

Initial Study/Mitigated Negative Declaration Golden Meadows Parkway Tanks Project Menifee, California

Prepared for Eastern Municipal Water District 2270 Trumble Road Perris, CA 92572-8300

Prepared by RECON Environmental, Inc. 3111 Camino del Rio North, Suite 600 San Diego, CA 92108 P 619.308.9333

August 15, 2022

TABLE OF CONTENTS

1.0	Intro	duction	1
2.0	Proje	ect Description	2
3.0	Draft	Mitigated Negative Declaration	11
4.0	Initial	l Study Checklist	12
	4.1	Aesthetics	13
	4.2	Agriculture and Forestry Resources	19
	4.3	Air Quality	21
	4.4	Biological Resources	32
	4.5	Cultural Resources	39
	4.6	Energy	43
	4.7	Geology and Soils	44
	4.8	Greenhouse Gas Emissions	48
	4.9	Hazards and Hazardous Materials	50
	4.10	Hydrology and Water Quality	53
	4.11	Land Use and Planning	57
	4.12	Mineral Resources	58
	4.13	Noise	59
	4.14	Population and Housing	66
	4.15	Public Services	67
	4.16	Recreation	68
	4.17	Transportation/Traffic	69
	4.18	Tribal Cultural Resources	71
	4.19	Utilities and Service Systems	74
	4.20	Wildfire	76
	4.21	Mandatory Findings of Significance	78
5.0	Prepa	arers	80
6.0	Sourc	ces Consulted	80

TABLE OF CONTENTS (cont.)

FIGURES

Regional Location	3
Project Location on USGS Map	4
Project Location on Aerial Photograph	5
Project Site Plan	6
Proposed Project in Relation to Detention Basin	9
Key Observation Points	15
KOP 1 Existing Conditions and KOP 1 Visual Simulation	16
KOP 6 Existing Conditions and KOP 6 Visual Simulation	17
KOP 10 Existing Conditions and KOP 10 Visual Simulation	18
Sensitive Biological Resources	35
ES	
SCAQMD Air Quality Significance Thresholds – Mass Daily Thresholds	23
Summary of Maximum Buildout Construction Emissions	26
Localized Construction Emissions	26
Summary of Maximum Buildout Operational/Maintenance Emissions	27
Vegetation Communities within Biological Survey AreaArea	33
Impacts to Vegetation Communities	34
Summary of Total Construction GHG Emissions	49
Summary of Total Project GHG Emissions	49
Construction Equipment Noise Levels	61
Construction Noise Levels at Nearest Residential Use	62
Predicted Blasting Vibration Levels by Charge Weight	65
Assembly Bill 52 Consultation	72
	Project Location on USGS Map Project Location on Aerial Photograph Project Site Plan Proposed Project in Relation to Detention Basin Key Observation Points KOP 1 Existing Conditions and KOP 1 Visual Simulation KOP 6 Existing Conditions and KOP 6 Visual Simulation KOP 10 Existing Conditions and KOP 10 Visual Simulation Sensitive Biological Resources SCAQMD Air Quality Significance Thresholds – Mass Daily Thresholds Construction Equipment Summary of Maximum Buildout Construction Emissions Localized Construction Emissions Summary of Maximum Buildout Operational/Maintenance Emissions Vegetation Communities within Biological Survey Area Impacts to Vegetation Communities Summary of Total Construction GHG Emissions Summary of Total Project GHG Emissions Construction Equipment Noise Levels Construction Noise Levels at Nearest Residential Use Predicted Blasting Vibration Levels by Charge Weight

APPENDICES (Under Separate Cover)

- A: Air Quality and Greenhouse Gas CalEEMod Emission Calculation Output, RECON Environmental, Inc.
- B: Biological Resources Assessment, L&L Environmental, Inc.
- C: Phase 1 Cultural Resources Assessment, L&L Environmental, Inc.
- D: Geotechnical Report, Leighton and Associates, Inc.
- E: Water Quality Management Plan and Hydrology Analysis, Hunsaker and Associates

1.0 Introduction

This Initial Study/Mitigated Negative Declaration (IS/MND) has been prepared in accordance with relevant provisions of the California Environmental Quality Act (CEQA) of 1970, as amended, and the CEQA Guidelines, as revised. This IS/MND evaluates the environmental effects of the proposed Golden Meadows Parkway Tanks Project (project).

The IS/MND includes the following components:

- A Draft MND and the formal findings made by the Eastern Municipal Water District (District)
 that the project would not result in any significant effects on the environment, as identified
 in the CEQA IS Checklist.
- A detailed project description.
- The CEQA IS Checklist, which provides standards to evaluate the potential for significant environmental impacts from the project and is adapted from Appendix G of the CEQA Guidelines. The project is evaluated in 21 environmental issue categories to determine whether the project's environmental impacts may be significant in any category. Brief discussions are provided that further substantiate the project's anticipated environmental impacts in each category.

Because the project fits into the definition of a "project" under Public Resources Code Section 21065 requiring discretionary approvals by the District, and because it could result in a significant effect on the environment, the project is subject to CEQA review. The IS Checklist was prepared to determine the appropriate environmental document to satisfy CEQA requirements: an Environmental Impact Report (EIR), a Mitigated Negative Declaration (MND), or a Negative Declaration (ND). The analysis in this IS Checklist supports the conclusion that the project may result in significant environmental impacts, but (1) revisions in the project plans or proposals made by or agreed to by the applicant before a proposed MND and IS are released for public review would avoid the effects or mitigate the effects to appoint where clearly no significant effects would occur, and (2) there is no substantial evidence, in light of the whole record before the District, that the project as revised may have a significant effect on the environment; therefore, an MND has been prepared.

This IS/MND will be circulated for 30 days for public and agency review, during which time individuals and agencies may submit comments on the adequacy of the environmental review. Following the public review period, the District's Board will consider any comments received on the IS/MND when deciding whether to adopt the MND.

2.0 Project Description

1. Project Name:

Golden Meadows Parkway Tanks Project

2. Lead Agency:

Eastern Municipal Water District 2270 Trumble Road Perris, CA 92570

3. Contact Person and Phone Number:

Joseph Broadhead
Principal Water Resource Specialist – CEQA/NEPA
Eastern Municipal Water District
2270 Trumble Road
Perris, CA 92572-8300
(951) 928-3777
broadhej@emwd.org

4. Project Location:

The Golden Meadows Parkway Tanks Project (project) is located on a 5.6-acre portion of a larger 206.8-acre residential development project, Tract 31194, known as "Golden Meadows." The project site is located in the city of Menifee, which is in the southwestern region of Riverside County, California (Figures 1 through 3). The project site is bounded by Daniel Road to the north, Ascot Way to the east, Wickerd Road to the south, and Evans Road to the west. Site access would be from the proposed road, Golden Meadows Parkway. The project site is located within the San Jacinto watershed portion of the Santa Ana River.

Project Applicant/Sponsor:

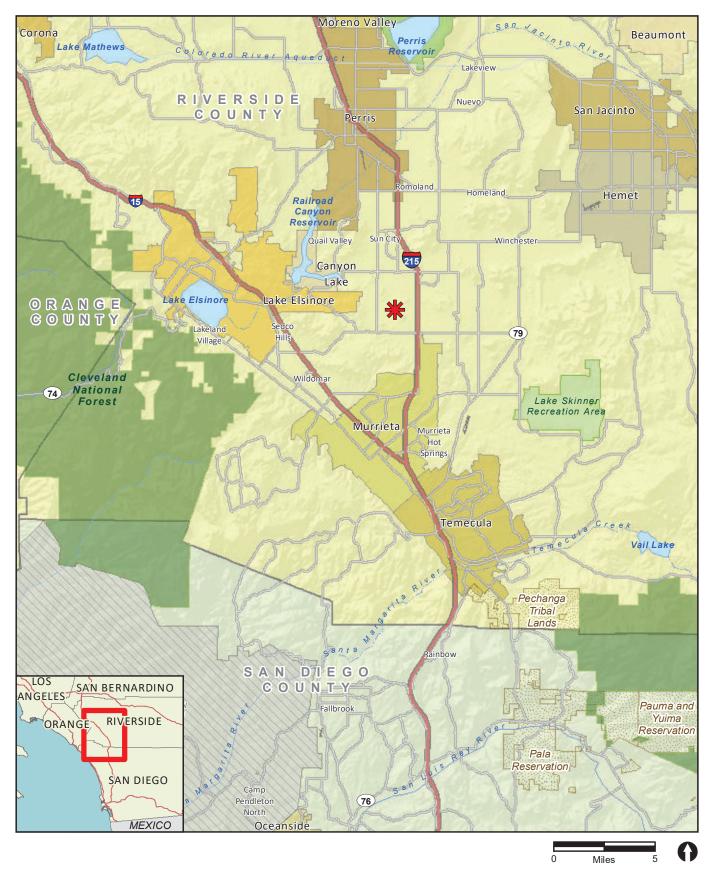
Eastern Municipal Water District 2270 Trumble Road Perris, CA 92572-8300

6. General Plan Designation:

The project site is designated as Rural Residential in the City of Menifee (City) General Plan (General Plan). The area surrounding the project site is designated as Residential and Rural Residential in the General Plan.

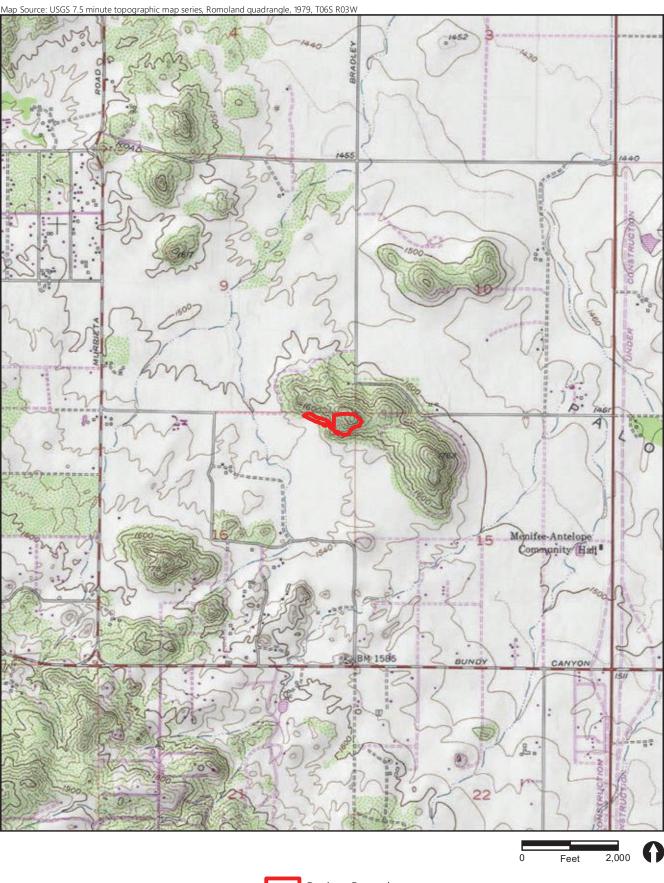
7. Zoning:

The project site and surrounding area is zoned as Rural Residential (RR5).



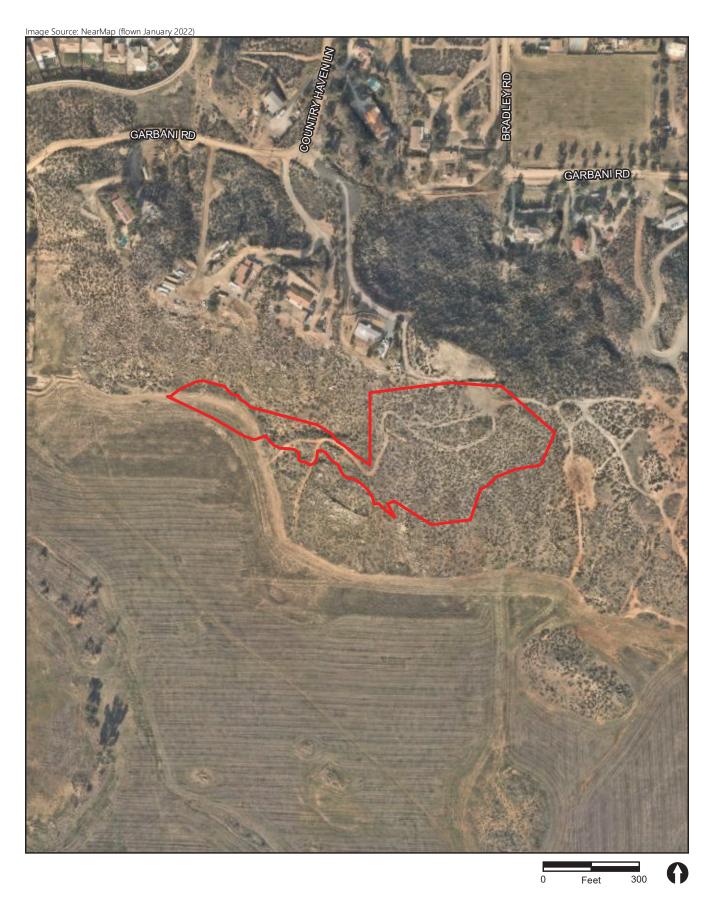






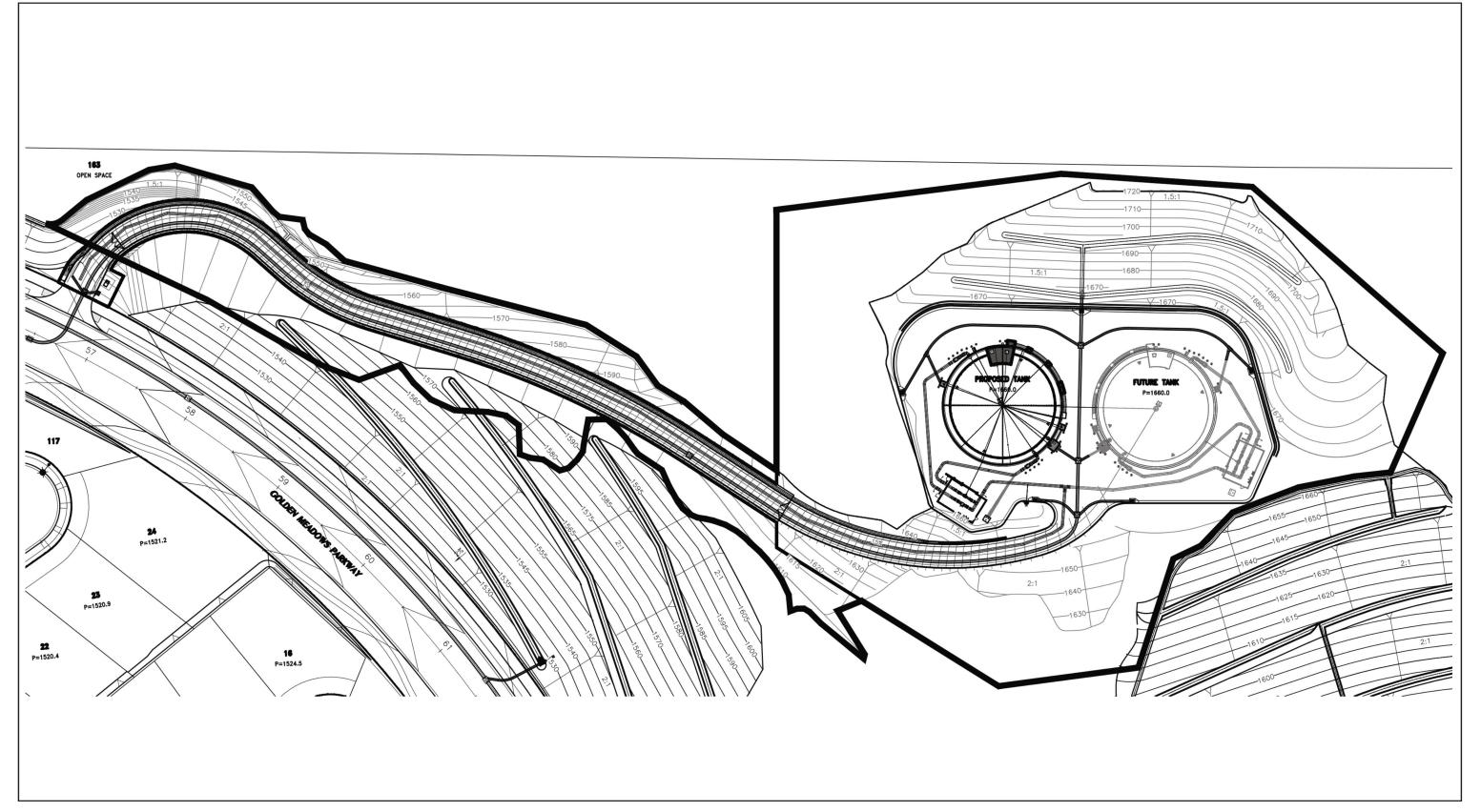














8. Project Background

The City approved the Golden Meadows planned residential development project on August 27, 2013, which allows for the development of Tract 31194. Subsequent to approval of the Golden Meadows Development project, the Eastern Municipal Water District (District) determined that a water storage tank is required to service the development. In addition to this immediate need for water, the District has also determined that additional storage would be needed for future buildout within pressure zone 1698 (PZ). This has led to the development of a two-phased two-tank water reservoir project on the project site.

Description of Project:

The project would result in the construction of two water storage tanks each measuring 2.0 million gallons in size (see Figure 4). Phase 1 of the project consists of site grading to accommodate both tank sites, and the construction of an access road, one 2.0-million-gallon tank and associated supply pipeline to service the Golden Meadows Development project. Phase 2 would result in the construction of a second 2.0-million-gallon tank and associated supply pipeline as part of a District Capital Improvement Project (CIP). The tanks would be painted a buffalo or camel shade of tan to blend with the surrounding landscape per Section 09900 of the District's Maintenance Manual Requirements. Details for each component of the project are provided below.

Grading

All grading would occur during Phase 1 of the project. Grading for the access road and tank site would result in 291,257 cubic yards of cut and 36,000 cubic yards of fill. Excess material would be utilized by the larger 206.8-acre residential development project, Tract 31194, known as "Golden Meadows." A maximum of 1.5:1 cut/fill slope is proposed around the tank pad. Concrete brow ditches (1:1 side slope with 1-foot depth) would be constructed at the top of slopes, while gutters are proposed at the toe of the slopes. Benching is required on the north cut slope of the tank pad, as the maximum vertical elevation along the cut slope exceeds 30 feet.

Tank Access Road and Pavement

A minimum 20-foot-wide paved (curb face to curb face) access road would be constructed to the tank site as part of Phase 1. The access road would start at the project site and would extend west to connect with the proposed road, Golden Meadows Parkway. The maximum grade of the road is proposed to be 15 percent and would have a 2 percent cross slope to the 6-inch curb with an 18-inch-wide gutter on the northerly side on the access road. The proposed curb would have an opening every 200 feet to convey storm flows in a concrete swale. The access road would be 4-inch asphalt concrete pavement over 6-inch Class II base.

