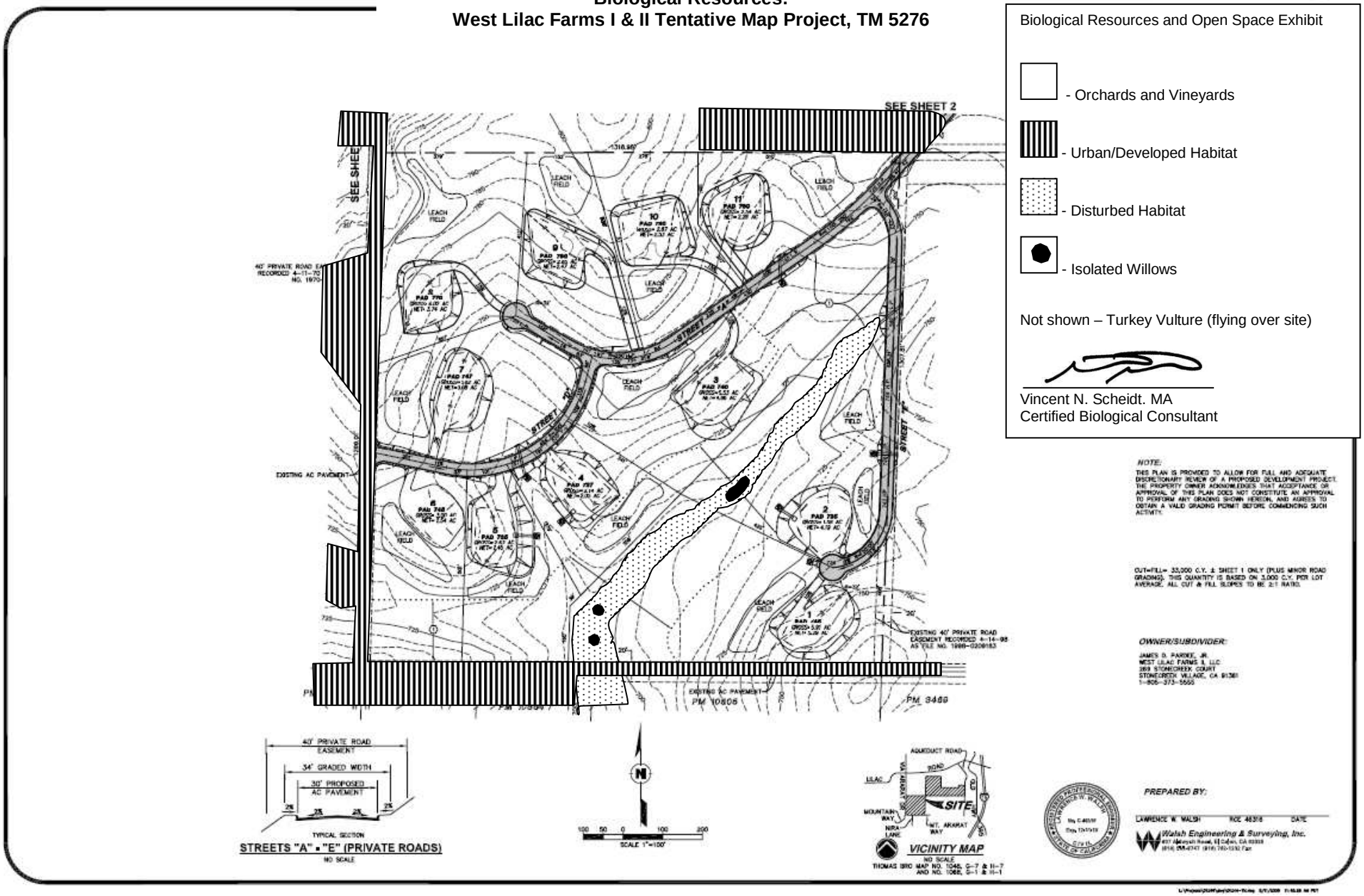
| Scientific Name | Common Name |
|---|---|
| Plants, cont | |
| *Nicotiana glauca* * | Tree Tobacco |
| *Opuntia ficus-indica* * | Indian Fig |
| *Opuntia ficus-indica* * | Indian Fig |
| *Oryzopsis miliacea* * | Indian Rice Grass |
| *Panicum capillare** | Western Witch Grass |
| *Persea americana* * | Avocado |
| *Phalaris* sp. * | Canary Grass |
| *Picris echioides* * | Bristly Ox-tongue |
| *Polygonum arenastrum* * | Yard Knotweed |
| *Polypogon monspeliensis* * | Rabbitfoot Grass |
| *Protea* sp. | Protea |
| *Quercus agrifolia* | Coast Live Oak |
| *Raphanus sativus* * | Wild Radish |
| *Rumex salicifolius* | California Dock |
| *Rumex crispus* | Curly Dock |
| *Salix lasiolepis* | Arroyo Willow |
| *Salix gooddingii* | Southwestern Willow |
| *Salsola pestifer* * | Russian Thistle |
| *Solanum americanum* | White Nightshade |
| *Sonchus oleraceus* * | Sow Thistle |
| *Stephanomeria virgata* | Stephanomeria |
| *Tamarix* sp. * | Salt Cedar |
| *Typha latifolia* | Cattails |
| Birds | |
| *Archilochus anna* | Anna's Hummingbird |
| *Archilochus sp.* | Hummingbird |
| *Carpodacus mexicanus* | Housefinch |
| ***Cathartes aura*** | **Turkey Vulture** |
| *Pipilo crissalis* | California Towhee |
| *Sayornis nigricans* | Black Phoebe |
| *Zenaida macroura* | Mourning Dove |
| Mammals | |
| *Spermophilus beecheyi* | California Ground Squirrel |
| *Thomomys bottae* | Valley Pocket Gopher |
| Reptiles | |
| *Uta stansburiana* | Side-blotched Lizard |
| Insects | |
| *Papilio rutulus* | Western Tiger Swallowtail |
| *Pontia protodice* | Common White |

