

Initial Study/Mitigated Negative Declaration

## Sewer Relief Trunk – from Renz Lane to Highland Avenue Project

Prepared by the



In Consultation with



October 2020







COMMUNITY DEVELOPMENT DEPARTMENT, PLANNING DIVISION

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## MITIGATED NEGATIVE DECLARATION

### I. DESCRIPTION OF PROJECT:

**Project Title:** Sewer Relief Trunk – from Renz Lane to Highland Avenue Project

**Project Location:** The 6.6-mile sewer trunk line extends from Renz Lane in the City of Gilroy to Highland Avenue within the unincorporated San Martin planning area of the Santa Clara County.

**Project Proponent:** City of Morgan Hill, 17575 Peak Avenue, Morgan Hill, CA 95037

**Project Description:** The Sewer Relief Trunk – from Renz Lane to Highland Avenue Project (“Project”) proposes the installation of approximately 6.6 miles of sewer pipeline that would extend from the termination of the previously constructed Harding Avenue segment of the sewer relief trunk located at the intersection of Harding Avenue and Highland Avenue in San Martin, southeast to the previously constructed City of Gilroy segment of the sewer relief trunk located on Renz Lane in Gilroy. The proposed sewer relief trunk alignment would be located mostly within the existing roadway right-of-way, plus a few new utility easements. Generally, the trunk line would be located in the paved roadway, unimproved private roadway, two highway crossings, one railroad crossing, and two waterway crossings.

### II. DETERMINATION

In accordance with the City of Morgan Hill procedures for compliance with the California Environmental Quality Act (CEQA), the City has completed an Initial Study to determine whether the proposed project may have a significant adverse effect on the environment. On the basis of that study, the City makes the following determination:

- Although the project, as proposed, could have had a significant effect on the environment, there will not be a significant effect in this case because mitigation measures are included in the project, and, therefore, this **MITIGATED NEGATIVE DECLARATION** has been prepared.

### **III. CONDITIONS (Mitigation and Conditions of Approval):**

#### **A. Air Quality**

**Impact AIR-2:** Construction activities associated with the project could result in emissions of NO<sub>x</sub> in excess of Bay Area Air Quality Management District (BAAQMD) thresholds, potentially resulting in a considerable net increase of ground level ozone, a criteria pollutant for which the project region is considered a non-attainment area.

**Mitigation Measures:** Implementation of the following mitigation measures would reduce the NO<sub>x</sub> emissions below the significance threshold:

**MM AIR-2.1:** During any construction period ground disturbance, the applicant shall ensure that the project contractor implement measures to control dust and exhaust. Implementation of the measures recommended by BAAQMD and listed below would reduce the air quality impacts associated with grading and new construction to a less than significant level. Additional measures are identified to reduce construction equipment exhaust emissions. The contractor shall implement the following best management practices that are required of all projects:

- All exposed surfaces (e.g., parking areas, staging areas, soil piles, graded areas, and unpaved access roads) shall be watered two times per day.
- All haul trucks transporting soil, sand, or other loose material off-site shall be covered.
- All visible mud or dirt track-out onto adjacent public roads shall be removed using wet power vacuum street sweepers at least once per day. The use of dry power sweeping is prohibited.
- All vehicle speeds on unpaved roads shall be limited to 15 miles per hour (mph).
- All roadways, driveways, and sidewalks to be paved shall be completed as soon as possible. Building pads shall be laid as soon as possible after grading unless seeding or soil binders are used.
- Idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to five (5) minutes (as required by the California airborne toxics control measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
- All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified mechanic and determined to be running in proper condition prior to operation.
- Post a publicly visible sign with the telephone number and person to contact at the Lead Agency regarding dust complaints. This person shall respond and take corrective action within 48 hours. The Air District's phone number shall also be visible to ensure compliance with applicable regulations.