Detention Basin

Runoff from the project site would flow into the detention basin previously approved and to be constructed as part of the Golden Meadows Development Project located on the adjacent 206.8-acre site (Tract 31194; Figure 5).

Security and Fencing

Fencing around site improvements is planned to include an 8-foot-high chain link fence topped with barbed wire. The fence is proposed 6-12 inches inside of the District's property line. A 4-foot-high debris fence is also proposed along the toe of the cut slope to the north and east of the tank site pad. An 18-foot-wide double swing gate would be installed on the access road close to the site entrance. The precise final location of the fence and gate would be included in final tank design.

Enclosure for Inlet/Outlet Piping & Valves

A 32-foot (inside length) by 20-foot (inside width) by 8-foot (high) concrete block enclosure with chain link fence roof would be installed around the inlet/outlet piping, altitude valve on the inlet piping, check valve on the outlet piping, and the electrical panels. The enclosure would be set adjacent to the access road around the tank.

Electrical Service

Power from Southern California Edison (SCE) would be routed to the proposed tank site per an approved service plan to be coordinated during the final design process. No major site lighting is proposed. Smaller wattage lighting is proposed only for minor maintenance work at the tank site on the stairs, in the block enclosure and near the access gate. Separate SCE easements for SCE facilities are not anticipated.

Site Hydrology

Runoff from the tank site would sheet flow across the asphalt pavement to the proposed curb and gutter and would be collected by catch basins connected to a municipal storm drain system within the tank site pad. The tank overflow and drain would be conveyed to a catch basin also connected to the municipal storm drain system, generally flowing south and westerly in the access road.

Runoff from the access road would sheet flow across the asphalt pavement to the proposed northerly curb and gutter. The curb would have an opening every 200 feet to convey storm flows to a concrete-lined, flat-bottom ditch along the northerly toe of slope and the storm flows would be collected by catch basins connected to the municipal storm drain in the access road. The storm flows would connect to the municipal storm drain within Wickerd Road and would flow into the proposed detention basin that would be located in the northwesterly most corner of the project site.

9. Surrounding Land Use(s) and Project Setting:

The project site is surrounded by undeveloped open space with an access road from Wickerd Road. The site is currently undeveloped, containing grasses and brush. Topographically, the site is generally hilly, with a mild slope toward the northwest. The lowest elevation of approximately 1,500 feet above mean sea level is in the northwest corner of the site. The highest elevation of approximately 1,800 feet above mean sea level is located along the westerly property line. Single-family homes exist to the north of the site, the approved 206.8-acre residential development project, Tract 31194, known as "Golden Meadows" to the south and west, and undeveloped land to the east.



Detention Basin

Site Plan

RECON
M:\JOBSS\9295\9295.7\common_gis\fig5_mnd.mxd 08/08/2022 bma

FIGURE 5
Proposed Project in Relation to Detention Basin

10. Required Approvals:

Eastern Municipal Water District – Approval of the Golden Meadows Water Tank Project and adoption of this Mitigated Negative Declaration.

11. Other Required Agency Approvals or Permits Required:

Division of Drinking Water Permit, Construction Stormwater General Permit, and Grading Permit from the City of Menifee.

12. Have California Native American tribes traditionally and culturally affiliated with the project area requested consultation pursuant to Public Resources Code Section 21080.3.1? If so, is there a plan for consultation that includes, for example, the determination of significance of impacts to tribal cultural resources, procedures regarding confidentiality, etc.?

On January 21, 2022, the District sent consultation notification letters to Native American Tribes on the District's Master List pursuant to the requirements of Assembly Bill 52 (AB 52) pertaining to government-to-government consultation regarding the project. To date, the District has conducted consultation with two federally-recognized Native American Tribes: The Pechanga Band of Luiseño Indians (Soboba), and the Rincon Band of Luiseño Indians (Rincon). An additional four Native American Tribes were contacted but declined consultation or did not respond.

13. Summary of Environmental Factors Potentially Affected:

The environmental factors checked below would be potentially affected by this project, involving at least one impact that is a "Potentially Significant Impact" as indicated by the checklist on the following pages.

	Aesthetics	Agriculture and Forestry Resources		Air Quality
	Biological Resources	Cultural Resources		Energy
	Geology/Soils	Greenhouse Gas Emissions	_	Hazards & Hazardous Materials
	Hydrology/Water Quality	Land Use/Planning		Mineral Resources
Ш	Noise	Population/Housing	Ш	Public Services
	Recreation	Transportation		Tribal Cultural Resources
	Utilities/Service Systems	Wildfire		Mandatory Findings of Significance

3.0 Draft Mitigated Negative Declaration

DETERMINATION: (To be completed by the Lead Agency)
On the basis of this initial evaluation:	
☐ I find that the proposed project COULD NOT have a a NEGATIVE DECLARATION shall be prepared.	significant effect on the environment, and
I find that, although the proposed project might have there would not be a significant effect in this case be made, or agreed to, by the project proponent. A MIT prepared.	ecause revisions in the project have been
I find that the proposed project might have a sign deficiencies exist relative to the City's General Plan C the deficiency exceeds the levels identified in the pursuant to Zoning Code Article 47, Section 33-92 REPORT shall be required.	Quality of Life Standards, and the extent of City's Environmental Quality Regulations
I find that the proposed project might have a "pot significant unless mitigated impact" on the environmadequately analyzed in an earlier document pursuant been addressed by mitigation measures based on the sheets. An ENVIRONMENTAL IMPACT REPORT shall effects that remain to be addressed.	nent, but at least one effect: (a) has been t to applicable legal standards, and (b) has e earlier analysis as described on attached
I find that, although the proposed project might have further documentation is necessary because all pot analyzed adequately in an earlier EIR or NEGATIV standards, and (b) have been avoided or mitigated DECLARATION, including revisions or mitigation means project.	tentially significant effects: (a) have been 'E DECLARATION pursuant to applicable pursuant to that earlier EIR or NEGATIVE
	August 10, 2022
Signature	Date
Alfred Javier	Director of Env. and Reg. Compliance
Printed Name	Title

4.0 Initial Study Checklist

- 1. A brief explanation is required for all answers except "No Impact" answers that are adequately supported by the information sources a lead agency cites in the parentheses following each question. A "No Impact" answer is adequately supported if the referenced information sources show that the impact simply does not apply to projects like the one involved. A "No Impact answer should be explained where it is based on project specific factors as well as general standards.
- 2. All answers must take account of the whole action involved, including off-site as well as on-site, cumulative as well as project-level, indirect as well as direct, and construction as well as operational impacts.
- 3. Once the lead agency has determined that a particular physical impact may occur, then the checklist answers must indicate whether the impact is potentially significant, less than significant with mitigation, or less than significant. "Potentially Significant Impact" is appropriate if there is substantial evidence that an effect may be significant. If there are one or more "Potentially Significant Impact" entries when the determination is made, an EIR is required.
- 4. "Negative Declaration: Less Than Significant With Mitigation Incorporated" applies where the incorporation of mitigation measures has reduced an effect from "Potentially Significant Impact" to a "Less Than Significant Impact." The lead agency must describe the mitigation measures, and briefly explain how they reduce the effect to a less than significant level.
- 5. Earlier analyses may be used where, pursuant to the tiering, program EIR, or other CEQA process, an effect has been adequately analyzed in an earlier EIR or (mitigated) negative declaration. Section 15063(c)(3)(D).
- 6. Lead agencies are encouraged to incorporate into the checklist references to information sources for potential impacts (e.g., general plans, zoning ordinances). Reference to a previously prepared or outside document should, where appropriate, include a reference to the page or pages where the statement is substantiated.
- 7. Supporting Information Sources: A source list should be attached, and other sources used or individuals contacted should be cited in the discussion.
- 8. This is only a suggested form, and lead agencies are free to use different formats; however, lead agencies should normally address the questions from this checklist that are relevant to a project's environmental effects in whatever format is selected.
- 9. The explanation of each issue should identify:
 - a. The significance criteria or threshold, if any, used to evaluate each question; and
 - b. The mitigation measure identified, if any, to reduce the impact to less than significant.

4.1 Aesthetics

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have a substantial adverse effect on a scenic vista?				
b.	Substantially damage scenic resources, including but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?				
C.	In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from a publicly accessible vantage point). If the project is in an urbanized area, would the project conflict with applicable zoning and other regulations governing scenic quality?				
d.	Create a new source of substantial light or glare that would adversely affect day or nighttime views in the area?				

EXPLANATIONS:

a. Less Than Significant Impact

Existing single-family homes are located to the north of the project site, the approved Golden Meadows Development Project is located to the south and west of the project site, and vacant land is located to the east of the project site. Scenic views from the project site include the San Jacinto Mountains to the northeast and east; the San Bernardino Mountains to the north; the San Gabriel Mountains to the northwest; and the Santa Ana Mountains to the west and southwest. However, no unique or landmark features are located within the project area and the project site is not located in an area containing scenic resources. The proposed water tanks measure approximately 42.5 feet in height, while the proposed diameter is approximately 103 feet. The top elevation of the tanks is not anticipated to be over 1,701 feet. As shown in Figures 7 through 9, construction of the water tanks would not affect scenic views of the San Jacinto Mountains, San Bernardino Mountains, and the Santa Ana Mountains from public viewing areas. In addition, the proposed tanks would be painted a shade of tan to blend with the surrounding landscape per Section 09900 of the District's Maintenance

Manual Requirements. Therefore, the project would not have a substantial adverse effect on a scenic vista. Impacts would be less than significant.

b. No Impact

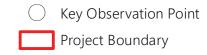
There are no designated State Scenic Highways within the city of Menifee, and therefore the project site is not visible from a State Scenic Highway. The closest officially designated scenic highway to the project site is State Route 74. The official designation for State Route 74 begins at the west boundary of the San Bernardino National Forest and Route 111, which is approximately 26 miles east of the project site (Caltrans 2022). Therefore, the project would not substantially damage any scenic resources within a state scenic highway. No impact would occur.

c. Less Than Significant Impact

Existing single-family homes are located north of the project site, the approved Golden Meadows Development Project is located to the south and west, and undeveloped land is located to the east. Construction activities associated with the project (e.g., presence of construction vehicles, excavated materials, laydown areas) would create short-term visual effects from the project site and surrounding areas. Temporary visual effects would also occur from the construction of an 18-inch diameter water pipeline in Wickerd Road. All construction-related visual impacts would be removed following construction.

Upon completion of project construction, the water tank and related facilities would be visible from areas immediately surrounding the site from multiple directions. The vantage points from which the tank would be visible from are primarily single-family homes north of the site and the homes within the proposed Golden Meadows Development Project south and southwest of the site. Effects to private views are not a consideration under CEQA. Figure 6 identifies key observation points observed for the project. Due to the public views of the tanks in key observation points 1, 6, and 10 visual simulations were prepared to be further analyzed. Visual simulations for these key observation points are shown in Figures 7 through 9. The key observation points in each figure provide conceptual views of the tanks from three public crossroads surrounding the project site. Figure 7 provides the conceptual view from the perspective of the viewer to the west of the project site, at the corner of Garbani Road and Evans Drive. Figure 8 reflects the conceptual view from east of the site at the corner of Garbani Road and Sherman Road, and Figure 9 provides the conceptual view south of the site on Wickerd Road. From the vantage points in all three of these visual simulations, a portion of the tanks would be visible. The viewshed would also include the fencing that would be provided around the proposed improvements within the property with an 8-foot-high chain link fence with three strands of barbed wire and spiral concertina wire. If the 100-foot fuel modification buffer cannot be provided for within the north property boundary for the tanks pad site, an 8-foot-high wall would be required for fire protection. In addition, the tanks and walls would be treated with anti-graffiti coating (if required).



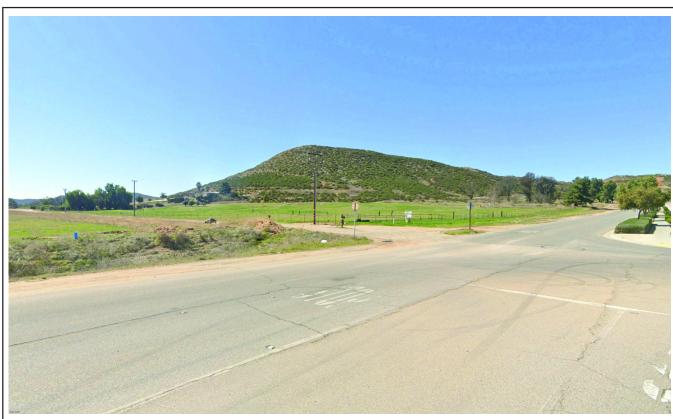




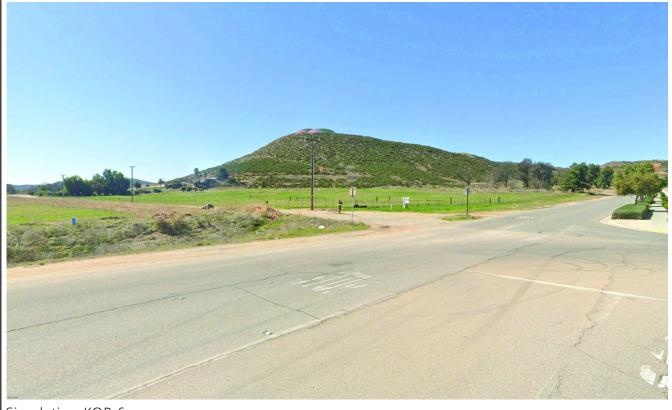
Existing Condition KOP 1



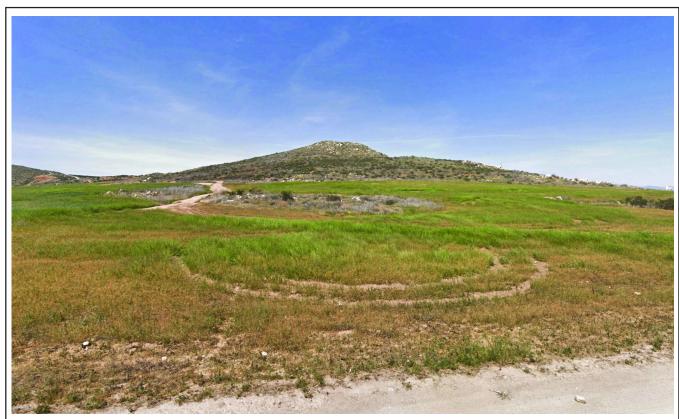
Simulation KOP 1



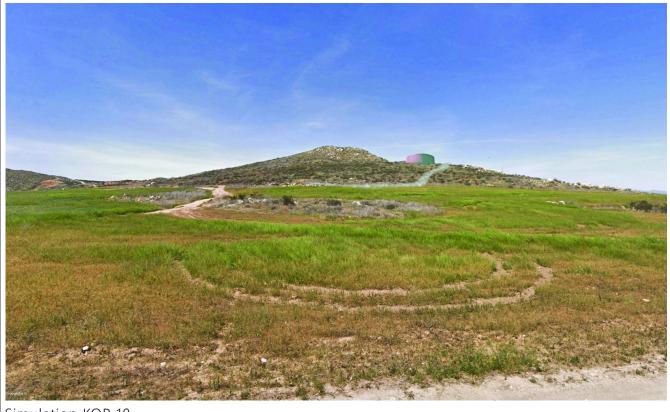
Existing Condition KOP 6



Simulation KOP 6



Existing Condition KOP 10



Simulation KOP 10

From the key observation points described above, which are representative of views from public viewing areas on major roadways around the project site, it is demonstrated that only a portion of the tanks would be visible. In addition, the tanks would be painted a buffalo or camel shade of tan to blend with the surrounding landscape per Section 09900 of the District's Maintenance Manual Requirements. Therefore, the quality of public views of the site and its surroundings would not be substantially degraded and impacts would be less than significant.

d. Less Than Significant Impact

The proposed tanks would require lighting for minor maintenance at the project site and near the access gate. Project construction would be limited to daytime hours Monday through Friday and is not anticipated to require lighting. In the event that construction lighting is required, it would be properly shielded and pointed downwards to avoid spillover effects onto neighboring properties. The steel tanks would be painted, thus reducing potential impacts from glare.

Once project construction is complete, any temporary lighting that was required would be removed. Furthermore, the 18-inch diameter water pipeline to be constructed within Wickerd Road would be located underground and would not include any permanent aboveground components. Therefore, the project would not create a new source of substantial light or glare that would adversely affect day or nighttime views in the area, and impacts would be less than significant.

4.2 Agriculture and Forestry Resources

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?				\boxtimes
b.	Conflict with existing zoning for agricultural use, or a Williamson Act Contract?				\boxtimes

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
C.	Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 1220[g]), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104[g])?				
d.	Result in the loss of forest land or conversion of forest land to non-forest use?				
e.	Involve other changes in the existing environment, which, due to their location or nature, could result in conversion of Farmland to nonagricultural use or conversion of forest land to non-forest use?				

EXPLANATIONS:

a. No Impact

The project site is not located on land classified as "Farmland of Local Importance" by the Farmland Mapping and Monitoring Program (California Department of Conservation 2018). Furthermore, the project site is not an active agricultural site. Therefore, the project would not convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance to non-agricultural uses. No impact would occur.

b. No Impact

The project site and surrounding properties are not zoned for agricultural uses and are not subject to a Williamson Act contract. No impact would occur.

c. No Impact

The project site does not contain any forest or timberland as defined by Public Resources Code Section 12220[g], Public Resources Code Section 4526, or Government Code Section 51104(g) and is not zoned as forest or timberland. No impact would occur.

d. No Impact

The project site does not contain any forest or timberland as defined by Public Resources Code Section 12220[g], Public Resources Code Section 4526, or Government Code Section 51104(g). No impact would occur.

e. No Impact

There are no agricultural uses or forestlands on-site or in the vicinity of the project site. Therefore, the project would not result in conversion of farmland or forest land. No impact would occur.

4.3 Air Quality

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Conflict with or obstruct implementation of the applicable air quality plan?				
b.	Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable federal or state ambient air quality standard?			\boxtimes	
C.	Expose sensitive receptors to substantial pollutant concentrations?				
d.	Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?			\boxtimes	

EXPLANATIONS:

a. Less Than Significant Impact

The project is located within the South Coast Air Basin (Basin) under the jurisdiction of the South Coast Air Quality Management District (SCAQMD). Air districts are tasked with regulating emissions to ensure that air quality in the Basin does not exceed National or California Ambient Air Quality Standards (NAAQS and CAAQS). NAAQS and CAAQS represent the maximum levels of background pollution considered safe, with an adequate margin of safety, to protect the public health and welfare. NAAQS and CAAQS have been established for six common pollutants of concern known as criteria pollutants, which include ozone, carbon monoxide (CO), sulfur dioxide (SO₂), nitrogen dioxide (NO₂), lead (Pb), and respirable particulate matter (PM₁₀ and PM_{2.5}).