* denotes non-native species
**bold** denotes sensitive species

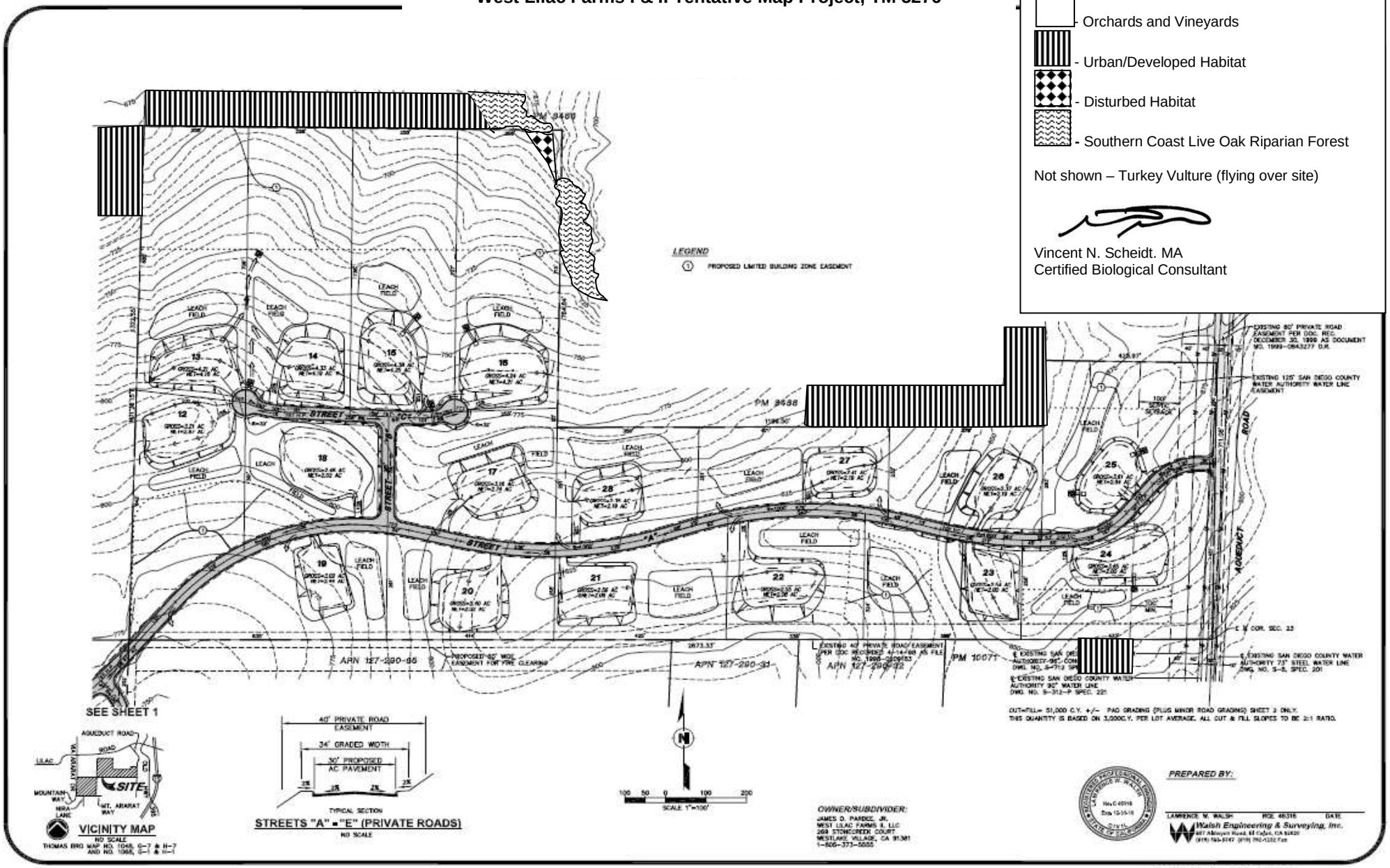
**Table 2. Impact/Mitigation Analysis - West Lilac Farms I & II Tentative Map Project, TM 5276**

| Habitat Type | Existing Acreage | Acreage Impacted | Acreage Impact Neutral |
|---|---|---|---|
| Urban/Developed | offsite | n/a | n/a |
| Southern Coast Live Oak Riparian Forest | offsite | n/a | n/a |
| Disturbed Habitat | 1.85 acres | 1.85 acres | none |
| Orchards and Vineyards | 90.93 acres | 34.30 acres | 56.63 acres |