**MM AIR-2.2:**

The project shall develop a plan demonstrating that the off-road equipment to be used in the construction project and hauling truck traffic would achieve a 20-percent NOx reduction compared to the CalEEMod modeled emissions used in this report. In addition, the plan would reduce diesel particulate matter exhaust emissions from microtunneling activities by 75 percent. Acceptable options for reducing emissions include the use of late model engines, low-emission diesel products, alternative fuels, engine retrofit technology, after-treatment products, add-on devices such as particulate filters, and/or other options as such become available. One feasible plan to achieve this reduction would include the following:

- During all Open Trenching Pavement and No Pavement portions, all diesel-powered off-road equipment, larger than 25 horsepower operating on the site for more than two days continuously shall, at a minimum, meet U.S. EPA emissions standards for Tier 3 engines or equivalent.
- During all Microtunneling portions, all diesel-powered off-road equipment, larger than 25 horsepower, operating on the site for more than two days continuously shall, at a minimum, meet U.S. EPA particulate matter emissions standards for Tier 4 interim engines or equivalent.
- Alternatively, for all portions of construction, the use of equipment meeting U.S. EPA Tier 3 standards for particulate matter that are equipped with CARB-certified Verifiable Diesel Emission Control Devices (VDECs) that altogether achieve an 85 percent reduction in particulate matter exhaust or the use of equipment that includes electric or alternatively-fueled equipment (i.e., non-diesel) would meet this requirement.

**B. Biological Resources**

**Conditions of Approval BIO-1:** To avoid and minimize the potential impacts to nesting birds and burrowing owls and maintain compliance with the Migratory Bird Treaty Act (MBTA) and California Fish and Game Code (CFGF), the following conditions of approval are recommended:

- If construction activities are initiated during the nesting season (February 1 – August 31), a nesting bird survey (including for burrowing owl) shall be conducted by a qualified biologist within 14 days prior to the start of construction. In areas of potential burrowing owl habitat, an additional survey shall be completed within 48 hours of the start of construction. If nests are present, exclusion buffers appropriate to the species shall be established by the qualified biologist to prevent impacts to nesting birds. No work shall be completed within the buffers until the biologist determines that young have fledged or the nest becomes inactive.
- If construction activities are initiated outside of the nesting season (September 1 – January 31), pre-construction surveys for over-wintering burrowing owl shall be conducted at the portion of the alignment along West Las Animas Avenue between Monterey Highway and Murray Avenue in the City of Gilroy where ground squirrels were observed to be active. Surveys shall be conducted within 14 days of the start of construction and assess the immediate vicinity of the project area as well as a 250-foot buffer. Surveys shall be conducted by a qualified biologist, and assess extant ground squirrel burrows of suitable size for the presence of burrowing owls or signs of burrowing owl occupancy (i.e. whitewash, pellets, feathers). If burrowing owl are discovered within 250 feet

of areas of construction disturbance, exclusion buffers appropriate to the conditions present shall be established by the qualified biologist. No work shall be completed within the buffers until the burrow has been determined abandoned by a qualified biologist.

#### C. Cultural Resources

**Conditions of Approval CUL-2:** I Although it is extremely unlikely that cultural resources, including human remains, would be encountered during construction of the proposed project alignment, the following measures shall be incorporated to ensure potential impacts to cultural resources are avoided:

- If buried or previously unrecognized archaeological deposits or materials of any kind are inadvertently exposed during any construction activity, work within 100 feet/30 m of the find shall cease until a qualified archaeologist can assess the find and provide recommendations for further treatment, as warranted. Construction and potential impacts to the area(s) within a radius determined by the archaeologist should not recommence until the assessment is complete and any mitigation measures warranted are implemented.
- If any human remains are found during any field investigations, grading, or other construction activities, all provisions of California Health and Safety Code Sections 7054 and 7050.5 and Public Resources Code Sections 5097.9 through 5097.99, as amended per Assembly Bill 2641, shall be followed. In the event of the discovery of human remains during construction, there shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent remains. The project applicant shall immediately notify the Santa Clara County Coroner/Medical Examiner's Office. The Coroner will make a determination as to whether the remains are Native American.