The Basin is currently classified as a federal non-attainment area for ozone and PM_{2.5} and a state non-attainment area for ozone, PM₁₀, and PM_{2.5}. The regional air quality plan, the 2016 Air Quality Management Plan (AQMP), outlines measures to reduce emissions of ozone and PM_{2.5}. Whereas reducing PM concentrations is achieved by reducing emissions of PM_{2.5} to the atmosphere, reducing

ozone concentrations is achieved by reducing the precursors of photochemical formation of ozone, volatile organic compounds (VOC), and oxides of nitrogen (NO_X).

Growth forecasting for the AQMP is based in part on the land uses established by local general plans. Thus, if a project is consistent with land use as designated in the local general plan, it can normally be considered consistent with the AQMP. Projects that propose a different land use than is identified in the local general plan may also be considered consistent with the AQMP if the proposed land use is less intensive than buildout under the current designation. For projects that propose a land use that is more intensive than the current designation, analysis that is more detailed is required to assess conformance with the AQMP.

The area surrounding the project site is designated as Residential and Rural Residential in the General Plan. The project site and surrounding area is zoned as Rural Residential (RR5). The project would be consistent with land use designations, as it would supply water for future residential uses. As described in Section 4.3b below, project construction and operational/maintenance activities would not result in significant air quality impacts. The project is limited to the construction of a water storage tank with an access road, associated infrastructure, and the establishment of a graded pad to construct a second water storage tank in the future. The project does not include growth-generating components, but rather would provide water service to planned development. Phase 1 of the project would consist of the construction of one tank to service the Golden Meadows Development project, while Phase 2 would result in the construction of a future second tank as part of a District CIP to provide additional water storage for future development that is consistent with the City's growth projections. As such, the project would be consistent with growth projections contained in the City's General Plan and AQMP forecasts. Based on these considerations and pursuant to SCAQMD guidelines, project-related emissions are accounted for in the AQMP. Therefore, the project would not conflict with or obstruct implementation of the applicable air quality plan, and impacts would be less than significant.

b. Less Than Significant Impact

Regional Significance Thresholds

NAAQS and CAAQS have been established for six criteria pollutants (ozone, CO, SO₂, NO₂, lead, and PM). As described in Section 4.3a above, the SCAQMD is the air pollution control agency responsible for protecting the people and the environment of the Basin from the effects of air pollution. Accordingly, the District evaluates project air quality emissions based on the quantitative emission thresholds originally established in the SCAQMD's CEQA Air Quality Handbook (SCAQMD 1993). SCAQMD's daily significance thresholds for impacts to regional air quality are shown in Table 1.

Table 1 SCAQMD Air Quality Significance Thresholds – Mass Daily Thresholds					
	Emissions (pounds)				
Pollutant	Construction	Operational			
Oxides of Nitrogen (NO _X)	100	55			
Volatile Organic Compounds (VOC)	75	55			
Coarse Particulate Matter (PM ₁₀)	150	150			
Fine Particulate Matter (PM _{2.5})	55	55			
Oxides of Sulfur (SO _x)	150	150			
Carbon Monoxide (CO)	550	550			
Lead (Pb)*	3	3			
SOURCE: SCAQMD Air Quality Significance T	hresholds (SCAQMD	2015).			

Emissions that would result from mobile, area, and stationary sources during construction and operation of the project are subject to the rules and regulations of SCAQMD. The SCAQMD rules applicable to the project may include the following:

- Rule 401, Visible Emissions. This rule establishes the limit for visible emissions from stationary sources.
- Rule 402, Nuisance. This rule prohibits the discharge of air pollutants from a facility that cause injury, detriment, nuisance, or annoyance to the public or damage to business or property.
- Rule 403, Fugitive Dust. This rule requires fugitive dust sources to implement best available control measures for all sources and prohibits all forms of visible particulate matter from crossing any property line. SCAQMD Rule 403 is intended to reduce PM₁₀ emissions from any transportation, handling, construction, or storage activity that has the potential to generate fugitive dust.
- Rule 431.2, Sulfur Content of Liquid Fuels. The purpose of this rule is to limit the sulfur content in diesel and other liquid fuels for the purpose of reducing the formation of oxides of sulfur (SO_X) and particulates during combustion and of enabling the use of add-on control devices for diesel-fueled internal combustion engines. The rule applies to all refiners, importers, and other fuel suppliers such as distributors, marketers, and retailers, as well as to users of diesel, low-sulfur diesel, and other liquid fuels for stationary-source applications in the SCAQMD. The rule also affects diesel fuel supplied for mobile sources.
- Rule 1110.2, Emissions from Gaseous- and Liquid-Fueled Engines. This rule applies to stationary and portable engines rated at greater than 50 horsepower. The purpose of Rule 1110.2 is to reduce NO_X, VOC, and CO emissions from engines. Emergency engines, including those powering standby generators, are generally exempt from the emissions and monitoring requirements of this rule because they have permit conditions that limit operation to 200 hours or less per year as determined by an elapsed operating time meter.
- Rule 1113, Architectural Coatings. This rule requires manufacturers, distributors, and end users
 of architectural and industrial maintenance coatings to reduce VOC emissions from the use
 of these coatings, primarily by placing limits on the VOC content of various coating
 categories.

The project would result in short-term emissions associated with construction. Operation of the project would result in emissions related to vehicle/equipment use associated with routine inspection and maintenance. Construction and operational emissions associated with the project were modeled using the California Emissions Estimator Model (CalEEMod) version 2020.4.0 (California Air Pollution Control Officers Association 2021).

Construction Emissions

Construction-related activities are temporary, short-term sources of air emissions. Sources of construction-related emissions include the following:

- fugitive dust from grading activities;
- equipment exhaust;
- off-gassing from paving; and
- vehicle trips by workers, delivery trucks, and material-hauling trucks.

Phase 1 construction activities are anticipated to begin in 2023 and last for 18 months. Construction activities would include grading, tank installation, and paving. Phase 1 grading would include 291,257 cubic yards of cut and 36,000 cubic yards of fill. Emissions due to the hauling of this export were included in the calculations assuming a default 20-mile one-way trip length. The hauling of construction materials to the project site is anticipated to result in 25 trips during the first two months of Phase 1 construction.

It is also anticipated that blasting and rock crushing may be required during Phase 1 grading activities. It is anticipated that the bedrock in most areas of the project site would generally be rippable with conventional equipment in good operating condition. As part of proposed grading activities, blasting would potentially be necessary in hard rock areas. Based on the rough grade plans, rock blasting within the project boundaries is expected to include the drilling of holes in the tank site, in which small charges would be placed to fragment the rocks into smaller, haulable pieces. Rock produced during proposed blasting activities would be hauled and buried on the project site. If the rock cannot be buried on-site, a rock crusher powered by a diesel generator is proposed to further break down the fragmented rocks to be buried on-site in the upper 10 feet of the proposed design grades. The Project Applicant calculates that approximately 1,200 cubic yards of rock would be generated per day during the blasting and potential rock crushing phase of construction (approximately 90 working days). The contractor may potentially eliminate the use of an on-site rock crusher by breaking up rock fragments over 12 inches in place utilizing a hammer on an excavator. Because the use of an on-site rock crusher may occur, the use of a mechanical rock crusher was evaluated as part of Phase 1 grading activities.

Phase 2 would result in the construction of a future second tank. The exact timing of the construction of the second tank is not known at this time; however, this analysis accounts for emissions associated with the future tank construction. Phase 2 emissions were modeled with a start date immediately after completion of Phase 1 construction. This is conservative since construction equipment gets cleaner over time due to implementation of statewide regulations. The same Phase 1 tank construction duration, equipment, and vendor hauling parameters were modeled for the Phase 2 tank construction. As a part of Phase 2 construction some limited (one day) grading and paving may be required around the second tank site. Phase 2 grading and paving was modeled over the same

Phase 2 tank construction period. As a conservative analysis, the same Phase 1 grading and paving equipment was modeled for Phase 2.

Table 2 summarizes the equipment that would be required for project construction. Table 3 summarizes the maximum construction emissions. CalEEMod output is provided in Appendix A.

		ıble 2			
	Construction	on Equipme			
DI /A .: :	F	Hours	Modeled	C D .	F 10 .
Phase/Activity	Equipment	per Day	Duration	Start Date	End Date
Phase 1 Grading	Tractor/Loader/Backhoe	8	18 months	1/2/2023	6/28/2024
	Excavator	8			
	Dump Truck/Hauling Truck	8			
	Delivery Truck	8			
Phase 1 Blasting/Rock	Bore/Drill Rig	8	90 days	1/2/2023	5/5/2023
Crushing	Crushing/Processing	8			
	Equipment	_			
	Dump Truck	8			
	Excavator	8			
Phase 1 Paving	Asphalt Paver	8	7 days	6/20/2024	6/28/2024
	Steel Wheel Roller	8			
	Concrete Mixer Truck	8			
	Concrete Boom Pump	8			
	Truck				
Phase 1 Tank	Truck Mounted Boom	8	7 days	6/20/2024	6/28/2024
Installation	Crane				
Phase 2 Limited	Tractor/Loader/Backhoe	8	7 days	7/1/2024	7/9/2024
Grading	Excavator	8			
	Dump Truck/Hauling Truck	8			
	Delivery Truck	8			
Phase 2 Limited	Asphalt Paver	8	7 days	7/1/2024	7/9/2024
Paving	Steel Wheel Roller	8			
	Concrete Mixer Truck	8			
	Concrete Boom Pump	8			
	Truck				
Phase 2 Tank	Truck Mounted Boom	8	7 days	7/1/2024	7/9/2024
Installation	Crane		,		
Source: T&B Planning, Inc	2. 2022				

Table 3 Summary of Maximum Buildout Construction Emissions (pounds per day)							
	Pollutant						
Year	ROG	NO _X	CO	SO _X	PM ₁₀	PM _{2.5}	
Phase 1 2023 Emissions	2	23	22	<1	2	1	
Phase 1 2024 Emissions	3	27	28	<1	4	2	
Phase 2 2024 Emissions	3	20	27	<1	3	1	
Maximum	3	27	28	<1	4	2	
Significance Threshold	75	100	550	150	150	55	
SOURCE: Appendix A							

To assess the significance of the air quality emissions resulting from construction of the project, construction emissions were compared to the significance thresholds shown in Table 1. These thresholds are designed to provide limits below which project emissions would not significantly change regional air quality.

As shown in Table 3, maximum daily construction emissions associated with the project (Phase 1 and Phase 2) are projected to be less than the applicable thresholds for all criteria pollutants, including emissions for ozone precursors (reactive organic compounds [ROG] and NO_X), PM₁₀, and PM_{2.5}. Therefore, the project construction would not result in a cumulatively considerable net increase in emissions of ozone, PM₁₀, or PM_{2.5}, and impacts would be less than significant.

Localized Construction Impacts

In addition to these regional significance thresholds, the SCAQMD utilizes Localized Significance Thresholds (LSTs) to evaluate localized air quality impact to sensitive receptors in the vicinity of the project (SCAQMD 2008). LSTs represent the maximum emissions from a project that will not cause or contribute to an exceedance of the most stringent applicable federal or state ambient air quality standard at the nearest residence or sensitive receptor. Localized air quality impacts would occur if pollutant concentrations at sensitive receptors exceeded applicable NAAQS or CAAQS.

The project site is located within Source Receptor Area 24. LSTs apply to on-site air emissions of CO, NO₂, PM₁₀, and PM_{2.5}. The LST Methodology states that only on-site emissions should be compared to LSTs. Therefore, off-site emissions associated with worker travel, materials deliveries, and other mobiles sources are not evaluated against LSTs. The LSTs for a 1-acre site with receptors at a distance of 25 meters were conservatively used. The results of the LST analysis are provided in Table 4.

Table 4 Localized Construction Emissions					
Pollutant					
NO _X CO PM ₁₀ PM _{2.5}					
Maximum Daily Emission	19	24	2	1	
LST Threshold	118	602	4	3	
Threshold Exceeded?	No	No	No	No	

As shown in Table 4, maximum localized construction emissions would not exceed any of the SCAQMD recommended localized screening thresholds. Therefore, the project construction would not exceed the LST thresholds for CO, NO_x, PM₁₀, or PM_{2.5}, and impacts would be less than significant.

Operational/Maintenance Emissions

Operational emissions would result from occasional vehicle maintenance trips and possible area sources including landscaping equipment, consumer products, and architectural coatings. Maintenance activities would be more frequent during the first year of operation due to cycling with the other tanks, seasonal changes, and operational calibration, and would be less frequent after the first year. Maintenance vehicle emissions were modeled assuming one employee would be present on site every weekday, generating two trips (one round trip) per day. A 20-mile trip length was modeled. The default vehicle fleet mix includes a range of vehicle from automobiles to heavy duty trucks. The CalEEMod default values were adjusted to reflect only the use of light-heavy-duty and medium-heavy-duty vehicles. Other sources of operational/maintenance emissions from landscaping equipment, consumer products, and architectural coatings were modeled using CalEEMod defaults for a 5.6-acre industrial land use.

Table 5 summarizes the maximum construction emissions. CalEEMod output is provided in Appendix A.

Table 5 Summary of Maximum Buildout Operational/Maintenance Emissions (pounds per day)						
	Pollutant					
Source	ROG	NOx	CO	SO _X	PM ₁₀	PM _{2.5}
Area	5	<1	<1	<1	<1	<1
Energy	0	0	0	0	0	0
Mobile	<1	<1	<1	<1	<1	<1
Total	5	<1	<1	<1	<1	<1
Significance Threshold	55	55	550	150	150	55
SOURCE: Appendix A						

To assess the significance of the air quality emissions resulting from operation/maintenance of the project, operational emissions were compared to the significance thresholds shown in Table 1. These thresholds are designed to provide limits below which project emissions would not significantly change regional air quality.

As shown in Table 5, maximum daily operational emissions associated with the project (Phase 1 and Phase 2) are projected to be less than the applicable thresholds for all criteria pollutants, including emissions for ozone precursors (ROG and NO_X), PM_{10} , and $PM_{2.5}$. Therefore, the project operation/maintenance would not result in a cumulatively considerable net increase in emissions of ozone, PM_{10} , or $PM_{2.5}$, and impacts would be less than significant.

c. Less Than Significant Impact

A sensitive receptor is a person in the population who is more susceptible to health effects due to exposure to an air contaminant than is the population at large. Examples of sensitive receptor locations in the community include residences, schools, playgrounds, childcare centers, churches, athletic facilities, retirement homes, and long-term health care facilities. The closest residential use is located approximately 160 feet northwest of the tank site construction footprint. Additionally, residential uses are located 100 feet from the Wickerd Road pipeline alignment. Menifee Valley Middle School is located approximately 2,000 feet to the west. Pollutants that have the potential to affect sensitive receptors include criteria pollutants, diesel particulate matter (DPM), and CO hotspots. Ozone is formed through the combination of ROG and NO_X, with help from sunlight and heat. Exposure to either can impact respiratory health, causing respiratory inflammation and asthma exacerbations. Health effects of DPM are wide-ranging, with strong links to all-cause mortality, cardiovascular mortality and hospitalizations, and respiratory and asthma hospitalizations. Adverse health effects associated with CO include chest pain in heart patients, headaches, and reduced mental alertness. Impacts to sensitive receptors from criteria pollutants are discussed above in Section 4.3(b), Localized Construction Impacts. DPM and CO hotspots are discussed below.

Diesel Particulate Matter

Construction of the project would result in short-term diesel exhaust emissions from on-site heavy-duty equipment. Construction of the project would result in the generation of diesel exhaust DPM emissions from the use of off-road diesel equipment required for construction activities and on-road diesel equipment used to bring materials to and from the project site.

Generation of DPM from construction projects typically occurs in a single area for a short period. According to the Office of Environmental Health Hazard Assessment (OEHHA), health risk assessments, which determine the exposure of sensitive receptors to toxic emissions, should be based on a 30-year exposure period; however, such assessments should be limited to the period/duration of activities associated with the project (OEHHA 2015). Thus, if the duration of proposed construction activities near any specific sensitive receptor were 18 months, the exposure would be five percent of the total exposure period used for health risk calculation.

For purposes of analyzing construction-related toxic air contaminant emissions and their impact on sensitive receptors, the maximum annual PM_{10} emissions from equipment exhaust were used to develop an average daily emission rate. The exhaust emissions were calculated by CalEEMod, and the maximum annual DPM concentration was calculated using AERSCREEN. AERSCREEN calculates a worst-case maximum 1-hour concentration at a specific distance and specific angle from the source. The maximum 1-hour concentration is then converted to an annual concentration using a 0.08 conversion factor (U.S. Environmental Protection Agency [U.S. EPA] 1992).

Once the dispersed concentrations of diesel particulates are estimated in the surrounding air, they are used to evaluate estimated exposure to people. Exposure is evaluated by calculating the dose in milligrams per kilogram body weight per day (mg/kg/d). For residential exposure, the breathing rates are determined for specific age groups, so inhalation dose (Dose-air) is calculated for each of these age groups: third trimester of pregnancy, 0<2, 2<9, 2<16, 16<30 and 16–70 years. The equation for dose through inhalation (Dose-air) is as follows:

Dose-air = $(C_{air} \times DBR \times A \times EF \times 10^{-6})$; Where:

= Chronic daily intake, mg/kg/d

 C_{air}

Dose-air

= Ground-level concentration of toxic air contaminants to which the receptor is

exposed, micrograms/cubic meter

DBR

= Daily breathing rate, normalized to body weight (liters per kilogram body

weight per day (OEHHA 2015)

Α

= Inhalation absorption factor (OEHHA recommended factor of 1)

FF

= Exposure frequency, days/year (OEHHA recommended factor of 0.96 for

resident and 0.68 for workers)

Cancer risk is calculated by multiplying the daily inhalation or oral dose, by a cancer potency factor, the age sensitivity factor, the frequency of time spent at home and the exposure duration divided by averaging time, to yield the excess cancer risk. The excess cancer risk is calculated separately for each age grouping and then summed to yield cancer risk for any given location. The worst-case cancer risk is calculated as follows:

Excess Cancer Risk = Dose-air \times CPF \times ASF \times ED/AT \times FAH; Where:

Dose-air = Chronic daily intake, mg/kg body weight per day

CPF = Cancer potency factor (mg/kg/d)

ASF = Age sensitivity factor ED = Exposure duration (years)

AT = Averaging time for lifetime cancer risk (years)

FAH = Fraction of time at home

Non-cancer risks are defined as chronic or acute. With respect to DPM, only chronic risks are calculated and are determined by the hazard index. To calculate hazard index, DPM concentration is divided by its chronic Reference Exposure Levels. Where the total equals or exceeds one, a health hazard is presumed to exist.

In this analysis, non-carcinogenic impacts are evaluated for chronic exposure inhalation exposure. Estimates of health impacts from non-carcinogenic concentrations are expressed as a hazard quotient (HQ) for individual substances, such as diesel particulate. An HQ of one or less indicates that adverse health effects are not expected to result from exposure to emissions of that substance. Reference Exposure Levels are defined as the concentration at which no adverse health effects are anticipated. Generally, the inhalation pathway is the largest contributor to the total dose. The HQ is calculated with the flowing equation:

 $HQ = Ground-Level Concentration (\mu g/m³)/Reference Exposure Level (\mu g/m³)$

It should also be noted that all construction equipment is subject to the California Air Resources Board (CARB) In-Use Off-Road Diesel-Fueled Fleets Regulation. This regulation, which applies to all

off-road diesel vehicles 25 horsepower or greater, limits unnecessary idling to five minutes, requires all construction fleets to be labeled and reported to CARB, bans Tier 0 equipment and phases out Tier 1 and 2 equipment (thereby replacing fleets with cleaner equipment), and requires that fleets comply with Best Available Control Technology requirements.