**Attachment A**
**Biological Resources:**
**West Lilac Farms I & II Tentative Map Project, TM 5276**



**Attachment A**
**Biological Resources:**
**West Lilac Farms I & II Tentative Map Project, TM 5276**



Attachment B. Sensitive Species known from the Vicinity:

West Lilac Farms I & II Tentative Map Project, TM 5276

| Latin | Common | Federally Endangered | Federally Threatened | State Endangered | State Threatened | Coastal Sage Scrub | Mixed Chaparral | Grassland | Riparian | Oak Woodland | Chamise Chaparral | Mixed Conifer | Closed Cone Forest | Piñon-Juniper | Freshwater Marsh | Desert Scrub | Desert Wash | Salt or Alkali Marsh | Vernal Pools | Montane Meadow | Coastal or Desert Dune | Lakes and Bays | **Probability of Occurrence** |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| *Adolphia californica* | San Diego adolphia | | | | | X | | X | | | | | | | | | | | | | | | **L** |
| *Brodiaea orcuttii* | Orcutt's brodiaea | | | | | | | X | X | X | X | | | | | | | | X | | | | **L** |
| *Clarkia delicata* | Campo clarkia | | | | | | | | | X | | | | | | | | | | | | | **L** |
| *Harpagonella palmeri* | Palmer's grappling hook | | | | | X | | X | | | X | | | | | | | | | | | | **L** |
| *Ophioglossum californicum* | California adder's tongue fern | | | | | | X | X | | | | | | | | | | | X | | | | **L** |
| *Piperia cooperi* | Cooper's rein orchard | | | | | X | X | X | | X | X | X | | | | | | | | X | X | | **L** |
| *Pipera liptopetala* | Narrow-petaled rein orchard | | | | | X | X | X | | X | X | X | | | | | | | | X | X | | **L** |
| *Quercus engelmannii* | Engelmann oak | | | | | | | | X | X | | | | | | | | | | | | | **L** |
| *Danaus plexippus* | Monarch butterfly | | | | | | | X | | X | | | | | | | | | | X | | | **M** |
| *Bufo microscaphus californicus* | Arroyo toad | X | | | | X | X | X | X | X | X | | | | | | | | | X | | | **L** |
| *Rana aurora draytoni* | California red -legged frog | | X | | | | | | X | | | | | | X | | | | | X | | X | **L** |
| *Coleonyx variegatus abbottii* | San Diego banded gecko | | | | | X | | X | | | X | | | | | | | | | | | | **L** |
| *Phrynosoma coronatum blainvillei* | San Diego horned lizard | | | | | X | X | X | X | | X | X | | | | | | | | | | | **L** |
| *Cnemidophorus hyperythrus* | Orange-throated whiptail | | | | | X | X | X | X | | X | | | | | | | | | | | | **L** |
| *Cnemidophorus tigris multiscutatus* | Coastal western whiptail | | | | | | X | | X | X | X | | | | | | | | | | | | **M** |
| *Anniella pulchra pulchra* | Silvery legless lizard | | | | | X | | X | X | | | | | | | | | | | | X | | **M** |
| *Charina trivirgata roseofusca* | Coastal rosy boa | | | | | X | X | | | X | X | | | | | | | | | | | | **L** |
| *Diadophis punctatus similis* | San Diego ringneck snake | | | | | X | X | | X | X | X | X | X | | | | | | | | | | **M** |
| *Thamnophis sirtalis ssp. Novum* | South Coast garter snake | | | | | | | | X | | | | | | X | | | | | | | | **L** |
| *Thamnophis hammondii* | Two stripe garter snake | | | | | | | | X | | | | | | X | | | | | | | | **M** |
| *Myotis yumanensis* | Yuma myotis | | | | | X | X | X | X | X | X | X | X | X | X | | | X | X | X | | X | **M** |
| *Myotis ciliolabrum* | Small-footed myotis | | | | | | X | | X | X | X | X | X | X | | | X | | | X | | | **M** |
| *Corynorhinus townsendii* | Townsend's big-eared bat | | | | | | X | X | X | X | X | X | X | X | | X | X | | | X | | | **M** |
| *Antrozous pallidus* | Pallid bat | | | | | X | X | X | X | X | X | X | X | X | | X | X | | | X | | | **M** |
| *Nyctinomops femorosaccus* | Pocketed free-tailed bat | | | | | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | | X | **M** |
| *Nyctinomops macrotis* | Big free-tailed bat | | | | | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | | X | **M** |
| *Eumops perotis californicus* | Greater western mastiff bat | | | | | X | X | X | X | X | X | X | X | X | X | X | X | X | X | X | | X | **M** |
| *Lasiurus blossevillii* | Western red bat | | | | | | | | X | X | | X | X | | | | | | | X | | | **M** |
| *Lepus californicus bennettii* | San Diego black-tailed jackrabbit | | | | | X | X | X | | X | X | X | X | | | | | | | | | | **M** |
| *Chaetodipus californicus femoralis* | Dulzura California pocket mouse | | | | | X | X | X | | X | X | X | | | | | | | | | | | **M** |
| *Dipodomys stephensi* | Stephen's kangaroo rat | X | | | X | X | | X | | | | | | | | | | | | | | | **L** |
| *Neotoma lepida intermedia* | San Diego desert woodrat | | | | | X | | | X | X | X | | | | | | | | | | | | **L** |
| *Onychomys torridus ramona* | Southern grasshopper mouse | | | | | X | X | X | | | X | | | | | | | | | | | | **L** |
| *Taxidea taxus* | American badger | | | | | X | X | X | | X | X | X | | X | | X | X | | | X | | | **L** |
| *Odocoileus hemionus* | Southern mule deer | | | | | X | X | X | X | X | X | X | X | X | | X | X | | | X | | | **L** |
| *Accipiter cooperi* | Cooper's hawk | | | | | | | X | X | X | | | | | | | | | | | | | **L** |
| *Accipiter striatus* | Sharp-shinned hawk | | | | | X | | | | X | | X | | | | | | | | | | | **M** |
| *Ammodramus savannarum* | Grasshopper sparrow | | | | | | | X | | | | | | | | | | | | | | | **M** |
| *Aquila chrysaetos* | Golden eagle | | | | | X | X | X | | X | X | X | X | X | | | | | | | | | **L** |
| *Ardea herodias* | Great blue heron | | | | | | | X | | | | | | | X | | | | | | | X | **M** |