If the remains are believed to be Native American, the Coroner shall contact the Native American Heritage Commission (NAHC) within 24 hours. The NAHC will then designate a Most Likely Descendant (MLD). The MLD will inspect the remains and make a recommendation on the treatment of the remains and associated artifacts.

If one of the following conditions occurs, the landowner or his authorized representative shall work with the Coroner to reinter the Native American human remains and associated grave goods with appropriate dignity in a location not subject to further subsurface disturbance:

- The Native American Heritage Commission is unable to identify a most likely descendent or the most likely descendent failed to make a recommendation within 48 hours after being notified by the Commission.
- The descendant identified fails to make a recommendation; or
- The landowner or his authorized representative rejects the recommendation of the descendant, and the meditation by the NAHC fails to provide measures acceptable to the landowner.

#### D. Geology and Soils

**Conditions of Approval GEO-6:** The following measures shall be incorporated to ensure potential impacts to paleontological resources are avoided:

- **Discovery of Paleontological Resources.** In the event that a fossil is discovered during construction of the project, excavations within 50 feet of the find shall be temporarily halted or delayed until the discovery is examined by a qualified paleontologist, in accordance with Society of Vertebrate Paleontology standards. The City shall include a standard inadvertent discovery clause in every construction contract to inform contractors of this requirement. If the find is determined to be significant and if avoidance is not feasible, the paleontologist shall design and carry out a data recovery plan consistent with the Society of Vertebrate Paleontology standards.

#### E. Hazards and Hazardous Materials

**Impact HAZ-2:** Construction workers and adjacent residences could be exposed to residual contamination in on-site soils.

**Mitigation Measures:** The following measures shall be implemented during site clearing and grading to reduce exposure to residual concentrations of agricultural chemicals:

**MM HAZ-2.1:** Prior to construction activities, the project contractor(s) shall implement a Site Management Plan (SMP) and Health and Safety Plan (HSP) for the proposed sewer construction activities, that establishes management practices for handling contaminated soil, soil vapor, groundwater or other materials during construction. The SMP shall be prepared by an Environmental Professional and shall be submitted to the County Department of Environmental Health (DEH) for review and approval prior to the start of construction. The approved SMP shall also be provided to the City of Morgan Hill prior to ground disturbance.

**MM HAZ-2.2:** Soil materials removed from the site shall be characterized and disposed of according to the California Hazardous Waste Regulations. Contaminated soil that exceeds regulatory thresholds shall be handled by trained personnel using appropriate protective equipment and engineering and dust controls, in accordance with local, state and federal laws. Any contaminated soils that are removed from the site shall be disposed of at a licensed hazardous materials disposal site.

**MM HAZ 2.3:** If groundwater dewatering is to be conducted, a Dewatering Plan shall be prepared documenting the dewatering method, groundwater sampling and analyses, groundwater treatment (if required), permitting requirements, and discharge location. This plan shall be submitted to the EPA for review and approval prior to construction.

#### F. Hydrology and Water Quality

**Condition of Approval HYD-1:** The project will be required to implement standard measures listed below as a standard condition prior to issuance of a grading permit. Conformance with the measures in the Erosion Control Plan would reduce the potential for substantial adverse impacts to water quality during construction:

- In accordance with the City of Morgan Hill Standard Conditions of Approval and the General National Pollutant Discharge Elimination System Storm Water Permit for Construction Activities,



the project would prepare a Storm Water Pollution Prevention Plan (SWPPP) and an Erosion Control Plan (ECP). The plans will be submitted to the Director of Public Works and Central Coast Regional Water Quality Control Board for review and approval, prior to issuance of a grading permit. The ECP and SWPPP would demonstrate how the project would eliminate or reduce non-stormwater discharges into the stormwater system, how discharges into the stormwater system would be monitored, and what Best Management Practices (BMPs) would be implemented by the project to avoid water quality impacts during construction (e.g., street sweeping, fiber rolls, temporary cover and/or permanent cover) and post-construction periods.