Based on the CalEEMod calculations for project construction, the project would result in on-site maximum annual emissions of 0.066 ton of PM $_{10}$ exhaust resulting during the simultaneous grading and blasting activities. This maximum annual emissions rate was modeled over the entire 18-month construction period, and therefore is a conservative assessment. Based on AERSCREEN modeling results, the maximum 1-hour ground-level DPM concentration from construction activities would be 0.0166 micrograms per cubic meter (μ g/m 3). This was converted to an annual average concentration of 0.00133 μ g/m 3 using a conversion factor of 0.08 (U.S. EPA 1992). The resulting annual concentration was used in the equations discussed above. Using this methodology, it was calculated that the excess cancer risk would be 0.34 in a million. AERSCREEN and cancer risk calculations are provided in Appendix A. DPM generated by project construction is not expected to create conditions where the probability is greater than 10 in 1 million of contracting cancer. Additionally, the HQ would be 0.0003, which is less than one. Therefore, the project would not expose sensitive receptors to substantial pollutant concentrations associated with diesel particulate matter during construction that could result in excess cancer risks, and impacts would be less than significant.

Carbon Monoxide Hot Spots

A CO hot spot is an area of localized CO pollution that is caused by severe vehicle congestion on major roadways, typically near intersections. CO hot spots have the potential to violate state and federal CO standards at intersections, even if the broader basin is in attainment for federal and state levels. CO hot spots occur nearly exclusively at signalized intersections operating at level of service (LOS) E or F. Due to increased requirements for cleaner vehicles, equipment, and fuels, CO levels in the state have dropped substantially. All air basins are attainment or maintenance areas for CO. Therefore, more recent screening procedures based on more current methodologies have been developed. The Sacramento Metropolitan Air Quality Management District developed a screening threshold in 2011, which states that any project involving an intersection experiencing 31,600 vehicles per hour or more will require detailed analysis. In addition, the Bay Area Air Quality Management District developed a screening threshold in 2010 which states that any project involving an intersection experiencing 44,000 vehicles per hour would require detailed analysis.

The project would generate vehicle trips during construction in the form of haul trucks and worker commute vehicles. Based on the CalEEMod emission calculations prepared for project construction, up to 105 daily worker trips would occur during peak construction activities, and up to 82 daily hauling trips would be required. Based on the Traffic Impact Analysis prepared for the Golden Meadows Project, all signalized intersections for the existing plus ambient growth plus project (Golden Meadows) condition are projected to operate at LOS A and B and peak hour turning volumes would be significantly less than the 31,600 and 44,000 peak hour screening levels discussed above (Urban Crossroads, Inc. 2004). The addition of construction traffic to area roadways would not cause any intersections to operate at LOS E or F and would not significantly increase peak hourly volumes. Construction vehicle generation would also be temporary. Should lane closures be required during construction at Wickerd Road, minor increases in vehicle congestion may occur; however,

traffic volumes on this road are low and the project would implement traffic control measures to maintain vehicular flow if necessary. This would ensure that congestion would not be substantial, and the project would not cause the generation of CO hot spots. Wickerd Road would be restored to pre-existing conditions once construction is completed. Therefore, the project would not generate CO hot spots, and potential impacts would be less than significant.

d. Less Than Significant Impact

The potential for an odor impact is dependent on a number of variables, including the nature of the odor source, distance between the receptor and odor source, and local meteorological conditions. During construction, diesel equipment may generate some nuisance odors from equipment exhaust. Additionally, paving activities have the potential to generate odors while laying asphalt. Sensitive receptors near the project site include residential uses 160 feet northwest of the project site. However, exposure to odors associated with project construction would be short-term and temporary in nature. In addition, construction activities on the project site is required to comply with SCAQMD Rule 402, which prohibits the discharge of odorous emissions that would create a public nuisance. Further, per CARB's Airborne Toxic Control Measures 13 (California Code of Regulations Chapter 10 Section 2485), the applicant shall not allow idling time to exceed 5 minutes unless more time is required per engine manufacturers' specifications or for safety reasons. Compliance with this regulation would reduce odors from equipment exhaust. Given the short-term nature of construction, compliance with SCAQMD Rule 402, and the distance to the nearest sensitive receptors, it is not anticipated that project construction would generate odors that would affect a substantial number of people.

The following list provides some common types of facilities that are known producers of objectionable odors (Bay Area Air Quality Management District 2017). This list of facilities is not meant to be all-inclusive.

- Wastewater Treatment Plant
- Wastewater Pumping Facilities
- Sanitary Landfill
- Transfer Station
- Composting Facility
- Petroleum Refinery
- Asphalt Batch Plant
- Chemical Manufacturing
- Fiberglass Manufacturing
- Painting/Coating Operations
- Rendering Plant
- Coffee Roaster
- Food Processing Facility
- Confined Animal Facility/Feed Lot/Dairy
- Green Waste and Recycling Operations
- Metal Smelting Plants

The project does not include any of these uses that are typically associated with odor complaints. There would be no operational source of odors associated with the project, as the water storage and conveyance system would be completely enclosed and underground. Therefore, the project would not generate substantial amounts of odors adversely affecting a substantial number of people, and impacts would be less than significant.

4.4 Biological Resources

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have substantial adverse effects, 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 Wildlife (CDFW) or U.S. Fish and Wildlife Service (USFWS)?				
b.	Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, and regulations or by the CDFW or USFWS?				
C.	Have a substantial adverse effect on state or federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?				
d.	Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?				

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
e.	Conflict with any local policies or ordinances protecting biological resources, such as tree preservation policy or ordinance?				
f.	Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?				

EXPLANATIONS:

a. Potentially Significant Unless Mitigation Incorporated

This section is based on the Biological Resources Assessment prepared by L&L Environmental, Inc. (Appendix B). The surveys of the project site and surrounding property were conducted from 2003 to 2021 for the Golden Meadows Development Project, and a verification survey for the project was completed by RECON Environmental, Inc. (RECON) on January 5, 2022. The verification survey covered all components associated with the project site, totaling 3.9 acres. Sensitive biological resources are identified in Figure 10.

Vegetation Communities/Land Cover Types

The biological survey identified two vegetation communities/land cover types within the project site: California buckwheat scrub and agricultural/disturbed/ruderal. The acreage of these vegetation communities/land cover types is presented in Table 6 and descriptions are provided below.

Table 6 Vegetation Communities within Biological Survey Area (acres)				
Vegetation Communities	Project Site			
California Buckwheat Scrub	5.2			
Agricultural/Disturbed/Ruderal	0.4			
TOTAL	5.6			
NOTE: Totals may vary due to rounding.				

California Buckwheat Scrub

California buckwheat scrub occurs throughout the project site, and along the road to the site. The California Department of Fish and Wildlife (CDFW) ranks this community as S5 (secure – common, widespread, and abundant) and it is not considered sensitive.

Native shrubs and other conspicuous plants commonly observed in these areas include California buckwheat, California sagebrush, and white sage. Other conspicuous plants include brittlebush,

yellow bush-penstemon, wishbone bush, sweetbush, and black sage. Annuals are also abundant in this community and include natives such as wreath plant and western sunflower and non-natives such as shortpod mustard, red brome, slender wild oat, and Mediterranean grass. Open patches can be found throughout portions of the buckwheat scrub on-site and contain a mixture of native and non-native annuals. Natives include popcorn flower, large flower rancher's fiddleneck, common cryptantha, evening primrose, wild carrot, slender tarweed, and phacelia. Other plants observed include chia, perezia, hooked navarretia, sapphire woollystar, and fringed spineflower.

Agricultural/Disturbed/Ruderal

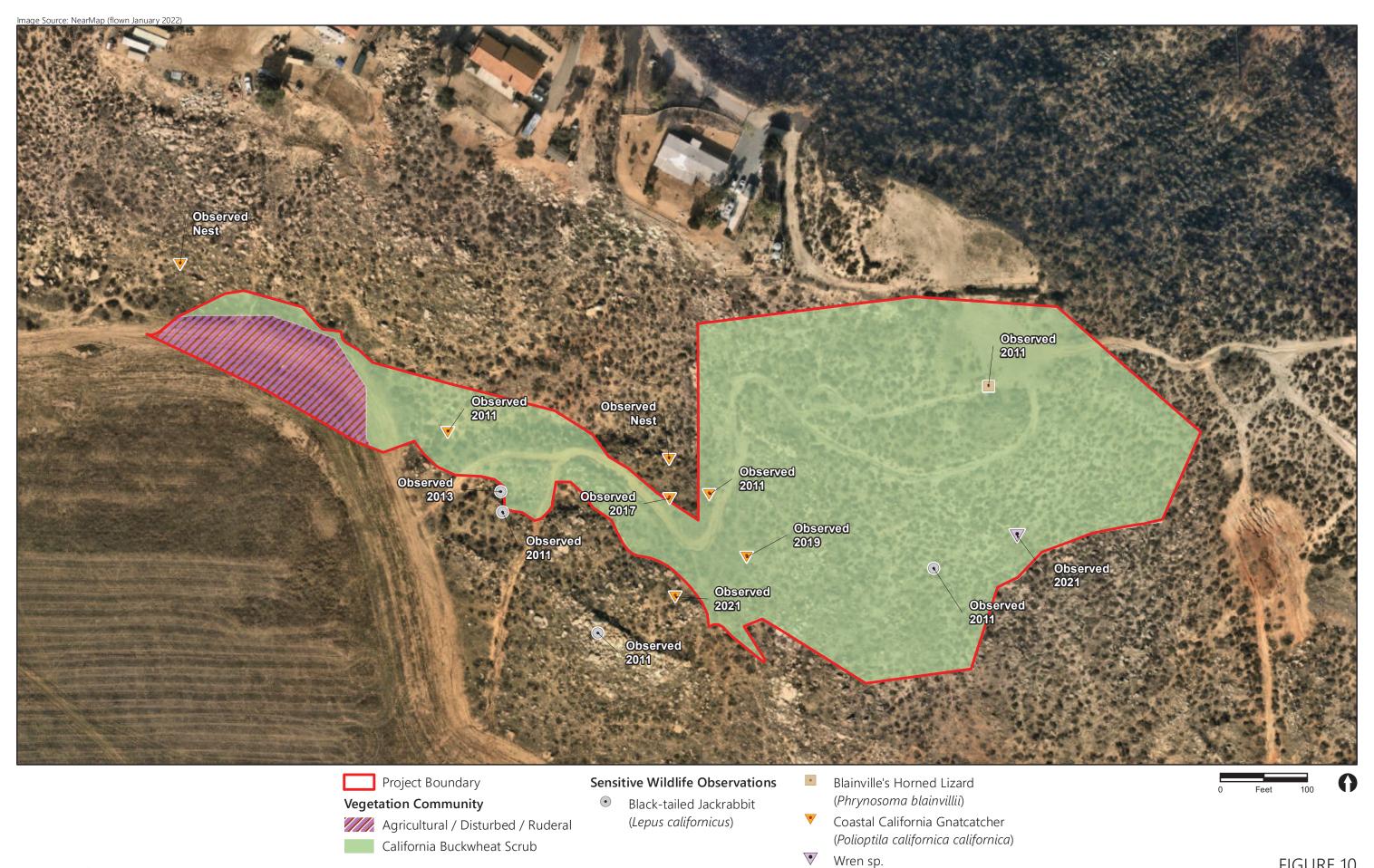
Agricultural/Disturbed/Ruderal habitat includes unvegetated areas (such as roads) and areas that contain mostly non-native plant species, including ornamentals and ruderal invasives associated with previous cultivation. Agricultural operations within this area of the project site are currently inactive. Some non-native and weedy species have invaded these areas, including short-pod mustard, red brome, redstem filaree, and various non-native grasses. Other non-native plant species observed in these areas include horehound, Russian thistle, and tumbling pigweed. Agricultural/Disturbed/Ruderal habitat is not considered sensitive.

Project impacts on vegetation communities are presented in Table 7 and Figure 10. The project is limited to the construction of one water tank, a pad for a future tank, and associated infrastructure including a water pipeline. Impacts are considered less than significant given lack of sensitivity for existing vegetation communities and land cover types.

Table 7 Impacts to Vegetation Communities (acres)				
Existing Within Project				
Land Cover Types	Biological Survey Area	Impacts		
California Buckwheat Scrub	5.2	5.2		
Agricultural/Disturbed/Ruderal	0.4	0.4		
Total	5.6	5.6		

Plant Species

Long-spined spineflower was observed in 2017 but not observed during subsequent surveys. Smooth tarplant, Parry's spineflower, and small-flowered morning-glory have low to moderate potential to occur. All of these species are adequately conserved under the Western Riverside Multiple Species Habitat Conservation Plan (MSHCP; County of Riverside 2003) and any direct impacts to these species are not expected to reduce its overall populations below self-sustaining levels. Therefore, potential impacts would be less than significant and no mitigation would be required.



Wildlife

Three special-status wildlife species were observed within the project site during biological surveys: coastal California gnatcatcher, black-tailed jackrabbit, and Blainville's horned lizard. The project site does not support suitable habitat for riparian birds as no riparian habitat exists in the project site. However, there is moderate potential for western burrowing owl, migratory and nesting birds, western mastiff bat, and other MSHCP covered species to occur within the project site due to the presence of suitable habitats. These species are discussed in further detail below.

Western Burrowing Owl

No western burrowing owl was observed during biological surveys within the project site; however, this species was observed approximately 1,500 feet off-site in 2018. Impacts to western burrowing owl could result from project activities within the California buckwheat scrub and disturbed habitat, both of which provide suitable nesting and foraging habitat for this species. Direct impacts to this species if present at the time of project construction would be significant and require mitigation (Impact BIO-1).

Migratory and Nesting Birds

Migratory and nesting birds were observed during biological surveys and have a moderate potential to nest within the California buckwheat scrub and disturbed habitat within the project area. The project has potential to result in direct impacts to migratory or nesting birds within the project site if vegetation removal and/or project grading occurs during the general bird breeding season (February 1 to September 15). Direct impacts to nesting and migratory birds if present at the time of project construction would be considered significant and require mitigation (Impact BIO-2).

Western Mastiff Bat

Though the project has potential to support foraging habitat for western mastiff bat; the project would not result in any impact to roosting habitat for this species. Therefore, impacts would be less than significant and no mitigation would be required.

Other MSHCP Covered Species

Three MSHCP covered species were observed during biological surveys within and adjacent to the project site: coastal California gnatcatcher, Blainville's horned lizard, and black-tailed jackrabbit. An additional eight MSHCP covered species have potential to occur within the project site: northern harrier, California horned lark, loggerhead shrike, southern California rufous-crowned sparrow, Belding's orange-throated whiptail, red diamond rattlesnake, Stephen's kangaroo rat, and northwestern pocket mouse. The project has potential to result in impacts to these MSHCP covered species from vegetation removal and/or project grading. Vegetation removal and project grading would be performed for the Golden Meadows Development Project under a grading permit issued by the City prior to the construction of the water storage tanks and associated facilities would be performed. Take for these species would be authorized by the MSHCP and Stephen's Kangaroo Rat Habitat Conservation Plan (HCP; Riverside County Habitat Conservation Agency 1996) via the Golden Meadows Development Project. As identified in mitigation measure BIO-3, the applicant for the Golden Meadows Development Project shall pay mitigation fees for impacts to 5.6 acres for the MSHCP and Stephens' Kangaroo Rat HCP. Thus, project impacts to these species would be

considered less than significant and no additional mitigation for impacts is required for construction of the water storage tank and associated facilities.

b. Less Than Significant Impact

Direct impacts associated with the project would be limited to California buckwheat scrub and Agricultural/Disturbed/Ruderal habitat. Under the guidelines of the MSHCP, impacts to these vegetation communities would not be significant as these impacts would occur outside of a Criteria Cell or Public/Quasi-Public Lands and would not require mitigation. In addition, these vegetation communities are not considered sensitive by CDFW. Therefore, impacts would be less than significant.

c. No Impact

No potentially jurisdictional waters or wetlands occur within the project site. Impacts associated with the project would be limited to California buckwheat scrub and Agricultural/Disturbed/Ruderal. None of these vegetation communities qualify as wetlands. Therefore, no impact would occur.

d. Less Than Significant Impact

Wildlife movement corridors are defined as areas that connect suitable wildlife habitat areas in a region otherwise fragmented by rugged terrain, changes in vegetation, or human disturbance. Natural features such as canyon drainages, ridgelines, or areas with vegetation cover provide corridors for wildlife travel. Wildlife movement corridors are important because they provide access to mates, food, and water; allow the dispersal of individuals away from high population density areas; and facilitate the exchange of genetic traits between populations (Beier and Loe 1992). Wildlife movement corridors are considered sensitive by resource and conservation agencies.

Roadways in the project vicinity include Daniel Road to the north, Ascot Way to the east, Wickerd Road to the south and Evans Road to the west. Site access would be from the proposed road, Golden Meadows Parkway. The project site is surrounded by scattered rural residences to the north, the approved Golden Meadows Development Project to the south and west, and undeveloped land to the east. The project site has no connectivity to any MSHCP Conservation Areas or other off-site open space areas. While the project site is anticipated to facilitate local wildlife movement into off-site areas of undeveloped land, the project site as a whole is not anticipated to contribute to regionally significant wildlife movement as it is generally bounded by roads and development and lacks connectivity to MSHCP Conservation Areas or other off-site open space areas. Therefore, impacts would be less than significant, and no mitigation required.

e. Less Than Significant Impact

The City's General Plan (Open Space & Conservation Element OSC-8: Biological) provides policies related to protecting biological resources and implementing the MSHCP. As discussed in further detail below, the project is consistent with the MSHCP, and therefore would not conflict within any City General Plan policies pertaining to the protection of biological resources. In addition, the City's Development Code (Chapter 9.205 Tree Preservation) provides regulations and guidelines for the protection of existing trees. No trees are located within the project site and no conflicts with the

development code would occur Therefore, the project would not conflict with any local policies or ordinances protecting biological resources, and impacts would be less than significant.

f. Less than Significant Impact

The project is located within the boundaries of the MSHCP, but no components of the project are located within existing or proposed Criteria Cells. In addition, there are no riparian/riverine areas, vernal pools, or narrow endemic plant species protected by the MSHCP within the project site. Therefore, there are no MSHCP compliance requirements related to these resources applicable to the project and the project would have no impact.

As noted above, vegetation removal and grading would be performed by the Golden Meadows Development Project prior to construction of the water storage tanks and associated facilities. Prior to issuance of grading permits by the City for the Golden Meadows Development Project, the applicant for the Golden Meadows Development Project shall pay mitigation fees for impacts to 5.6 acres for the MSHCP and Stephens' Kangaroo Rat HCP, which would cover the impacts associated with grading of the project site. No additional mitigation fees would be required by the MSHCP and Stephens' Kangaroo Rat HCP for construction of the water storage tank and associated facilities.