Attachment B. Sensitive Species known from the Vicinity:

West Lilac Farms I & II Tentative Map Project, TM 5276

| Latin | Common | Federally Endangered | Federally Threatened | State Endangered | State Threatened | Coastal Sage Scrub | Mixed Chaparral | Grassland | Riparian | Oak Woodland | Chamise Chaparral | Mixed Conifer | Closed Cone Forest | Piñon-Juniper | Freshwater Marsh | Desert Scrub | Desert Wash | Salt or Alkali Marsh | Vernal Pools | Montane Meadow | Coastal or Desert Dune | Lakes and Bays | **Probability of Occurrence** |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| *Buteo lineatus* | Red-shouldered hawk | | | | | | | | X | X | | | | | | | | | | | | | **M** |
| *Cathartes aura* | Turkey vulture | | | | | X | X | X | X | X | X | X | X | | | | | | | | | | **O** |
| *Elanus caeruleus* | Black-shouldered kite | | | | | | | X | X | | | | | | | | | | | | | | **M** |
| *Empidonax trailii extimus* | Southwestern willow flycatcher | X | | | | | | | X | | | | | | | | | | | | | | **L** |
| *Eremophila alpestris actis* | Horned lark | | | | | | | X | | | | | | | | | | | | X | | | **M** |
| *Ictera virens* | Yellow-breasted chat | | | | | | | | X | | | | | | | | | | | | | | **M** |
| *Lanius ludovicianus* | Loggerhead shrike | | | | | X | | X | X | X | | | | | | X | X | | | | | | **M** |
| *Sialia mexicana* | Western bluebird | | | | | | | | X | X | | | | | | | | | | | | | **M** |
| *Tyto alba* | Common barn-owl | | | | | | | | X | X | | | | | | | | | | | | | **M** |
| *Vireo bellii pusillus* | Least Bell's vireo | X | | X | | | | | X | | | | | | | | | | | | | | **L** |

**PROBABILTY OF OCCURRENCE CODES:**

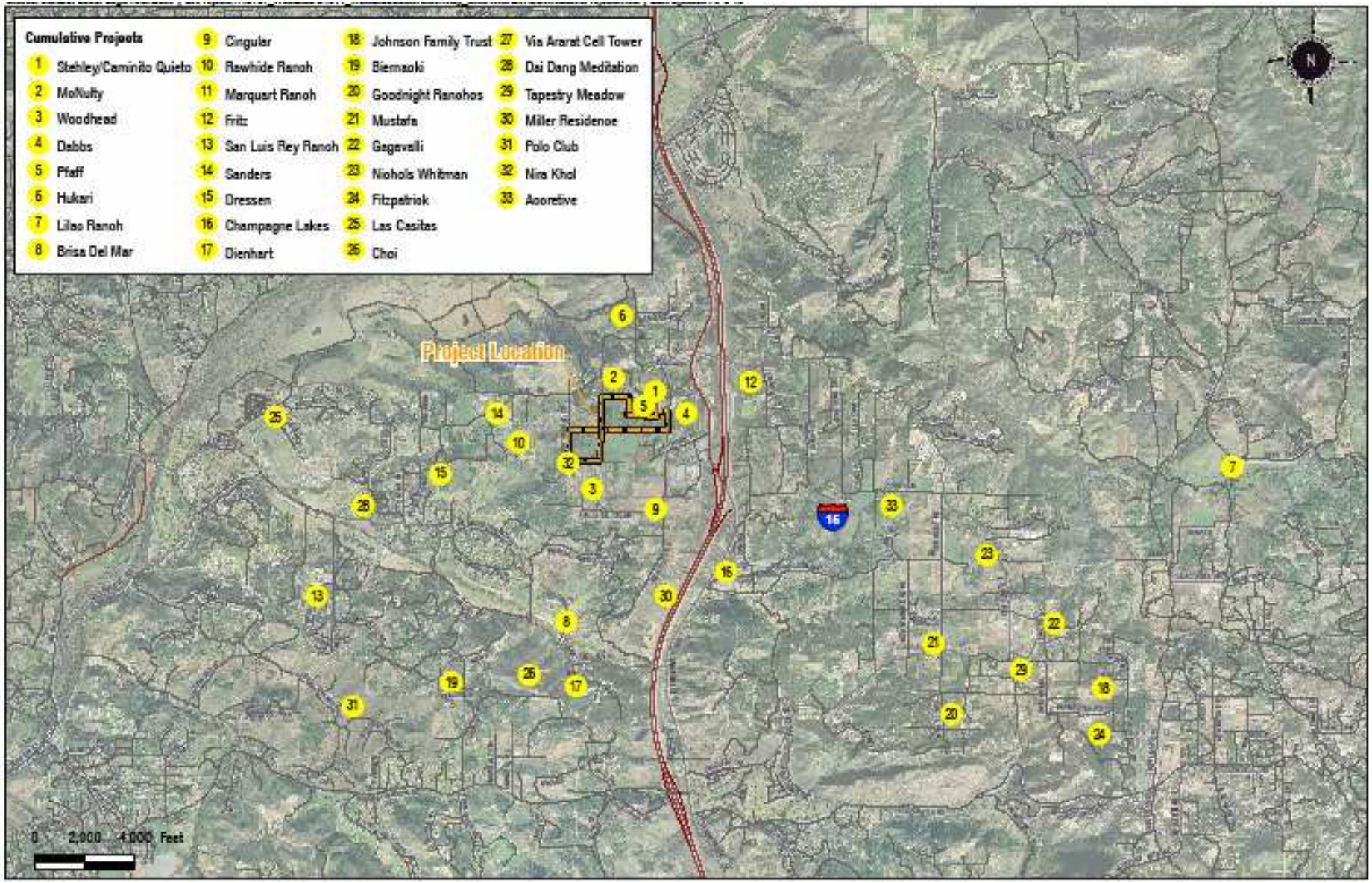
**L** – Low Probability; rare species in area, and no significant habitat (animals), *or* distinctive perennial that would not have been missed if present onsite (plants). Most of these species occur on habitat not found on the TM 5276 site, including vernal pools, native grasslands, mafic soils, etc. Campo Clarkia and Least Bell's Vireo are two examples of species that fit into this category. Both are very rare in San Diego County.

**M** – Moderate Probability; could be expected to occur onsite on at least an occasional basis, based on habitat quality (animals), *or* could occur onsite, but rare, and/or poorly known (plants). Most of these species occur in habitat similar to that found onsite, although they may or may not utilize the TM 5276 property. Native bats and uncommon but cryptic reptiles are examples of species that have a moderate probability of occurring onsite.

**H** – High Probability; certain to occur onsite on a regular basis (animals), but cryptic, *or* ephemeral species known from the immediate vicinity, but seasonal in occurrence (plants). Most of these species are expected to use the site, but are difficult to reliably detect. Examples include various fossorial reptiles, wide-ranging species, etc.

**O** – Observed; see text for discussion.

Attachment C.
Cumulative Projects Area: West Lilac Farms I & II Tentative Map Project, TM 5276



Attachment D. Results of a Directed RPO Wetland Survey for the West Lilac I and II Project, TM 5276

# VINCENT N. SCHEIDT
## Biological Consultant

3158 Occidental Street • San Diego, CA • 92122-3205 • 858-457-3873 • 858-457-1650 fax • email: vince@san.rr.com


Revised August 12, 2009
~~June 24, 2008~~

Mr. Jim Pardee
267 Stonecreek Court
Westlake Village, CA 91361

**RE: Results of a directed RPO Wetland Survey for the West Lilac I and II Project, TM 5276**

Dear Mr. Pardee:

This report presents the results of a directed Resource Protection Ordinance (RPO) wetland survey of the West Lilac I and II project site (TM 5276). The project site is located south of West Lilac Road, east of Via Ararat Drive, and west of Aqueduct Road in the Bonsall area of unincorporated San Diego County (Figure 1).

The purpose of this study was to determine the status and delineate the exact RPO wetland boundary of two ephemeral drainages, one of which crosses the eastern portion of the West Lilac I parcel (APN 127-290-05), and one of which clips the central northern corner of the West Lilac II parcel (APN 127-271-28). As you know, we had completed a previous biological assessment of this site in August of 2001.

In order to conduct a directed RPO wetland survey of the TM 5276 project site, Julia Groebner, Associate Biologist, and I visited the property on 24 June 2008. Weather conditions were suitable for surveying, with clear skies, temperatures in the mid 70°s, and a light westerly breeze. Both drainages were examined for the presence of RPO wetland indicators in order to determine their status and exact limits. Transects were established at 50′ lengths all along the lengths of the drainages in order to map wetland limits. The results of that mapping are illustrated on the attached RPO Wetland Exhibit (Figure 2). Ms. Groebner and I revisited the site on 30 July 2009 to reassess the original RPO wetland mapping. Weather conditions at that time were suitable for field surveying, with clear skies, temperatures in the low 80˚s, and a light westerly breeze.

### County RPO Wetland Definition

The County recently (2007) revised its definition of an RPO wetland. The older RPO definition was much more inclusive; under the revised definition, many areas that were formerly considered County wetlands are no longer defined as such.