Mitigation Measures

BIO-1: Western burrowing owl. Conduct a pre-construction take avoidance survey within the project footprint, plus 500 feet. Per the Staff Report on Burrowing Owl Mitigation (CDFW 2012), take avoidance surveys require an initial survey no less than 14 days prior to the start of ground disturbance activities and a final survey conducted within 24 hours of ground disturbance. If burrowing owls are detected, the CDFW must be notified within 48 hours and avoidance measures and/or mitigation would be required.

If active burrowing owl burrows are identified within the potential impact area, the project shall avoid disturbing active burrowing owl burrows (nesting sites) and burrowing owl individuals. Buffers shall be established around occupied burrows in accordance with guidance provided in the CDFW Staff Report on Burrowing Owl Mitigation (CDFW 2012) based on the proposed level of disturbance. For low disturbance projects, initial setback distances for avoidance of active burrows shall be 200 meters (approximately 656 feet) from April 1 to October 15 and 50 meters (164 feet) from October 16 to March 31. Exceptions can be made to the avoidance distance for areas with natural (hills, trees) or artificial (buildings, walls) barriers in place. The final avoidance buffer shall be at the discretion of the biologist. If, after consideration of a reduced buffer, an adequate avoidance buffer cannot be provided between an occupied burrow and required grounddisturbing activities, then passive relocation activities during the non-breeding season (September 1 through January 31) may be authorized in consultation with CDFW, which would include preparation, approval, and implementation of a Burrowing Owl Exclusion Plan in accordance with protocol described in the CDFW Staff Report on Burrowing Owl Mitigation.

Migratory birds and raptors (northern harrier, California horned lark, loggerhead shrike, and southern California rufous-crowned sparrow). Conduct a pre-construction survey for nesting birds if vegetation clearing is conducted during the bird nesting season, which is generally defined as January 15 to August 31. The nesting bird survey shall be conducted by a qualified biologist occur no more than seven days prior to vegetation removal.

Additionally, raptors (birds of prey) are known to begin nest building in January or February. If vegetation clearing is to occur between January 1 and February 15, a nesting raptor survey will be conducted within the project site, including a 500-foot buffer.

If active bird nests are confirmed to be present during the pre-construction survey, a buffer zone will be established by a qualified biologist until a qualified biologist has verified that the young have fledged or the nest has otherwise become inactive.

BIO-3: MSHCP and Stephens' Kangaroo Rat HCP. Prior to issuance of grading permits by the City for the Golden Meadows Development Project and prior to any construction activity of the proposed project, the applicant for the Golden Meadows Development Project shall pay mitigation fees for impacts to 5.6 acres for the MSHCP and Stephens' Kangaroo Rat HCP, which would cover the impacts associated with grading of the project site.

4.5 Cultural Resources

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Cause a substantial adverse change in the significance of an historical resource pursuant to §15064.5?				
b.	Cause a substantial adverse change in the significance of an archaeological resource pursuant to §15064.5?				
C.	Disturb human remains, including those interred outside of formal cemeteries?				

EXPLANATIONS:

a. No Impact

A Phase 1 Cultural Resources Assessment was conducted for the project's Area of Potential Effect (APE) that comprised of a background research, review of historic aerial photographs, and an

on-foot survey (Appendix C). The 5.6-acre APE was surveyed by L&L Environmental in December 2021 as part of a survey of the residential development project, Tract 31194.

Prior to the survey, a records search was requested from the Eastern Information Center (EIC) on October 18, 2021. The record search results dated January 28, 2022 showed that there have been 73 previous archaeological investigations, including two surveys including the current APE completed by L&L in 2003 (Hoover and Blevins 2003) and 2013 (Irish and Loren-Webb 2013). A total of 69 cultural resources have been recorded within the one-mile radius of the residential development project. None of the resources are within the APE.

During the survey, a hand-hewn wood post and barbed wire fence line (CC-07H) was recorded. The construction date of the latter resource is unknown, but the use of hand-hewn wood posts suggests construction being over 45 years old (see Appendix C).

Site CC-07H is not associated with a significant event or person (Criteria A and B). The fence line is not constructed in a distinctive way and does not embody the work of a creative individual, or possess high artistic values (Criterion C). It is not likely to yield additional information beyond delineating section boundaries. Therefore, site CC-07H is not recommended eligible for listing on the CRHR.

Therefore, the project would not cause a substantial adverse change in the significance of an historical resource pursuant to §15064.5. No impact would occur.

b. Potentially Significant Unless Mitigation Incorporated

Per the 2021 survey described above, Site CC-04, a bedrock milling site, was recorded within the APE and will be impacted by the project. Site CC-04 is not associated with a significant event or person important to our past (Criteria A and B). The site is not of distinctive construction method nor does it possess high artistic value (Criterion C). Because no artifacts or midden soils are associated with the bedrock milling features, the site on its own lacks the quantity and quality of data required to answer important research questions under Criterion D. Therefore, site CC-04, individually, is not recommended a significant historical resource eligible for listing on the California Register of Historical Resources. However, when looked at from a landscape view, the bedrock milling site may contribute to the Christensen-Webb Native American village complex (Criterion A). Recent viewshed and auditory studies suggest that when individual bedrock milling sites with no artifacts are analyzed as a collective unit, research questions relating to intensity of site use, organization of resource gathering and processing activities, settlement and land-use patterns, and landscape connectivity can be addressed. In this respect, site CC-04 is recommended eligible under CEQA Criterion D as a contributing element to the cultural landscape for the village site (see Appendix C).

Therefore, because CC-04 qualifies as a significant contributing element to the cultural landscape for a village site and due to the positive results of the Native American Heritage Commission (NAHC) Sacred Lands File search, construction activities would have the potential to unearth previously unknown cultural resources, the discovery of which would be considered a significant impact. Implementation of mitigation measures CUL-1 through CUL-5 would reduce impacts to a level less than significant.

c. Potentially Significant Unless Mitigation Incorporated

There are no formal cemeteries or recorded burials in the vicinity of the project site. Therefore, the potential for encountering human remains during construction is very low. However, construction activities would still have the potential to unearth previously unknown human remains, the discovery of which would be considered a significant impact. Implementation of mitigation measures CUL-6 and CUL-7 would reduce impacts to a level less than significant.

Mitigation Measures

CUL-1: Pre-excavation Agreement. Prior to construction, the District shall enter into a pre-excavation agreement with the Luiseño Consulting Tribe(s). The agreement shall address the treatment of archaeological resources inadvertently discovered on the project site; project grading; ground disturbance and development scheduling; the designation, responsibilities, and participation of tribal monitor(s) during grading, excavation, and ground disturbing activities; and compensation for the tribal monitors, including overtime, weekend rates, and mileage reimbursements. The agreement will also indicate the disposition of artifacts recovered during monitoring including the location of Site CC-04.

The District shall relinquish ownership of all cultural resources to the Luiseño Consulting Tribe, including sacred items, burial goods, and all archaeological artifacts and non-human remains as part of the required mitigation for impacts to cultural resources, and adhere to the following:

- 1. Preservation-in-place is the preferred option; preservation-in-place means avoiding the resources and leaving them in the place where they were found with no development affecting the integrity of the resource.
- 2. If preservation-in-place is not feasible, the pre-excavation agreement shall determine an on-site reburial of the discovered items as the next preferable treatment measure. This shall include measures and provisions to protect the future reburial area from any future impacts in perpetuity. Reburial shall not occur until all legally required cataloging and basic recordation have been completed. No recordation of sacred items is permitted without the written consent of all Consulting Native American Tribal Governments.
- 3. In the event that on-site reburial is not feasible, the District will enter into a curation agreement with an appropriate qualified repository within Riverside County that meets federal standards per 36 Code of Federal Regulations 800 Part 79 and therefore would be curated and made available to other archaeologists/researchers for further study. The collections and associated records shall be transferred, including title, to an appropriate curation facility within Riverside County, to be accompanied by payment of the fees necessary for permanent curation.

- CUL-2: Resource Preservation. Relocate Site CC-04 to the nearest dedicated open space where the bedrock milling features can be preserved in perpetuity or to another location agreed upon in the pre-excavation agreement (CUL-1).
- **CUL-3:** Construction Monitoring Program. Implement a construction monitoring program that includes the following:
 - Prior to vegetation clearing and grading, a qualified archaeologist and Luiseño Native American representative would attend a pre-construction meeting with the District, contractor, and any applicable subcontractors.
 - A qualified archaeological monitor and Consulting Native American monitor shall be present during initial ground-disturbing activities in order to identify and record unknown subsurface archaeological features. Both the project archaeologist and Tribal Monitor(s) will make a determination as to the areas with a potential for encountering cultural material. At least seven business days prior to project grading, the District shall contact the tribal monitors to notify the Tribe of grading/excavation and the monitoring program/schedule, and to coordinate with the Tribe on the monitoring work schedule. Both the archaeologist and the tribal monitor shall have the authority to stop and redirect grading activities in order to evaluate the nature and significance of any archaeological resources discovered within the project limits.
- CUL-4: Inadvertent Discoveries. If potentially significant cultural resources are discovered, construction work shall be diverted until the deposit or feature can be evaluated for significance in consultation with the Native American representative and the District. Examples of significant cultural resources include intact features, stratified deposits, and human remains. Isolates and non-significant deposits shall be documented in the field. Construction shall resume after evaluation of the resource or recovery of an adequate sample. Artifacts would be returned to the Native American monitoring Tribe if on-site reburial is negotiated in the pre-excavation agreement after artifacts have been inventoried and analyzed by project archaeologist and Native American representative.
- CUL-5: Final Monitoring Report. After the completion of monitoring, a final report with the monitoring methods and results shall be prepared by the qualified archaeologist and submitted to the District and Consulting Monitoring Tribe. The report will also include the disposition of any cultural material encountered. If no cultural material is encountered, a brief letter report will be sufficient to document monitoring activities.
- CUL-6: Human Remains. If Native American human remains are encountered, Public Resources Code Section 5097.98 and California Health and Safety Code Section 7050.5 will be followed. If human remains are encountered, no further disturbance shall occur until the Riverside County Coroner has made the necessary findings as to origin. Further, pursuant to California Public Resources Code Section 5097.98(b), remains shall be left in place and free from disturbance until a final decision as to the treatment and disposition has been made. If the Riverside County Coroner determines the remains to be Native American, the coroner shall contact the NAHC within 24 hours. Subsequently, the NAHC shall identify the person or persons it believes to be the "most likely descendant." The most likely

descendant shall then make recommendations and engage in consultations concerning the treatment of the remains as provided in Public Resources Code Section 5097.98.

CUL-7: Non-Disclosure of Reburial Locations. It is understood by all parties that unless otherwise required by law, the site of any reburial of culturally sensitive resources shall not be disclosed and shall not be governed by public disclosure requirements of the California Public Records Act. The Coroner, pursuant to the specific exemption set forth in California Government Code 6254(r), parties, and Lead Agencies will be asked to withhold public disclosure information related to such reburial.

4.6 Energy

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Result in potentially significant environmental impacts due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?				
b.	Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?			\boxtimes	

EXPLANATIONS:

a. Less Than Significant Impact

The project would consume energy during both construction and operation. Energy use during construction would occur within two general categories: vehicle fuel used by workers commuting to and from the construction site, and fuel use by vehicles and other equipment to haul materials and conduct construction activities. While construction activities would consume fuels, project-related consumption of such resources would be temporary and would cease upon the completion of construction. In addition, mobile equipment energy usage during construction would be minimized as the project would comply with CARB's idling regulations, which restrict idling diesel vehicles and equipment to five minutes. Additionally, consistent with state requirements, all construction equipment would meet CARB Tier 3 In-Use Off-Road Diesel Engine Standards. Engines are required to meet certain emission standards, and groups of standards are referred to as Tiers. A Tier 0 engine is unregulated with no emission controls, and each progression of standard level (i.e., Tier 1, Tier 2, Tier 3, etc.) generate lower emissions, use less energy, and are more advanced technologically than the previous tier. CARB's Tier 3 In-Use Off-Road Diesel Engine Standards requires that construction equipment fleets become cleaner and use less energy over time. The fuel consumed during

construction would also be typical of similar construction projects and would not require the use of new energy resources beyond what are typically consumed in California. Therefore, construction of the project would not result in wasteful, inefficient, or unnecessary consumption of energy resources, and impacts would be less than significant.

Operational energy usage would be minimal and would consist of occasional maintenance worker vehicle trips. The project would therefore not use energy in a wasteful, inefficient, or unnecessary manner. Therefore, operation of the project would not result in a wasteful, inefficient, or unnecessary consumption of energy resources, and impacts would be less than significant.

b. Less Than Significant Impact

Construction equipment would be subject to CARB's idling regulations and Tier 3 In-Use Off-Road Diesel Engine Standards. Operation of the project would not require ongoing or regular use of a substantial amount of energy. Therefore, the project would not conflict with any state or local plans for renewable energy or energy efficiency, and impacts would be less than significant.

4.7 Geology and Soils

Would the project:

Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
i. Rupture of a known earthquake fault, as delineated on the mos recent Alquist-Priolo Earthquak Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault?	t e			
ii. Strong seismic ground shaking	?			
iii. Seismic-related ground failure, including liquefaction?				
iv. Landslides?				
b. Result in substantial soil erosion o the loss of topsoil?				

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
C.	Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?				
d.	Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?				
e.	Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?				
f.	Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?				

EXPLANATIONS:

a.i. Less Than Significant Impact

As shown in Exhibit S-1 in the General Plan, there are no Alquist-Priolo fault zones traversing the project site or the Menifee area (City of Menifee 2013). The two closest fault zones to the city are the San Jacinto Fault to the east, and the Elsinore Fault to the southwest. Therefore, the risk of earthquake ground rupture is low, and impacts related to the exposure of people or structures to rupture of a known earthquake fault would be less than significant.

a.ii. Less Than Significant Impact

The project site is located in the seismically-active southern California region. The project is limited to the construction of two water tanks, access road, and associated infrastructure including a water pipeline.

The project features would be designed and constructed pursuant to applicable American Water Works Association standards and District guidelines. Tanks designed and constructed in accordance with American Water Works Association standards have an excellent safety and performance track record and are the industry norm for water storage. The project design would also incorporate measures to accommodate seismic loading, as applicable, pursuant to existing District design

guidelines as well as reference guidelines such as the "Greenbook" Standard Specifications for Public Works Construction (Greenbook Committee of Public Works Standards, Inc. 2015) and the International Building Code (International Conference of Building Officials 2012). These guidelines are produced through joint efforts by industry groups to provide standard specifications for engineering and construction activities, including measures to accommodate seismic loading parameters. The referenced guidelines, while not comprising formal regulatory requirements per se, are widely accepted by regulatory authorities and are regularly included in related standards such as municipal building and grading codes. In addition, the project design would follow guidelines within the California Building Code (CBC; California Code of Regulations, Title 24, Part 2). The CBC is based on the previously described International Building Code, with appropriate amendments and modifications to reflect site-specific conditions in California. Furthermore, the District regularly monitors (both remotely and by daily observations) all water storage facilities for leaks and repairs them immediately to avoid conditions that might result in a failure. Based on the incorporation of routine maintenance and applicable measures for project design and construction, the potential impacts associated with strong seismic ground shaking are assessed as less than significant.

a.iii. Less Than Significant Impact

Liquefaction is a phenomenon where water-saturated granular soil loses shear strength during strong ground shaking produced by earthquakes. The loss of soil strength occurs when cyclic pore water pressure increases below the groundwater surface. Potential hazards due to liquefaction include the loss of bearing strength beneath structures; feasibly causing foundation failure or significant settlements and differential settlements. Review of Exhibit S-3 in the Menifee General Plan determined that the project site is not located within a liquefaction hazard zone (City of Menifee 2013). Therefore, impacts related to liquefaction would be less than significant.

a.iv. Less Than Significant Impact

Earthwork is expected to generally consist of cut pad and access road excavation, pad surface preparation, and footing and pipeline construction. In addition, minor filling (approximately 15 feet) may be required on the downhill side for access road. As addressed in the Geotechnical Report (Appendix D), the project site is not susceptible to seismically induced landslides due to the underlying bedrock formation. Therefore, the project would not cause or increase the potential for landslides, and impacts would be less than significant.

b. Less Than Significant Impact

Erosion and sedimentation are not considered to be significant long-term concerns for the project, as all developed areas would be stabilized. For example, graded areas and fill materials would be stabilized through efforts such as backfill or revegetation. Erosion potential would be higher in the short-term during construction than in pre-construction conditions. Erosion and sedimentation control measures would be implemented to minimize on-site erosion and off-site transport of eroded materials during project construction. Such control measures would include applicable BMPs as identified in sources including the Stormwater Best Management Practice Handbooks (California Stormwater Quality Association 2015) and/or Construction Site Best Management Practices Manual (California Department of Transportation [Caltrans] 2003), in addition to specific BMPs determined by the project contractor and engineer based on site-specific conditions (i.e., revegetation of

disturbed areas, covering stockpiled materials, use of erosion control devices and sediment catchment structures, etc.). Implementation of these measures would ensure potential erosion and sedimentation impacts remain less than significant. Additional erosion control measures may also be required in association with National Pollutant Discharge Elimination System (NPDES) permit requirements.

c. Less Than Significant Impact

As described in 4.7aiii above, the project site is not located within a liquefaction hazard zone. As described in the Geotechnical Report (see Appendix D), based on the underlying bedrock formation and review of aerial photographs and field observations, the site is not susceptible to seismically induced landslides. Furthermore, project excavation and construction would be conducted consistent with requirements of the 2010 California Building Code regarding unstable soils. Construction activities would be performed in accordance with the project plans, District specifications, and applicable Occupational Safety and Health Administration (OSHA) requirements. Adherence to these guidelines would ensure that impacts associated with unstable soils would be less than significant.

d. Less Than Significant Impact

As described in the Geotechnical Report (see Appendix D), expansion index testing was performed on a representative soil sample. The sample indicated that materials (silty sand) possess a very low expansion potential. In addition, project excavation and construction would be conducted consistent with requirements of the 2010 California Building Code regarding expansive soils. Adherence to these guidelines would ensure that impacts associated with expansive soils would be less than significant.

e. No Impact

The project does not propose the use of septic tanks or alternative wastewater disposal systems. No impact would occur.

f. Less than Significant Impact

A Phase I Paleontological Resources Report was prepared for the Golden Meadows Development Project by L&L Environmental, Inc. and included the project site (Appendix E). The paleontological resources record searches did not identify any previously recorded paleontological localities on or near the project area. Therefore, impacts regarding paleontological resources would be less than significant.

4.8 Greenhouse Gas Emissions

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?				
b.	Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases?				