The County's current RPO defines "Wetlands" as follows:

*(1) Lands having one or more of the following attributes are "wetlands":*

*(aa) At least periodically, the land supports a predominance of hydrophytes (plants whose habitat is water or very wet places);*

*(bb) The substratum is predominantly undrained hydric soil; or*

*(cc) An ephemeral or perennial stream is present, whose substratum is predominately non-soil and such lands contribute substantially to the biological functions or values of wetlands in the drainage system.*

*(2) Notwithstanding paragraph (1) above, the following shall not be considered "Wetlands":*

*(aa) Lands which have attribute(s) specified in paragraph (1) solely due to man-made structures (e.g., culverts, ditches, road crossings, or agricultural ponds), provided that the Director of Planning and Land Use determines that they:*

*(i) Have negligible biological function or value as wetlands;*

*(ii) Are small and geographically isolated from other wetland systems;*

*(iii) Are not Vernal Pools; and,*

*(iv) Do not have substantial or locally important populations of wetland dependent sensitive species.*

*(bb) Lands that have been degraded by past legal land disturbance activities, to the point that they meet the following criteria as determined by the Director of Planning and Land Use:*

*(i) Have negligible biological function or value as wetlands even if restored to the extent feasible; and,*

*(ii) Do not have substantial or locally important populations of wetland dependent sensitive species.*

**Results – RPO Wetland Survey**

The drainage on the West Lilac I parcel (Drainage 1) consists of a shallow swale that crosses the site in a southwest-northeast direction. This drainage is vegetated with mostly weedy upland species, including Perennial Mustard (*Brassica geniculata*), Ripgut Brome (*Bromus diandrus*), Tree Tobacco (*Nicotiana glauca*), Indian Fig (*Opuntia ficus-indica*), Curly Dock (*Rumex crispus*), Bristly Ox-tongue (*Picris echioides*), and Wild Radish (*Raphanus sativus*). The central portion of the drainage supports a handful of scrubby Southwestern Willows (*Salix gooddingii)*. Over the vast majority of its length, the drainage does not support a bed and bank, "ordinary high water mark" (OHWM), hydric soils, or hydrophytic vegetation. This drainage appears to be an erosional feature created entirely by run-off from the surrounding agriculture.

A separate drainage (Drainage 2) clips the central northern corner of the West Lilac II parcel and continues offsite to parallel the northern and eastern property boundaries for a short distance. The onsite portion of the drainage consists of a shallow, low-lying area that supports a variety of mostly upland weeds. The hydrophytic vegetation in this area is limited to White Watercress (*Rorippa nasturtium-aquaticum*), Canary Grass (*Phalaris* sp.), and a few Mule Fat (*Baccharis glutinosa*) and Salt Cedar (*Tamarix* sp.) shrubs. It appears that this area is being maintained as part of the agriculture that is present directly to the west, in the form of a stand of Silver Dollar Gum trees (*Eucalyptus* sp). During the 2009 field visit, a leaking irrigation pipe was observed in this area, which, at least in part, may explain the presence of the occasional hydrophytes. This low-lying area does not exhibit signs of bed and bank or OHWM and it is not dominated by hydrophytic vegetation.

Offsite to the north and east of the onsite low-lying area, Drainage 2 is vegetated with Southern Coast Live Oak Riparian Forest (SCLORF). Indicators in this habitat-type include mature Coast Live Oaks (*Quercus agrifolia*) and Arroyo Willows (*S. lasiolepis*) over an understory of Desert Grape (*Vitis girdiana*) and others, with species such as Mule Fat and Cattails *(Typha latifolia)* found in the floodway of the drainage. The sections of the drainage that support SCLORF also support an incised channel that is approximately 6 feet wide. The floodway of the drainage and the SCLORF associated with the drainage are located offsite and do not extend into the project site.. This is clearly illustrated in Figure 2.

<u>County Wetlands</u>

No portions of <u>Drainage 1</u> qualify as supporting RPO wetlands under the County's 2007 RPO wetland definition, for the following reasons:

- The drainage **does not** support a predominance of plants whose habitat is water or very wet places. Most of the vegetation in this drainage consists of weedy upland species, including Perennial Mustard, Ripgut Brome, Tree Tobacco, Indian Fig, and Wild Radish. None of these are hydrophytes. Although a handful of scrubby willows are present, they are do not dominate the habitat and appear to be dependent on irrigation runoff.
- The drainage **does not** support a substratum is predominantly undrained hydric soil. The substrate appears to consist of well-drained loam soils.
- The drainage **does not** consist of an ephemeral or perennial stream whose substratum is predominately non-soil. Over the majority of its length the drainage does not exhibit signs of wetlands hydrology, such as bed and bank or OHWM.

The offsite floodway area of <u>Drainage 2</u> appears to qualify as supporting RPO wetlands. This area meets at least one of the criteria in the County's 2007 RPO wetland definition, as follows:

- The floodway of the drainage **does** support a clear predominance of aquatic and hydrophytic species, such as Mule Fat and Cattails.

The low-lying (onsite) area and the portion of the SCLORF that is outside of the floodway **do not** appear to qualify as supporting RPO wetlands under the County's 2007 RPO wetland definition, for the following reasons:

- These areas **do not** support a predominance of plants whose habitat is water or very wet places. Most of the vegetation in the low-lying area consists of upland vegetation. Although scattered hydrophytes are present in this area, they do not dominate the vegetation.
- These areas **do not** support a substratum is predominantly undrained hydric soil. The low-lying area and the portion of SCLORF that is outside of the floodway are characterized by loam soils with some clay.
- These areas **do not** consist of an ephemeral or perennial stream, whose substratum is predominately non-soil. Neither the low-lying area nor the portion of SCLORF that is outside of the floodway exhibit signs of wetlands hydrology, such as bed and bank or OHWM.