EXPLANATIONS:

a. Less Than Significant Impact

The District has not adopted its own greenhouse gas (GHG) thresholds of significance for CEQA. The SCAQMD published its Interim CEQA GHG Significance Thresholds for Stationary Sources, Rules, and Plans in 2008 (SCAQMD 2008). The interim thresholds are a tiered approach; projects may be determined to be less than significant under each tier or require further analysis under subsequent tiers. For the project, the most appropriate screening threshold for determining GHG emissions is the SCAQMD proposed Tier 3 screening threshold (SCAQMD 2010); therefore, a significant impact would occur if the project would exceed the SCAQMD proposed Tier 3 screening threshold of 3,000 metric tons carbon dioxide equivalent (MT CO₂E) per year. Based on guidance from the SCAQMD, total construction GHG emissions resulting from a project should be amortized over the lifetime of a project, which is defined as 30 years (SCAQMD 2009).

The project would result in short-term emissions from construction activities. Construction emissions were calculated using CalEEMod and the parameters discussed in detail in Section 4.3b above. Total construction GHG emissions are summarized in Table 8.

Table 8 Summary of Total Construction GHG Emissions				
Phase/Year	GHG Emissions (MT CO ₂ E)			
2023				
Phase 1 Grading	864			
Phase 1 Blasting/Crushing	92			
2024				
Phase 1 Grading	427			
Phase 1 Paving	6			
Phase 1 Tank Construction	5			
Phase 2 Limited Grading	7			
Phase 2 Limited Paving	9			
Phase 2 Tank Installation	5			
Total Construction Emissions	1,416			
Amortized Construction Emissions 47				
SOURCE: Appendix A				
NOTE: Totals may vary due to rounding				

As shown in Table 8, the project would result in a total of 1,416 MT CO_2E over the entire construction period, which would be 47 MT CO_2E per year when amortized over the lifetime of the project. Amortized construction emissions were added to project operational/maintenance emissions and compared to the 3,000 MT CO_2E per year screening threshold.

Operational emissions would result from occasional vehicle maintenance trips and possible sources including energy (site lighting), area sources (landscaping equipment), and water use. Vehicle and area source emissions were calculated using CalEEMod and the parameters are discussed in detail in Section 4.3b above. The project would not result in the consumption of water, it would store water for consumption by the end user. Therefore, the GHG emissions associated with water use would not be generated by the project, but would be generated by the residential uses served by the project. To account for possible water use for any tank draining that may occur, 4 million gallons of water use was modeled. The project is not anticipated to be an operational solid waste generator, therefore, there would be no GHG emissions associated with solid waste disposal.

Total project GHG emissions are summarized in Table 9.

Table 9 Summary of Total Project GHG Emissions					
Source GHG Emissions (MT CO ₂ E)					
Mobile	4				
Energy	127				
Area	<1				
Water and Wastewater	15				
Solid Waste	0				
Construction (amortized)	47				
Total	194				
SCAQMD Screening Threshold	3,000				
SOURCE: Appendix A					

As shown, total project emissions (Phase 1 and 2) would be 194 MT CO_2E . This would be less than the 3,000 MT CO_2E annual screening threshold. Therefore, impacts from construction and operation of the project would be less than significant.

b. Less Than Significant Impact

Executive Order (EO) S-3-05 and EO B-30-15 established GHG emission reduction targets for the state, and Assembly Bill 32 launched the CARB Climate Change Scoping Plan that outlined the reduction measures needed to reach the 2020 target, which the state has achieved. As required by Senate Bill 32, CARB's 2017 Climate Change Scoping Plan outlines reduction measures needed to achieve the interim 2030 target. As detailed in the response under 4.8a above, the project would result in construction GHG emissions below the SCAQMD proposed Tier 3 screening threshold of 3,000 MT CO₂E per year. The project would not result in emissions that would adversely affect statewide attainment of GHG emission reduction goals as described in Assembly Bill 32, EOs S-3-05 and B-30-15, and Senate Bill 32. Project emissions would therefore have a less than cumulatively considerable contribution to global climate change impacts. The project would not result in a significant increase in regional vehicle miles traveled since vehicle trips would be limited to occasional maintenance trips that would be performed by existing/planned EMWD staff. The project would be consistent with land use designations, as it would supply water for future residential uses. Because the project would provide additional water storage for future development that is consistent with the City's growth projections and because project trips would be limited to occasional maintenance activities, it would not conflict with the transportation related GHG reduction goals outlined in the Regional Transportation Plan. Further, the project would not conflict with energy efficiency standards or conflict with SCE's Renewables Portfolio Standard renewable energy goals as these are not applicable to project construction and operation. Therefore, the project would not conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing GHG emissions, and impacts would be less than significant.

4.9 Hazards and Hazardous Materials

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Create a significant hazard to the public or the environment through routine transport, use, or disposal of hazardous materials?				
b.	Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?				

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
C.	Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?				
d.	Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 and, as a result, would it create a significant hazard to the public or the environment?				
e.	For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?				
f.	Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?			\boxtimes	
g.	Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?			\boxtimes	

EXPLANATIONS:

a. Less Than Significant Impact

The project would not involve routine transport, use, or disposal of significant hazardous materials. Project construction may involve the use of small amounts of solvents, cleaners, paint, oils and fuel for equipment. The project would comply with a NPDES permit program which controls water pollution by regulating point sources that discharge pollutants into waters of the United States. Additionally, project construction would be required to be undertaken in compliance with all applicable federal, state, and local regulations pertaining to the proper use of these common hazardous materials. Compliance with these regulations is mandatory per standard permitting conditions. Therefore, the project would not create a significant hazard to the public or the

environment through routine transport, use, or disposal of hazardous materials, and impacts would be less than significant.

b. Less Than Significant Impact

As described in Section 4.9a above, operation of the proposed water tank and associated infrastructure would not involve the routine transport, use, or disposal of significant hazardous materials. In addition, the project would be required to implement the Division of Occupational Safety and Health of California Construction Safety Plan/Hazard Communication Program; in case of accidental release, the project would be required to comply with the Code of Federal Regulations Section 1910.120. Furthermore, project construction would be conducted consistent with all applicable safety regulations and would not be expected to introduce accident conditions that could result in the release of hazardous materials into the environment. Therefore, the project would not create upset and accident conditions that could result in the release of hazardous materials, and impacts would be less than significant.

c. Less Than Significant Impact

Menifee Valley Middle School is located approximately 0.9 mile west of the project site. Project construction would not require the use of acutely hazardous materials, and would be limited to the use of small amounts of solvents, cleaners, paint, oils and fuel for equipment. Use of these common hazardous materials in small quantities would not represent a significant hazard to the public or environment, and the use and handling of hazardous materials during construction would be conducted consistent with all applicable regulations (see Section 4.8a, above). Therefore, impacts related to hazardous emissions within 0.25 mile of a school would be less than significant.

d. Less Than Significant Impact

The project site is not located on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5 (Department of Toxic Substances Control 2022). The project will be required to comply with all applicable federal, state, and local laws and regulations pertaining to the transport, use, disposal, handling, and storage of hazardous waste, including but not limited to Title 49 of the Code of Federal Regulations implemented by Title 13 of the California Code of Regulations, which describes strict regulations for the safe transportation of hazardous materials. Compliance with all applicable federal, state, and local laws related to hazardous materials will ensure that impacts related to emitting hazardous emissions or materials within one-quarter mile of a school will be less than significant. Thus, the project will not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school and is not located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code Section 65962.5. Therefore, impacts are less than significant.

e. No Impact

The project site is not located within the vicinity of a private airstrip. The nearest airport is the Perris Valley Airport-L-65, which is located approximately 9.2 miles to the northwest. Therefore, the project site is not located within an airport land use plan or within two miles of a public airport and would not result in a safety hazard or excessive noise. No impact would occur.

f. Less Than Significant Impact

As shown in exhibit S-9, Evacuation Routes in the City General Plan, the project would not interfere with any emergency evacuation routes. Construction of the project would generate temporary vehicle trips in the form of haul trucks and worker commute vehicles. These vehicles would access the project site via the proposed access road off the proposed road, Golden Meadows Parkway. Given the rural location of the project site and the distance to area roads, roadway/lane closures are not expected. Therefore, the project would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan.

g. Less Than Significant Impact

The project is located in a Very High Fire Hazard Severity Zone as indicated in exhibit S-8 in the City General Plan (City of Menifee, 2013); however, the project does not include habitable structures that could expose people to a significant risk of loss, injury, or death involving wildland fires. Human presence would be limited to temporary construction and periodic maintenance. All construction will be required to comply with fire protection and prevention requirements specific by state law (California Code of Regulations) and the California Division of Occupational Safety and Health. This includes various measures such as easy accessibility of firefighting equipment, proper storage of combustible liquids, no smoking in service and refueling areas, and worker training for firefighter extinguisher use. Further, all new construction is required to comply with the California Fire and Building Codes. Additionally, the project will be required to comply with all regulatory requirements concerning fire protection. Therefore, the exposure of people or structures to significant risk of loss, injury, or death would not be likely to occur and impacts would be less than significant.

4.10 Hydrology and Water Quality

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?				
b.	Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?				

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
C.	Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river, or through the addition of impervious surfaces in a manner, which would:				
	 result in substantial erosion or siltation on- or off-site; 				
	ii. substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;				
	iii. create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff; or				
	iv. impede or redirect flood flows?				
d.	In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?				
e.	Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?				

EXPLANATIONS:

a. Less Than Significant Impact

Project construction would have the potential to generate erosion/sedimentation and pollutants that could impact water quality. However, the project is subject to the NPDES permit requirements overseen by the District which includes preparation and implementation of a Storm Water Pollution Prevention Program for the prevention of polluted runoff during construction. The project will be required to prepare and implement a Storm Water Pollution Prevention Program with BMPs prior to the commencement of construction activities, and to incorporate water quality design features to address potential erosion and siltation impacts.

The project would mimic the site's existing drainage patterns, which flow south and west in both the existing and proposed conditions. Runoff from the tank and tank site would sheet flow across the asphalt pavement to the proposed curb and gutter and collected by catch basins which are connected to a municipal storm drain system within the tank site pad. The tank overflow and drain would be conveyed to a catch basin also connected to the municipal storm drain system, generally flowing south and westerly in the access road. Runoff from the access road would sheet flow across the asphalt pavement to proposed northerly curb and gutter. The proposed curb would have an opening every 200 feet to convey storm flows to a concrete lined flat bottom ditch along the northerly toe of slope and collected by catch basins which are connected to the municipal storm drain in the access road, ultimately connecting to the municipal storm drain and outletting into the proposed extended detention basin located in the northwesterly most corner of the overall project site.

Project construction would have the potential to generate erosion/sedimentation and pollutants that could impact water quality. However, the project would implement construction BMPs consistent with the NPDES Construction General Permit and related requirements that would prevent erosion and prevent pollution from affecting water quality. The drainage pattern of undeveloped portions of the project site would be restored to its pre-existing conditions. Therefore, the project would not violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality, and impacts would be less than significant.

b. Less Than Significant Impact

The project site is located within the San Jacinto Groundwater Basin which underlies several valleys in Riverside County and a portion of southern San Bernardino County.

No deficit to groundwater or lowering of the groundwater table would occur. The project would not substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin. Further, as discussed in Section 5.10.a, above, the project would not violate water quality standards. Thus, the project would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan. Therefore, impacts would be less than significant.

The project is limited to construction of one 2.0-million-gallon water tank, a pad for an additional future tank, along with associated pipelines and infrastructure. The project would not introduce any residential, commercial, or other uses that would use groundwater. Therefore, the project would not significantly decrease groundwater supplies or interfere with groundwater recharge or obstruct sustainable groundwater management, and impacts would be less than significant.

c.i. Less Than Significant Impact

The project would implement construction BMPs consistent with the NPDES Construction General Permit and related requirements that would prevent erosion. Post project runoff would mimic existing drainage patterns, which flow south and west. The storm flows would ultimately connect to the municipal storm drain and would flow into the proposed extended detention basin that would be located in the northwesterly most corner of the overall project site. Therefore, the project would not substantially alter the drainage pattern of the site or the surrounding area in a manner that could

result in substantial erosion, runoff, impediment or redirection of flood flows, and impacts would be less than significant.

c.ii. Less Than Significant Impact

As described in Section 4.10a above, the project would implement construction BMPs consistent with the NPDES Construction General Permit. Construction of the tanks, perimeter road and access road would result in 54,430 square feet of impervious surfaces. The site design includes landscape areas, which will attenuate runoff prior to being conveyed to the site's storm drain system. The storm flows would ultimately connect to a storm drain and would flow into the proposed detention basin that would be located in the northwesterly most corner of the overall project site. Therefore, the project would not substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site, and impacts would be less than significant.

c.iii. Less Than Significant Impact

As described in Section 4.10a above, the project would implement construction BMPs consistent with the NPDES Construction General Permit and related requirements that would minimize erosion and prevent pollution from affecting water quality. Post project runoff flows would ultimately connect to the municipal storm drain and would flow into the proposed extended detention basin that would be located in the northwesterly most corner of the overall project site. Therefore, the project would not create or contribute runoff water which would exceed the capacity of existing or planned stormwater drainage systems or provide substantial additional sources of polluted runoff, and impacts would be less than significant.

c.iv. Less Than Significant Impact

As shown in exhibit S-5, Flood Hazards in the City General Plan, the project site is not within a flood hazard zone. The project is limited to construction of one 2.0-million-gallon water tank, a pad for an additional future tank, along with associated pipelines and infrastructure. The project would mimic the site's existing drainage patterns, which flow south and west in both the existing and proposed conditions. Therefore, the project would not impede or redirect flood flows, and impacts would be less than significant.

d. No Impact

As shown in exhibit S-5, Flood Hazards in the City General Plan, the project site is not within a flood hazard zone. The project site is located approximately 30 miles inland from the Pacific Ocean, and therefore is not subject to risk associated with tsunami. The nearest body of water is Canyon Lake located approximately three miles northwest of the project site. Due to the distance the project site is from Canyon Lake and the low likelihood of a seiche forming, the proposed project would not be susceptible to seiche inundation events. Therefore, the project would not result in impacts associated with flood hazard, tsunami, or seiche zones. No impact would occur.

e. Less Than Significant Impact

The project would implement construction BMPs consistent with the NPDES Construction General Permit and related requirements that would prevent erosion and pollution from affecting water quality. The project would not decrease groundwater supplies or interfere with groundwater recharge. Therefore, the project would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan, and impacts would be less than significant.

4.11 Land Use and Planning

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Physically divide an established community?				
b.	Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?				

EXPLANATIONS:

a. No Impact

The project site and surrounding area is currently vacant, but subject to change given the recently approved Golden Meadows site plan. Construction of the proposed project is an element of the planned community that will soon occupy the surrounding land. Construction activities would be temporary with the exception of maintenance related activities. The project would not physically divide an established community.

b. Less Than Significant Impact

The project is part of the April 29, 2020 District-approved design conditions for the Golden Meadows Development Project. Therefore, the project is an approved use and would not conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect, and impacts would be less than significant.

4.12 Mineral Resources

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?				
b.	Result in the loss of availability of a locally important mineral resource recovery site delineated on a local general plan, specific plan or other land use plan?				

EXPLANATIONS:

a. Less Than Significant Impact

As identified in Exhibit OSC-4 of the City of Menifee General Plan (2013), the project lies within Mineral Resource Zone 3A, which covers almost three-quarters of the city. Mineral Resource Zone 3A is a resource zone where available geologic information indicates that mineral deposits are likely to exist, but the significance of the deposit is undetermined and unstudied. The project site has not been mined and the site's size, location, zoning, and physical characteristics would preclude mining. Therefore, the project would not substantially affect the availability of any mineral deposits that would be of value to the region and the residents of the state or of a locally important mineral resource recovery site. Less than significant impacts would occur.

b. No Impact

The City's General Plan does not identify the project site as an existing or former mineral resource site. No active mines are mapped in the city of Menifee, and mining would be incompatible with the existing and future land uses. No impact would occur.

4.13 Noise

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?				
b.	Generation of excessive ground borne vibration or ground borne noise levels?				
C.	For a project located within the vicinity of a private airstrip or an airport land use plan, or, where such a plan has not been adopted, within two miles of a public airport or public use airport, would the project expose people residing or working in the area to excessive noise levels?				

EXPLANATIONS:

a. Less Than Significant Impact

Noise Fundamentals

Noise is defined as sound that is loud, unpleasant, unexpected, or undesired, and therefore, may cause general annoyance, interference with speech communication, sleep disturbance, and, in the extreme, hearing impairment. Decibels (dB) are the standard unit of measurement of the sound pressure generated by noise sources and are measured on a logarithmic scale that quantifies sound intensity in a manner similar to the Richter scale for earthquake magnitudes. A doubling of the energy of a noise source, such as doubling of traffic volume, would increase the noise level by 3 dB; a halving of the noise energy would result in a 3 dB decrease.

The human ear is not equally sensitive to all frequencies within the sound spectrum. To accommodate this phenomenon, the A-weighted scale, which approximates the frequency response of the average young ear when listening to most ordinary everyday sounds, was devised. Noise levels

using A-weighted measurements are written as dB(A). It is widely accepted that the average healthy ear can barely perceive changes of 3 dB(A) (increase or decrease) and that a change of 5 dB(A) is readily perceptible. An increase of 10 dB(A) is perceived as twice as loud, and a decrease of 10 dB(A) is perceived as half as loud (Caltrans 2013).

The impact of noise is not a function of loudness alone. The time of day when noise occurs and the duration of the noise are also important. In addition, most noise that lasts for more than a few seconds is variable in its intensity. Consequently, a variety of noise descriptors has been developed. The noise descriptors used for this study are the equivalent noise level (L_{eq}), the maximum noise level, and the community noise equivalent level (CNEL).

The L_{eq} is the equivalent steady-state noise level in a stated period of time that is calculated by averaging the acoustic energy over a time period; when no period is specified, a 1-hour period is assumed. The maximum noise level is the highest sound level occurring during a specific period.

The CNEL is a 24-hour equivalent sound level. The CNEL calculation applies an additional 5 dB(A) penalty to noise occurring during evening hours, between 7:00 p.m. and 10:00 p.m., and a 10 dB(A) penalty is added to noise occurring during the night, between 10:00 p.m. and 7:00 a.m. These increases for certain times are intended to account for the added sensitivity of humans to noise during the evening and night.

Regulatory Framework

The City's General Plan Noise Element identifies goals and policies to protect citizens from excessive noise levels. Policy N-1.2 states that new developments are required to comply with the noise standards of local, regional, and state building code regulations, including but not limited to the City's Municipal Code, Title 24 of the California Code of Regulations, the California Green Building Code, and subdivision and development codes. In addition, the Noise Element provides Policy N-1.11 to discourage the siting of noise-sensitive uses in areas in excess of 65 CNEL without appropriate mitigation. The City's Development Code, Chapter 9.210 Noise Control Regulations, Section 9.210.060 Table 9.210.060-1 establishes the permissible noise level that may intrude into a neighbor's property. The City's Development Code establishes the exterior noise level criteria for noise-sensitive residential properties affected by stationary noise sources. For residential properties, the exterior noise level shall not exceed 65 dB(A) Leq during daytime hours (7:00 a.m. to 10:00 p.m.) and shall not exceed 45 dB(A) Leg during the nighttime hours (10:00 p.m. to 7:00 a.m.). However, the project would not construct a noise sensitive land use or create an operational source of noise. Section 9.210.060(C) of the City's Municipal Code indicates that private construction projects, located within one-quarter of a mile from an occupied residence, are considered exempt from the Development Code noise standards if they occur within the permitted hours of 6:30 a.m. and 7:00 p.m., with no activity allowed on Sundays and nationally recognized holidays. Neither the City General Plan Noise Element or Development Code establish numeric maximum acceptable construction source noise levels at potentially affected receivers for CEQA analysis purposes. Therefore, a numerical construction threshold based on Federal Transit Administration (FTA) Transit Noise and Vibration Impact Assessment Manual is used for analysis of daytime construction impacts (FTA 2006).