**Conclusions and Recommendations**

Because the RPO wetland and SCLORF associated with Drainage 2 are located offsite and do not extend into the project site, the County has indicated that it will not be necessary to place a biological open space easement over this area. However, a 100-foot Limited Building Zone (LBZ) easement extending outward from the central northern corner of the West Lilac II proposed parcel #16 is recommended in order to prevent fire clearing impacts to the offsite RPO wetland and SCLORF (Figure 2). This LBZ may be subsumed into a larger agricultural LBZ. The project also includes the implementation of all necessary BMPs, both during and post construction, in order to preclude potential indirect impacts to the offsite RPO wetland and SCLORF caused by grading and home occupation.

The incorporation of these features into the project design will ensure that the project will **not impact** the offsite RPO wetland or SCLORF.

Thank you for the opportunity to provide this study. Please contact us should you need further information or clarification.

Sincerely,

Vincent N. Scheidt, MA
Certified Biological Consultant

Attachments: Figure 1. Site Location
Figure 2. RPO Wetland Exhibit
Attachment A. Site Photos showing Drainages

**Figure 1. Site Location – TM 5276, Bonsall**
**Portion of the U.S.G.S. "Bonsall" 7.5′ Quadrangle Map**

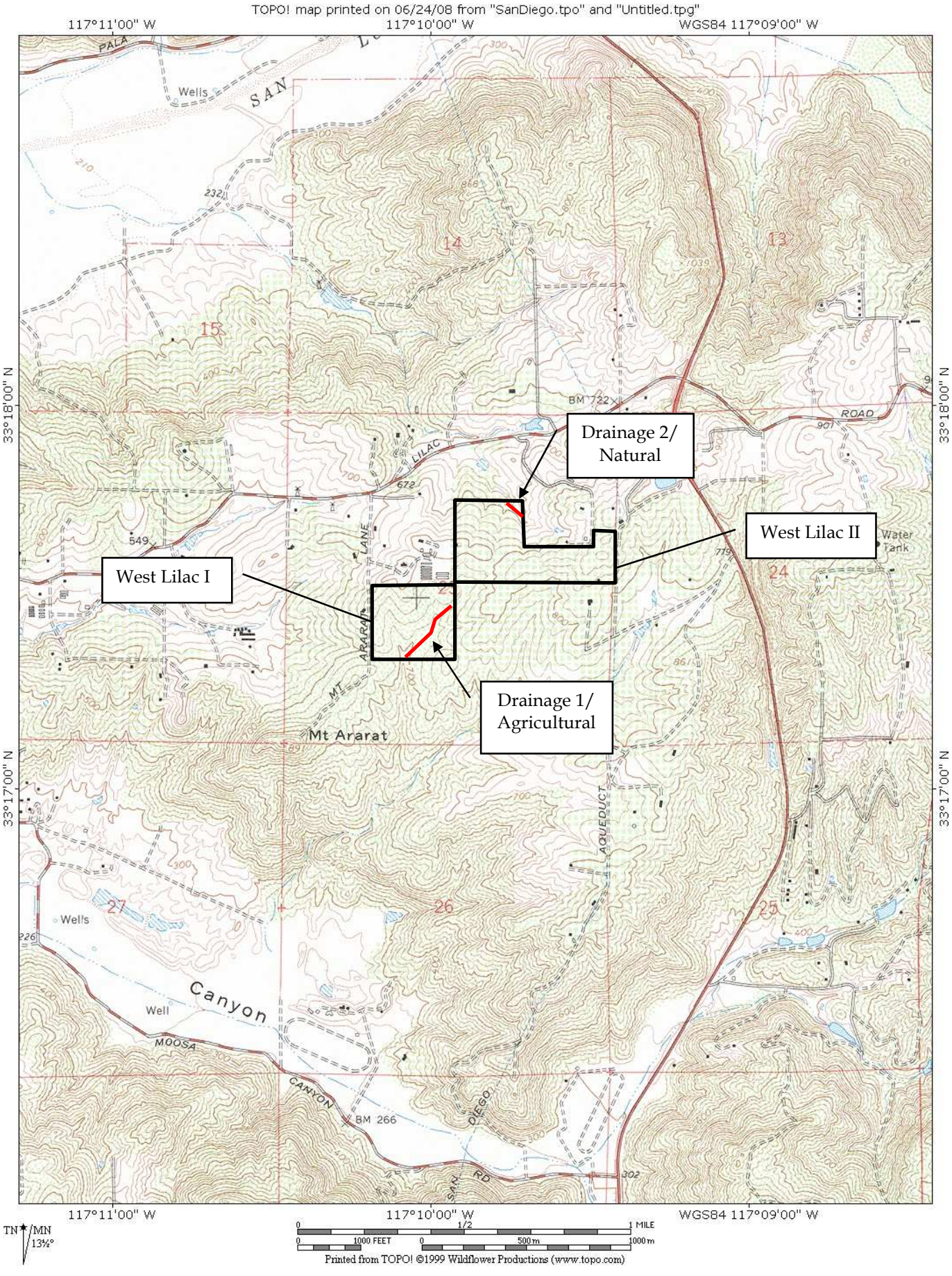