According to the FTA, project construction noise criteria should account for the existing noise environment, the absolute noise levels during construction activities, the duration of the

construction, and the adjacent land use. Due to the lack of standardized construction noise thresholds, the FTA provides guidelines that can be considered reasonable criteria for construction noise assessment. The FTA considers a daytime exterior construction noise level of 80 dB(A) L_{eq} as a reasonable threshold for noise sensitive residential land use.

Construction Noise

Project-generated construction noise will vary depending on the construction process. Phase 1 construction activities are anticipated to begin in 2023 and last for 18 months. Construction activities would include grading, paving, and tank installation. It is also anticipated that blasting and rock crushing may be required during Phase 1 grading activities. A discussion of potential blasting and rock crushing activities can be found in Section 4.3b.

Table 10 summarizes the noise levels generated by the equipment required for Phases 1 and 2 of project construction. The duty cycle is the amount of time that equipment generates the reported noise level during typical, standard equipment operation. The noise levels and duty cycles summarized in Table 10 are based on measurements and studies conducted by Federal Highway Administration and the FTA. Noise calculations are provided in Appendix F.

		ole 10 pment Noise Levels		
				Maximum Average
		Maximum Noise		Hourly Noise Level
		Level at 50 Feet	Typical Duty	at 50 Feet
Phase/Activity	Equipment	[dB(A) L _{max}]	Cycle*	[dB(A) L _{eq}]
Phase 1 Grading	Tractor/Loader/Backhoe	80	40%	76
	Excavator	85	40%	81
	Dump Truck/Hauling Truck	84	40%	80
	Delivery Truck	84	40%	80
			Total	85.7
Phase 1	Rock Drill	85	20%	78
Blasting/Rock	Crushing/Processing Equipment**	86	40%	82
Crushing	Dump Truck	84	40%	80
	Excavator	85	40%	81
			Total	86.7
Phase 1 Paving	Asphalt Paver	85	50%	82
	Steel Wheel Roller	74	40%	70
	Concrete Mixer Truck	85	40%	81
	Concrete Boom Pump Truck	82	20%	75
			Total	85.1
Phase 1 Tank	Truck Mounted Boom Crane	81	16%	73
Installation			Total	73.0
Phase 2 Limited	Tractor/Loader/Backhoe	80	40%	76
Grading	Excavator	85	40%	81
	Dump Truck/Hauling Truck	84	40%	80
	Delivery Truck	84	40%	80
			Total	85.7

Table 10 Construction Equipment Noise Levels							
		Maximum Noise		Maximum Average Hourly Noise Level			
		Level at 50 Feet	Typical Duty	at 50 Feet			
Phase/Activity	Equipment	[dB(A) L _{max}]	Cycle*	[dB(A) L _{eq}]			
Phase 2 Limited	Asphalt Paver	85	50%	82			
Paving	Steel Wheel Roller	74	40%	70			
	Concrete Mixer Truck	85	40%	81			
	Concrete Boom Pump Truck	82	20%	75			
			Total	85.1			
Phase 2 Tank	Truck Mounted Boom Crane	82	20%	75			
Installation			Total	73.0			

SOURCE: Federal Highway Administration 2006, FTA 2006, Navcon 2018.

The tank site would be on a lot that is currently surrounded by open space with an access road from the proposed road, Golden Meadows Parkway. Maximum noise levels would occur at the tank site. The closest existing residential use is located approximately 160 feet northwest of the tank site construction footprint. Future residential uses would be constructed as part of the Golden Meadows Development as close as 300 feet from the tank site, however, the residences would not be occupied until after construction of the first tank. Maximum noise levels would occur when the loudest construction equipment is nearest to a noise sensitive receiver. Construction noise is considered a point source that attenuates at a rate of 6 dB per doubling of distance. Construction noise levels were calculated assuming the simultaneous use of the equipment required for each phase. The construction noise levels are summarized in Table 11.

Table 11 Construction Noise Levels at Nearest Residential Use						
Phase	Equipment	Average Hourly Noise Level at 50 Feet	Average Hourly Noise Level at Nearest Residential Use (160 feet)			
Phase 1 Grading	Backhoe, Excavator, Dump Truck, Delivery Truck	85.7	75.5			
Phase 1 Blasting/Rock Crushing	Rock Drill, Crushing Processing Equipment, Dump Truck, Excavator	86.7	76.6			
Phase 1 Paving	Concrete Mixer Truck, Concrete Pump, Paver, Roller	85.1	75.0			
Phase 1 Tank Construction	Truck Mounted Boom Crane	73.0	62.9			
Phase 2 Grading	Backhoe, Excavator, Dump Truck, Delivery Truck	85.7	75.5			
Phase 1 Paving	Concrete Mixer Truck, Concrete Pump, Paver, Roller	85.1	75.0			
Phase 1 Tank Construction	Truck Mounted Boom Crane	73.0	62.9			
SOURCE: Appendix F.						

^{*}The duty cycle is the percentage of time that the equipment operates at full power.

^{**}Source noise levels for rock crushing equipment was obtained from the SoundPLAN program (Navcon 2018).

As shown, construction noise levels would not exceed 80 dB(A) L_{eq} at the nearest existing residential uses. All other residential uses are located at greater distances from the tank site, and construction noise levels would be less than those shown in Table 11. Installation of the second tank would require a limited amount of grading and paving since a majority of those activities would be completed as part of construction of the first tank. As a conservative assessment, the same grading and paving equipment modeled for Phase 1 was also modeled for Phase 2. Thus, construction noise levels associated with the second tank would be less than those shown in Table 11. It should also be noted that future residential uses constructed as part of the Golden Meadows Development would be occupied by the time the second tank is constructed, however, those residences are located at a greater distance from the tank site than the existing residential uses, therefore, noise levels at the Golden Meadows Development residences would be less than those shown in Table 11.

For construction of the new pipelines, construction noise from a linear project is assessed from the centerline of the alignment and work area. Maximum noise levels would occur when the loudest construction equipment is nearest to a noise sensitive receiver. Although construction equipment may temporarily be located at the point on the alignment nearest to a receiver, over time equipment would move along the alignment. Therefore, the distance from a receiver to the centerline of the alignment is not the same as the average distance during a given day from the receiver to construction equipment. Thus, average noise levels correlate to the area of active construction. Construction noise levels were calculated assuming the simultaneous use of two pieces of construction equipment. Based on the noise levels summarized in Table 10, the simultaneous operation of a backhoe and excavator would generate a maximum average hourly noise level of 82.2 dB(A) L_{eq} at 50 feet.

The phase 1 development includes the construction of a new 18-inch water line in Wickerd Road (1698 PZ) from Haun Road to Evans Road. The nearest existing residential uses are located at a distance of approximately 100 feet or more from this alignment. A maximum average hourly noise level of 82.2 dB(A) L_{eq} at 50 feet would attenuate to 76.2 dB(A) L_{eq} at 100 feet. Noise levels would be less than 80 dB(A) L_{eq}. The Golden Meadows Development would not be occupied prior to these construction activities.

No nighttime construction would be required. Construction activities would occur during the time allowable by the City's Development Code, 6:30 a.m. to 7:00 p.m. Monday through Saturday, and would not occur on Sundays or federal holidays. As construction activities would not exceed 80 dB(A) L_{eq} at the nearest residential uses and would comply with Development Code, construction noise would not be considered a substantial increase in ambient noise, and construction noise impacts would be less than significant.

b. Less Than Significant Impact

Human reaction to vibration is dependent on the environment the receiver is in as well as individual sensitivity. For example, vibration outdoors is rarely noticeable and generally not considered annoying. Typically, humans must be inside a structure for vibrations to become noticeable and/or annoying. Based on several federal studies, the threshold of perception is 0.035 inch per second (in/sec) peak particle velocity (PPV), with 0.24 in/sec PPV being a distinctly perceptible (Caltrans 2013). Based on best available data, impacts for hydraulic breakers, or hammers, and other non-transient sources such as those associated with project construction shall be

considered significant if the PPV exceeds 0.2 in/sec. The threshold for blasting vibration impacts, as established by the U.S. Bureau of Mines, is 2.0 in/sec PPV at the closest structure. Vibration perception would occur at structures, as people do not perceive vibrations without vibrating structures.

Operation of the project would not generate significant groundborne noise or vibration.

Construction activities produce varying degrees of ground vibration, depending on the equipment and methods employed. While ground vibrations from typical construction activities very rarely reach levels high enough to cause damage to structures, special consideration must be made when sensitive or historic land uses are near the construction site. The construction activities that typically generate the highest levels of vibration are blasting and impact pile driving. The project would not require pile driving but may require blasting.

Blasting Vibration

While almost all of the available energy from an explosion is used in breaking and displacing the rock mass, a small portion of the energy is released in the form of vibration waves that radiate away from the charge location. The strength, or "amplitude," of the waves reduces as the distance from the charge increases. The rate of amplitude decay depends on local geological conditions, but can be estimated with a reasonable degree of consistency, which allows regulatory agencies to control blasting operations by means of relationships between distance and explosive quantity.

The explosive charges used in mining and mass grading are typically wholly contained in the ground. Based on extensive research conducted by the U.S. Bureau of Mines and the Office of Surface Mining, universities, and private groups, vibration standards, vibration damage criteria, seismographs standards, and techniques to predict and control blast vibrations have been developed that greatly reduce the risk of off-site impacts from blasting.

Based similar blasting requirements, a typical shot designed to break up 10 cubic yards of material (typical truck load) would require about 11.25 pounds of explosive charge. The explosive would be detonated at each hole in a sequence with a delay between charges to limit the total amount of vibration generated by the explosive fire at any one time.

Ranges of vibration levels have been predicted at various distances from potential blasting sites for quantities of explosives ranging from 0.25 pound to 12 pounds per charge weight. The range of vibration levels in this analysis is due primarily to the quantity of explosive, as all other parameters were held constant. As shown in Table 12, at the nearest residence, blasting is predicted to generate vibration levels ranging from 0.04 in/sec PPV (from a 0.25-pound charge) to 0.87 in/sec PPV (from a 12-pound charge). Calculations are based on a receiver distance of 160 feet, which is the approximate distance to the nearest receiver from a potential blasting location.

Table 12 Predicted Blasting Vibration Levels by Charge Weight								
Distance to			Predicted \		•	rge Weight		
Non-Rippable Rock				(in/se	c PPV)			
(feet)	12 lb.	10 lb.	8 lb.	4 lb.	2 lb.	1 lb.	0.5 lb.	0.25 lb.
10	73.35	63.40	53.03	30.46	17.49	10.05	5.77	3.31
50	5.59	4.83	4.04	2.32	1.33	0.77	0.44	0.25
100	1.84	1.59	1.33	0.77	0.44	0.25	0.14	0.08
150	0.96	0.83	0.70	0.40	0.23	0.13	0.08	0.04
160 – nearest residence	0.87	0.75	0.63	0.36	0.21	0.12	0.07	0.04
200	0.61	0.53	0.44	0.25	0.14	0.08	0.05	0.03

SOURCE: Appendix F.

in/sec = inches per second; PPV = peak particle velocity; lb. = pound(s)

NOTE: Bold numbers indicate an exceedance of 2.0 in/sec PPV, which would be considered an impact.

As shown in Table 12, the nearest receiver located 160 feet from the project site is not anticipated to be exposed to vibration levels in excess of 2.0 in/sec PPV. The resulting PPV from blasting can be decreased through best engineering practices used by professional, licensed, blasters, including, but not limited to, orienting the progressions of the charges away from receivers, decreasing confinement of the explosive energy, increasing spatial distribution of the charges, and increasing time of energy release or detonation. All blasting activities would be required to comply with Section 5607 of the 2019 California Fire Code. Although a project-specific blasting plan and exact amount of explosive needed is not known at this time, the project would comply with the California Fire Code and would implement all feasible vibration reduction strategies. Because vibration levels would not exceed 2.0 in/sec PPV and because the project would comply with all applicable California Fire Code regulations, vibration impacts due to blasting would be less than significant.

Construction Equipment (Non-Blasting) Vibration

According to the FTA, loaded trucks generate vibration levels of 0.076 in/sec PPV at 25 feet. As discussed, the nearest residence is approximately 160 feet from the tank site. At this distance, vibration levels would attenuate to 0.01 in/sec PPV or less at the nearest residential use. Therefore, construction equipment vibration levels would be below the distinctly perceptible threshold, and impacts would be less than significant.

c. No Impact

The project site is not located within the vicinity of a private airstrip. The nearest airport is the Perris Valley Airport, which is located approximately 9.2 miles to the north. Therefore, the project site is not located within an airport land use plan or within two miles of a public airport and would not expose people to excessive noise levels. No impact would occur.

4.14 Population and Housing

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?				
b.	Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?				

EXPLANATIONS:

a. Less Than Significant Impact

Phase 1 (Tank 1) of the project would provide water service to the future Golden Meadows Development Project, which was approved by the City. Phase II (Tank 2) of the project would be constructed in the future when area development, consistent with adopted plans and policies, creates a need for additional service. At this time, it has been determined that a second tank would be needed when planned buildout occurs. Therefore, the project facilities would serve existing and planned future growth approved by local land use authorities. No growth outside of the District's service area would be induced by the project. Therefore, the project would not induce unplanned growth. Less than significant impacts would occur.

b. No Impact

The project site is currently vacant and undeveloped. Thus, the project would not displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere. No impact would occur.

4.15 Public Services

Would the project:

Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, need for new or physically altered governmental facilities, the construction of which could cause significant environmental impacts, in order to maintain acceptable service ratios, response times or other performance objectives for any of the public services:				
i. Fire protection?			\boxtimes	
ii. Police protection?				
iii. Schools?				
iv. Parks?				
v. Other public facilities?				

EXPLANATIONS:

a.i. Less than Significant Impact

The project would be required to comply with the design standards of the District for fire access and fire protection. Therefore, the project would not result in substantial adverse physical impacts associated with the provision of new or physically altered facilities, the need for new or physically altered government facilities, or other performance objectives for fire protection services. Therefore, impacts would be less than significant.

a.ii. Less than Significant Impact

This proposed water storage project would not increase in the need for new police protection. Protective fencing provided around the proposed improvements would include an 8-foot-high chain link fence with three strands of barbed wire and spiral concertina wire. In addition, a 16-foot double swing secured gate would be installed on the access road close to the site entrance.

The project would not require new or expanded police protection facilities. No impact would occur.

a.iii. No Impact

The project is limited to construction of one 2.0-million-gallon water tank, a pad for an additional future tank, along with associated pipelines and infrastructure and would not construct any residential uses that would generate any new student enrollment that would increase demand for school services. The project would primarily serve the proposed Golden Meadows development. Any other facilities that would be served by the project consist of existing development and planned growth that is already anticipated in the General Plan. Therefore, the project would not require new or expanded school facilities. No impact would occur.

a.iv. No Impact

The project is limited to water tank, along with an access road and other associated infrastructure and a pad for a future tank. The project would not construct any residential uses that would increase demand for school services. The proposed water tanks and associated infrastructure would primarily serve the proposed Golden Meadows development. Any other facilities that would be served by the project consist of existing development and planned growth that is already anticipated in the General Plan. Therefore, the project would not require new or expanded park facilities. No impact would occur.

a.v. No Impact

The project is limited to a water tank, a pad for a future water tank, an access road, and associated infrastructure, and would not construct any residential, commercial, or other uses that would require additional public services. No impact would occur.

4.16 Recreation

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
а.	Increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility would occur or be accelerated?				
b.	Include recreational facilities or require the construction or expansion of recreational facilities, which might have an adverse physical effect on the environment?				

EXPLANATIONS:

a. No Impact

The project is limited to a water tank, a pad for a future tank, an access road and associated infrastructure including a water pipeline that would serve the future development on the adjacent Golden Meadows Development Project, as well as existing developments and planned growth that is already anticipated in the General Plan. Therefore, the project would not result in an increase in population that would cause substantial physical deterioration of recreational facilities through increased use. No impact would occur.

b. No Impact

The project is limited to utility infrastructure improvements that would not result in the construction of recreational facilities, nor would it increase demand for construction or expansion of recreational facilities. No impact would occur.

4.17 Transportation/Traffic

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Conflict with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle and pedestrian facilities?				
b.	Conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?				
C.	Substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?				
d.	Result in inadequate emergency access?				

EXPLANATIONS:

a. Less Than Significant Impact

The project is limited to a water tank, a pad for a future tank, an access road, and associated infrastructure including a pipeline, and would not construct any residential, commercial, or other uses that would generate vehicle trips. Operational traffic trips would be limited to periodic maintenance and inspection that would not significantly affect intersection and roadway operations.

Access to the project site would be via Wickerd Road. Vehicle trips associated with project construction would be minimal and would not affect intersection and roadway segment operations on the surrounding roadway network. The project would generate vehicle trips during construction in the form of haul trucks and worker commute vehicles; however, the number of vehicles generated would be limited and would not result in congestion on nearby roadways. Construction vehicle generation would also be temporary. Minor increases in vehicle congestion may occur; however, traffic volumes on Wickerd Road are low and the project would implement traffic control measures to maintain vehicular flow if necessary. Roadways would be restored to pre-existing conditions once construction is completed.

The project would not impact alternative modes of transportation. Construction would not occur within sidewalks, and the project would maintain pedestrian access during construction. There are no bicycle lanes or bus stops located along Wickerd Road. Therefore, the project would not conflict with a program, plan, ordinance, or policy addressing the circulation system, and impacts would be less than significant.

b. Less Than Significant Impact

As described in Section 4.17a above, vehicle trips associated with project construction would be minimal and would not affect intersection and roadway segment operations on the surrounding roadway network. Additionally, operational vehicle trips would be limited to periodic maintenance and inspection that would not affect intersection and roadway operations. Therefore, preparation of a Vehicle Miles Traveled Analysis per CEQA Guidelines Section 15064.3, subdivision (b) was not required, and impacts would be less than significant.

c. Less Than Significant Impact

The project is limited to a 2.0-million-gallon water tank, a pad for a future second 2.0-million-gallon water tank, and associated infrastructure including an 18-inch diameter water pipeline in Wickerd Road, and would not result in any permanent changes to the existing circulation network. Construction within the right-of-way for Wickerd Road would be temporary and include traffic control measures to allow continued access. Roadways would be restored to pre-existing conditions once construction is completed. Therefore, the project would not substantially increase hazards due to a design feature (e.g., sharp curves or dangerous intersections) or incompatible uses, and impacts would be less than significant.

d. Less Than Significant Impact

The project is limited to a water tank, a pad for a future tank, an access road, and associated infrastructure including a pipeline, and would not result in any permanent changes to the existing

circulation network. Construction within the right-of-way for Wickerd Road would be temporary and include traffic control measures to allow continued access. The road would be restored to pre-existing conditions once construction is completed. As described in Section 4.17a above, vehicle trips generated during construction and operation would not affect intersection and roadway operations. Therefore, the project would not result in inadequate emergency access to or from the project site, and impacts would be less than significant.