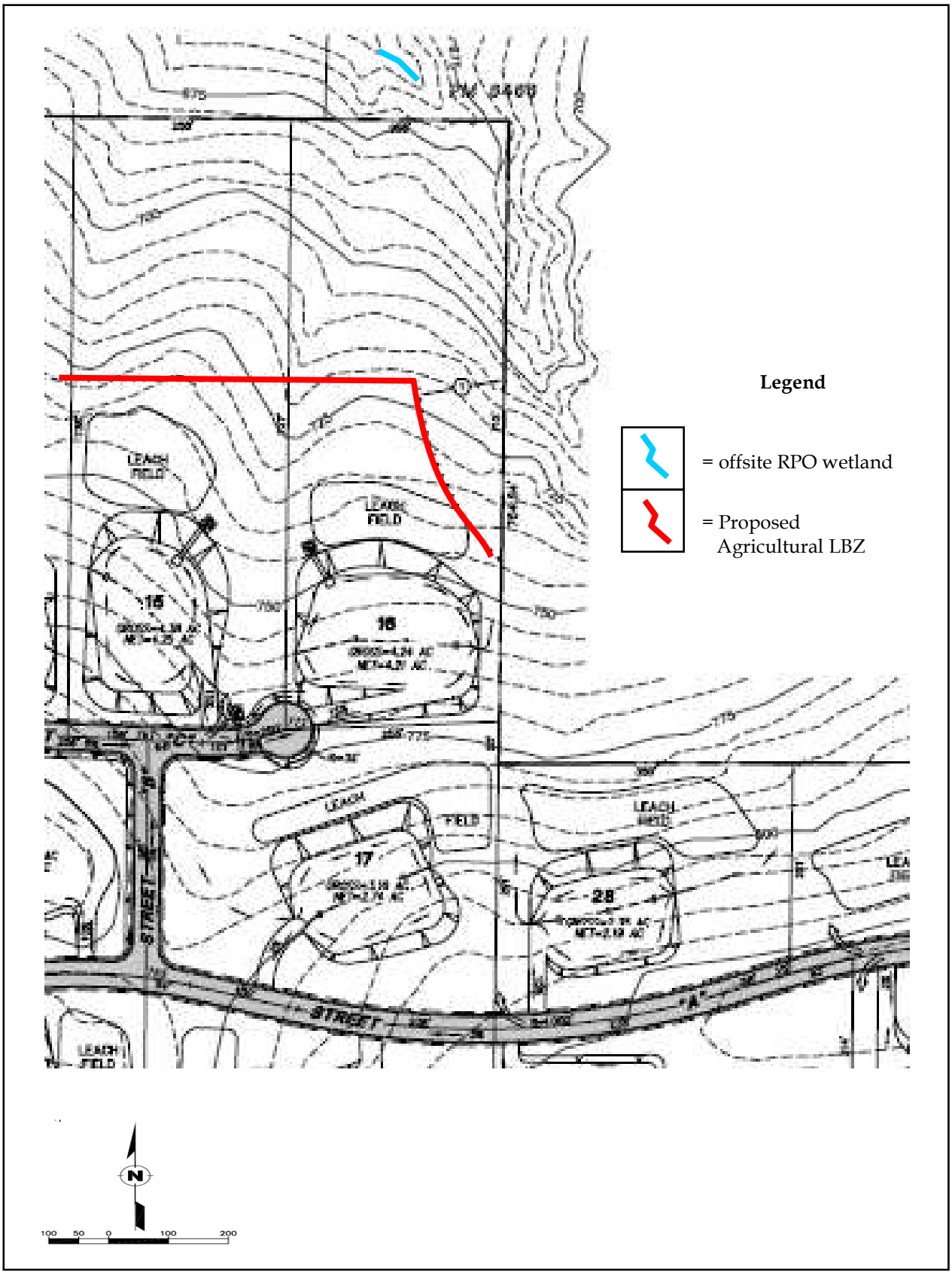


**Figure 2. RPO Wetland Exhibit - Drainage 2**



**Attachment A. Site Photos showing Drainages**

Photo 1. Drainage 1 - photo looking northeast up the drainage. The drainage is dominated by upland species, including Ripgut Brome and Bristly Ox-tongue, which are depicted in this photo. Note that the drainage consists of a gentle swale without a defined bed and bank or OHWM.

Photo 2. Scrubby willows in the center of this drainage. These appear to be opportunistic on runoff from the adjoining grove and are not reflective of an RPO wetland. All of the associated vegetation is upland.

Photo 3. Drainage 2 - photo taken of the offsite portion of the drainage directly east of the West Lilac II property. The floodway of the drainage consists of an incised channel approximately 6 feet wide supporting RPO wetlands. Hydrophytic vegetation in the drainage consists primarily of Mule Fat and Cattails.

Photo 4. Drainage 2 - photo looking north at the low-lying area of the drainage. This portion of the drainage is onsite, although the SCLORF in the background is offsite. Note the predominance of weedy, upland vegetation in this area and the presence of agriculture directly to the west of the drainage. This area does not qualify as an RPO wetland.