4.18 Tribal Cultural Resources

Would the project:

Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a. Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code section 21074 as either a site, feature, place, cultural landscape that is geographically defined in terms of the size and scope of the landscape, sacred place, or object with cultural value to a California Native American tribe, and that is:				
i. Listed or eligible for listing in the California Register of Historical Resources, or in a local register of historical resources as defined in Public Resources Code Section 5020.1(k)?				

Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
ii. A resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant pursuant to criteria set forth in subdivision (c) of Public Resources Code Section 5024.1. In applying the criteria set forth in subdivision (c) of Public Resource Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe?				

EXPLANATIONS:

a.i. Potentially Significant Unless Mitigation Incorporated

AB 52 establishes a formal consultation process between the lead agency, the District, and all California Native American Tribes within the area regarding tribal cultural resource evaluation. AB 52 mandates that the lead agency must provide formal written notification to the designated contact of traditionally and culturally affiliated California Native American Tribes that have previously requested notice. Native American Tribes are notified early in the project review phase by written notification that includes a brief description of the proposed project, location, and the lead agency's contact information. The Tribal contact then has 30 days to request project-specific consultation pursuant to this section (Public Resources Code §21080.1).

As a part of the consultation pursuant Public Resources Code §21080.3.1(b), both parties may suggest mitigation measures (Public Resources Code §21082.3) that can avoid or substantially lessen potential significant impacts to tribal cultural resources or provide alternatives that would avoid significant impacts to a tribal cultural resource. The California Native American Tribe may request consultation on mitigation measures, alternatives to the project, or significant effects. The consultation may also include discussion on the environmental review, the significance of tribal cultural resources, the significance of the project's impact on the tribal cultural resources, project alternatives, or the measures planned to preserve or mitigate impacts on resources. Consultation shall end when either 1) both parties agree on the mitigation measures to avoid or mitigate significant effects on a tribal cultural resource, or 2) a party, acting in good faith and after reasonable effort, concludes that mutual agreement cannot be reached.

Per AB 52, the District initiated consultation with Native American Tribes that are traditionally and culturally affiliated with the geographic area of the project to identify resources of cultural or spiritual

value to the Tribe. On January 21, 2022, the District sent consultation notification letters to Native American Tribes on the District's Master List pursuant to the requirements of AB 52 pertaining to government-to government consultation. Table 13 summarizes the District's consultation efforts. To date, the District has conducted consultation with two federally recognized Native American Tribes: The Pechanga Band of Luiseño Indians (Soboba) and the Rincon Band of Luiseño Indians (Rincon). An additional four Native American Tribes were contacted but declined consultation or did not respond, as noted in Table 13.

Table 13 Assembly Bill 52 Consultation					
	Individual		Response		
Tribe	Contacted	Date Letter Mailed	Received	Consultation Held	
Soboba	Joe Ontiveros	January 21, 2022	DNR	N/A	
Pechanga	Ebru Ozdil	January 21, 2022	February 25, 2022	March 22, 2022	
Rincon	Cheryl Madrigal	January 21, 2022	February 17, 2022	March 2, 2022	
Agua Caliente	Katie Croft	January 21, 2022	March 1, 2022	N/A	
San Manuel	Jessica Mauck	January 21, 2022	February 25, 2022	N/A	
Morongo	Travis Armstrong	January 21, 2022	DNR	N/A	
DNR = Did not respond; N/A = Consultation was not requested					

During consultation meetings, the responding Tribes highlighted their concerns for the general area noting that important gathering sites were in close proximity to the project site, and that the hill is an important viewshed between villages. The consulting tribes stated that there is the potential to uncover unknown artifacts while grading the site and recommended tribal monitoring. Based on the cultural sensitivity of the area, tribal cultural resources may potentially be present within the project's proposed footprint. Therefore, the project may have the potential to affect tribal cultural resources during ground-disturbing activities, such as grading and trenching.

a.ii. Potentially Significant Unless Mitigation Incorporated

L&L conducted a survey of the 5.6-acre project area as part of larger residential development project between December 10 and 13, 2021. L&L recorded a bedrock milling site (CC-04) with a total of three slicks within the APE. Given past disturbances, the possibility of buried significant cultural resources being present within the project APE is considered low. However, due to the positive results of the NAHC search to identify spiritually significant and/or sacred sites or traditional use areas, construction activities would have the potential to unearth previously unknown tribal cultural resources, the discovery of which could be considered a significant impact. Implementation of mitigation measures CUL-1 through CUL-5 described in Section 4.5b above would reduce impacts to a level less than significant.

4.19 Utilities and Service Systems

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Require or result in the relocation or construction of new or expanded water or wastewater treatment or storm water drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?				
b.	Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?				
C.	Result in a determination by the wastewater treatment provided which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?				
d.	Generate solid waste in excess of state or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?				
e.	Comply with federal, state, and local statutes and regulation related to solid waste?			\boxtimes	

EXPLANATIONS:

a. Less than Significant Impact

The project would require electricity and a connection to the District's water distribution system but does not involve construction of new or expansion of existing wastewater, natural gas or telecommunication facilities. The project would contain and convey potable water but would not generate water demand in and of itself. Further, it would not generate wastewater. Any on-site stormwater runoff would be conveyed, collected, and treated on-site according to District standards. No impacts would occur.

b. Less Than Significant Impact

The proposed water tanks and associated infrastructure would primarily serve the proposed Golden Meadows development. Any other facilities that would be served by the project consist of existing development and planned growth that is already anticipated in the General Plan. Water consumption would be limited to small amounts during construction. Therefore, the project would have sufficient water supplies available to serve the project, and impacts would be less than significant.

c. No Impact

The project is limited to construction of one 2.0-million-gallon water tank, a pad for an additional future tank, along with associated pipelines and infrastructure and would not construct any residential uses that would require expanded wastewater treatment capacity. The proposed water pipeline would primarily serve the proposed Golden Meadows development. Any other facilities that would be served by the project consist of existing development and planned growth that is already anticipated in the General Plan. Therefore, the project would not exceed existing wastewater treatment capacity and would accommodate existing and planned growth in the City. No impact would occur.

d. Less Than Significant Impact

Project construction would generate small amounts of waste that would likely be disposed of at either the Badlands Sanitary Landfill, located in Moreno Valley, or the El Sobrante Landfill, located in Corona. The Badlands Landfill has a remaining capacity of 15,748,799 cubic yards and a maximum permitted throughput of 4,800 tons per day and the El Sobrante Landfill has a remaining capacity of 143,977,170 cubic yards and a maximum permitted throughput of 16,054 tons per day (California Department of Resources Recycling and Recovery 2020). Both landfills would have sufficient capacity to accommodate the small amounts of waste that would be generated during construction. Operation of the project would not generate any solid waste. Therefore, the project would not generate solid waste in excess of state or local standards, or in excess of the capacity of local infrastructure, and impacts would be less than significant.

e. Less Than Significant Impact

As described in Section 4.19d above, the project would generate small amounts of waste during construction that would be disposed of at either the Badlands Sanitary Landfill, located in Moreno Valley, or the El Sobrante Landfill, located in Corona, which both have adequate capacity. The project would also comply with local regulations pertaining to recycling of construction waste. Operation of the project would not generate any solid waste. Therefore, the project would comply with federal,

state, and local statutes and regulation related to solid waste, and impacts would be less than significant.

4.20 Wildfire

Would the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Substantially impair an adopted emergency response plan or emergency evacuation plan?				
b.	Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to, pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?				
C.	Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines, or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?				
d.	Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?				

EXPLANATIONS:

a. Potentially Significant Unless Mitigation Incorporated

Construction of the project may potentially result in temporary traffic obstructions. However, implementation of mitigation measure WILD-1 would require detailed traffic control plan to coordinate lane closures, access, and construction work hours in order to minimize potential impacts associated with emergency response. Thus, the project would not substantially impair an adopted

emergency response plan or emergency evacuation plan. Implementation of mitigation measure WILD-1 would reduce emergency response related impacts to a less than significant.

b-d. Less Than Significant Impact

The project site is identified by the Sun City/Menifee Valley Area Plan Wildfire Susceptibility Map as a high fire hazard. Riverside County's Wildland Urban Interface identifies that communities create extremely dangerous and complex fire conditions, posing a threat to public and firefighter safety. As wildland fires meet structural developments, vegetation ceases to burn but catastrophic fire can continue, sustained by structures igniting. However, the project involves construction and operation of a water tank which would not expose a significant number of people to injury or death due to wildland fires. All construction would be required to comply with fire protection and prevention requirements specific by state law (California Code of Regulations) and the California Division of Occupational Safety and Health. This includes various measures such as easy accessibility of firefighting equipment, proper storage of combustible liquids, no smoking in service and refueling areas, and worker training for firefighter extinguisher use. Further, all new construction would be required to comply with the California Fire and Building Codes. Additionally, the project would be required to comply with all regulatory requirements concerning fire protection.

Further, the project design conveys flows to be collected by catch basins connected to the municipal storm drain in the access road. The storm flows would ultimately connect to the municipal storm drain and would flow into the proposed extended detention basin that would be located in the northwesterly most corner of the overall project site. As such, flows would not impact the tank and its facilities or create additional runoff that could impact adjacent properties. The drainage infrastructure would enable stormwater to flow around or through the site in a manner that would prevent flooding or landslides. As discussed in more detail in Section 4.10, Hydrology and Water Quality, the project would not significantly impact drainage patterns, flooding, or cause landslides. Thus, although the project is located in a high fire hazard area, it would not exacerbate wildfire risks, due to slope, prevailing winds, and other factors, thereby exposing project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire because the project does not include occupants. Further, the project does not require the installation maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment and does not expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes. Therefore, impacts would be less than significant.

Mitigation Measures

WILD-1: Emergency Response Traffic Control Plan. Prior to the start of construction, the construction contractor shall be required to prepare a detailed traffic control plan to coordinate lane closures, access, and construction work hours in order to minimize potential impacts associated with emergency response.

4.21 Mandatory Findings of Significance-

Does the project:

	Issue	Potentially Significant Impact	Potentially Significant Unless Mitigation Incorporated	Less Than Significant Impact	No Impact
a.	Have the potential to substantially 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, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory?				
b.	Have impacts that are individually limited, but cumulatively considerable? ("Cumulatively considerable" means that the incremental effects of a project are considerable when viewed in connection with the effects of past projects, the effects of other current projects, and the effects of probable futures projects)?				
C.	Have environmental effects, which will cause substantial adverse effects on human beings, either directly or indirectly?			\boxtimes	

EXPLANATIONS:

a. Potentially Significant Unless Mitigation Incorporated

As described in Section 4.4a, implementation of mitigation measure BIO-1 would reduce the potential impacts on western burrowing owl to a level less than significant, implementation of mitigation measure BIO-2 would reduce impacts to migratory birds and raptors to a level less than significant, and implementation of mitigation measure BIO-3 would reduce impacts to Stephen's

kangaroo rat to a level less than significant. The project does not have the potential to result in any other impacts that would substantially 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, substantially reduce the number or restrict the range of a rare or endangered plant or animal or eliminate important examples of the major periods of California history or prehistory. As described in Section 4.5a, the project would not impact any historical resources.

b. Potentially Significant Unless Mitigation Incorporated

Project impacts requiring mitigation are limited to biological resources. As described in Section 4.4a, implementation of mitigation measure BIO-1 would reduce impacts related on western burrowing owl to a level less than significant, implementation of mitigation measure BIO-2 would reduce impacts to migratory birds or raptor species I to a level less than significant, and implementation of mitigation measure BIO-3 would reduce impacts related to Stephen's kangaroo rat to a level less than significant. Implementation of BIO-1, BIO-2, and BIO-3 would also ensure consistency with the MSHCP. By mitigating project-level impacts to a level less than significant, the project would not contribute to existing cumulative impact to biological resources. As described in Section 4.5b, implementation of mitigation measures CUL-1 through CUL-5 would reduce impacts on archaeological resources to a level less than significant. As described in Section 4.5c, implementation of mitigation measures CUL-6 and CUL-7 would reduce impacts on human remains to a level less than significant. A described in Section 4.20a, implementation of mitigation measure WILD-1 would reduce emergency response related impacts to a level less than significant. As described throughout the IS/MND, all other project-level impacts would be less than significant without mitigation. Consequently, the project would not result in any project-level significant impacts that could contribute to an existing cumulative impact on the environment.

c. Less Than Significant Impact

As described in Sections 4.1 through 4.20, the project would not result in any substantial adverse direct or indirect impacts to human beings. Therefore, impacts would be less than significant.

5.0 Preparers

Eastern Municipal Water District

Al Javier, Director of Environmental Regulatory Compliance Joe Broadhead, Principal Water Resource Specialist, CEQA/NEPA Maroun El-Hage, Principal Civil Engineer Brian Raines, Associate Civil Engineer, II

RECON Environmental, Inc., 3111 Camino del Rio North, Suite 600, San Diego, CA 92108

Michael Page, AICP, Project Director

Morgan Weintraub, Project Manager

Natasha Dulik, Assistant Environmental Planner

Carmen Zepeda-Herman, Senior Archaeologist

Cailin Lyons, Biology Director

Jessica Fleming, Air Quality/GHG/Noise Analyst

Benjamin Arp, GIS Specialist

Jennifer Gutierrez, Production Specialist

Visual Perspective

Peter Langenfeld, Visual Resources Specialist

6.0 Sources Consulted

Aesthetics

California Department of Transportation (Caltrans)

California State Scenic Highway Scenic Map. https://caltrans.maps.arcgis.com/apps/webappviewer/index.html?id=465dfd3d807c46cc8e8057116f1aacaa. Accessed August 8, 2022.

Agriculture and Forest Resources

California Department of Conservation

2018 California Important Farmland Finder. https://maps.conservation.ca.gov/dlrp/ciff/.

Air Quality

Bay Area Air Quality Management District

2017 California Environmental Quality Act Air Quality Guidelines. May.

California Air Pollution Control Officers Association (CAPCOA)

2021 California Emissions Estimator model (CalEEMod). User's Guide Version 2020.4.0. May 2021.

Office of Environmental Health Hazard Assessment (OEHHA)

2015 Air Toxics Hot Spots Program Guidance Manual for the Preparation of Risk Assessments (Guidance Manual), February.

South Coast Air Quality Management District (SCAQMD)

1993 SCAQMD CEQA Air Handbook. November.

2008 Final Localized Significance Threshold Methodology. July.

2015 SCAQMD Air Quality Significance Thresholds. Updated March 2015.

T&B Planning, Inc.

2022 Personal communication via email to RECON from Tina Prater, Director of Development Services. January 13, 2022.

Urban Crossroads, Inc.

Tentative Tract 31194 Traffic Impact Analysis (Revised), County of Riverside, California. Prepared for Woodside Homes of California, Inc. JN 01098-04. Revised November 22, 2004.

U.S. Environmental Protection Agency (U.S. EPA)

1992 Screening Procedures for Estimating the Air Quality Impact of Stationary Sources.

Biological Resources

California Department of Fish & Wildlife

2012 Staff Report on Burrowing Owl Mitigation

Beier, P., and S. Loe

1992 A Checklist for Evaluating Impacts to Wildlife Movement Corridors. Wildlife Society Bulletin 20: 434-440.

Riverside, County of

2003 Western Riverside County Multiple Species Habitat Conservation Plan (MSHCP). Prepared by Dudek and Associates. Approved June 17. https://www.wrc-rca.org/Permit_Docs/MSHCP/MSHCP-Volume%201.pdf.

Riverside County Habitat Conservation Agency

1996 Habitat Conservation Plan for the Stephens' Kangaroo Rat in Western Riverside County California. March. https://www.rchca.us/DocumentCenter/View/549/SKR-Habitat-Conservation-Plan.

Cultural Resources

Hoover, A. and K. Belvins

A Phase I Archaeological and Paleontological Survey Report for Menifee Assemblages. TT#31194, APNs 360-300-002 to -006, -009, and 360-350-001, Menifee, County of Riverside, California. Unpublished report on file with L&L Environmental, Inc.

Irish, Leslie and Barbara Loren-Webb

2013 A Phase I Cultural Resources Assessment Update: Golden Meadows, City of Menifee, California and Phase II Testing. Unpublished report on file with L&L Environmental, Inc.,

Geology and Soils

California Department of Transportation (Caltrans)

2003 Construction Site Best Management Practices Manual. https://dot.ca.gov/programs/construction/storm-water-and-water-pollution-control/manuals-and-handbooks

California Stormwater Quality Association

2015 Stormwater Best Management Practice Handbooks. https://www.casqa.org/resources/bmp-handbooks

Greenbook Committee of Public Works Standards, Inc.,

2015 Standard Specifications for Public Works Construction.

International Conference of Building Officials.

2012 International Building Code. https://codes.iccsafe.org/content/IBC2012/preface

Menifee, City of

2013 Menifee General Plan. Adopted 2013. https://www.cityofmenifee.us/DocumentCenter/ View/14707/FINAL_Safety-Element-11222_complete.

Greenhouse Gas Emissions

South Coast Air Quality Management District (SCAQMD)

- 2008 Interim CEQA GHG Significance Thresholds for Stationary Sources, Rules, and Plans.
- Greenhouse Gas CEQA Significance Threshold Stakeholder Working Group 14. http://www.aqmd.gov/ceqa/handbook/GHG/2009/nov19mtg/ghgmtg14.pdf.
- 2010 Greenhouse Gas CEQA Significance Thresholds Stakeholder Working Group 15. September 28.

Hazards and Hazardous Materials

Department of Toxic Substances Control

2022 DTSC's Hazardous Waste and Substances Site List – Site Cleanup (Cortese List). https://dtsc.ca.gov/dtscs-cortese-list/.

Mineral Resources

Menifee, City of

2013 Menifee General Plan. Adopted 2013.

Noise

California Department of Transportation (Caltrans)

2013 Technical Noise Supplement. November.

Federal Highway Administration (FHWA)

2006 Roadway Construction Noise Model User's Guide. FHWA-HEP-05-054, SOT-VNTSC-FHWA-05-01. Final Report. January.

Federal Transit Administration (FTA)

2006 Transit Noise and Vibration Impact Assessment. Washington, DC. May.

Navcon Engineering, Inc.

2018 SoundPLAN Essential version 4.1.

Utilities and Service Systems

California Department of Resources Recycling and Recovery (CalRecycle)

2020 Solid Waste Information System. https://www2.calrecycle.ca.gov/swfacilities/Directory/.