### **III. FINDING**

The City of Morgan Hill Community and Economic Development Director hereby finds that the proposed project could have a significant effect on the environment; however, there would not be a significant effect in this case because mitigation measures summarized above and described in the Initial Study are included in the project.

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Jennifer Carman, Director  
Development Services Department  
City of Morgan Hill

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Date

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## **SECTION 1.0 INTRODUCTION AND PURPOSE**

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### **1.1 PURPOSE OF THE INITIAL STUDY**

The City of Morgan Hill, as the Lead Agency, has prepared this Initial Study for the Sewer Relief Trunk – from Renz Lane to Highland Avenue Project, in compliance with the California Environmental Quality Act (CEQA), the CEQA Guidelines (California Code of Regulations §15000 et. seq.) and the regulations and policies of the City Morgan Hill, California.

The project proposes to install an approximately 6.6 mile sewer pipeline extending from Gilroy to Morgan Hill. This Initial Study evaluates the environmental impacts that might reasonably be anticipated to result from implementation of the proposed project.

### **1.2 PUBLIC REVIEW PERIOD**

Publication of this Initial Study marks the beginning of a 30-day public review and comment period. During this period, the Initial Study will be available to local, state, and federal agencies and to interested organizations and individuals for review. Written comments concerning the environmental review contained in this Initial Study during the 30-day public review period should be sent to:

David Gittleston, Associate Engineer  
City of Morgan Hill – Utilities and Engineering Department  
17575 Peak Avenue  
Morgan Hill, CA 95037  
408.310.4642  
[david.gittleston@morganhill.ca.gov](mailto:david.gittleston@morganhill.ca.gov)

### **1.3 CONSIDERATION OF THE INITIAL STUDY AND PROJECT**

Following the conclusion of the public review period, the City of Morgan Hill will consider the adoption of the Initial Study/Mitigated Negative Declaration (MND) for the project at a regularly scheduled meeting. The City shall consider the Initial Study/MND together with any comments received during the public review process. Upon adoption of the MND, the City may proceed with project approval actions.

### **1.4 NOTICE OF DETERMINATION**

If the project is approved, the City of Morgan Hill will file a Notice of Determination (NOD), which will be available for public inspection and posted within 24 hours of receipt at the County Clerk's Office for 30 days. The filing of the NOD starts a 30-day statute of limitations on court challenges to the approval under CEQA (CEQA Guidelines Section 15075(g)).



## **SECTION 2.0 PROJECT INFORMATION**

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### **2.1 PROJECT TITLE**

Sewer Relief Trunk – from Renz Lane to Highland Avenue Project (Sewer Relief Trunk Project)

### **2.2 LEAD AGENCY CONTACT**

David Gittleson, Associate Engineer  
City of Morgan Hill –Engineering and Utilities Department  
17575 Peak Avenue  
Morgan Hill, CA 95037  
408.310.4642  
[david.gittleson@morganhill.ca.gov](mailto:david.gittleson@morganhill.ca.gov)

### **2.3 PROJECT APPLICANT**

City of Morgan Hill.

### **2.4 PROJECT LOCATION**

The proposed project alignment is located in the unincorporated Santa Clara County in the San Martin planning area and the City of Gilroy. Project limits include Highland Avenue to approximately Conhansey Avenue (within County of Santa Clara) and Conhansey Avenue to Renz Lane (within City of Gilroy). A regional map and vicinity map of the site are shown on Figure 2.4-1 and 2.4-2, and an aerial photograph of the project site and surrounding land uses is shown in Figure 2.4-3.

### **2.5 PROJECT-RELATED APPROVALS, AGREEMENTS, AND PERMITS**

This IS would provide decision-makers in the City of Morgan Hill (the CEQA Lead Agency), responsible agencies, and the general public with relevant environmental information to use in considering the project. The City of Morgan Hill anticipates that discretionary approvals by the City, including but not limited to the following, will be required to implement the project addressed in this IS:

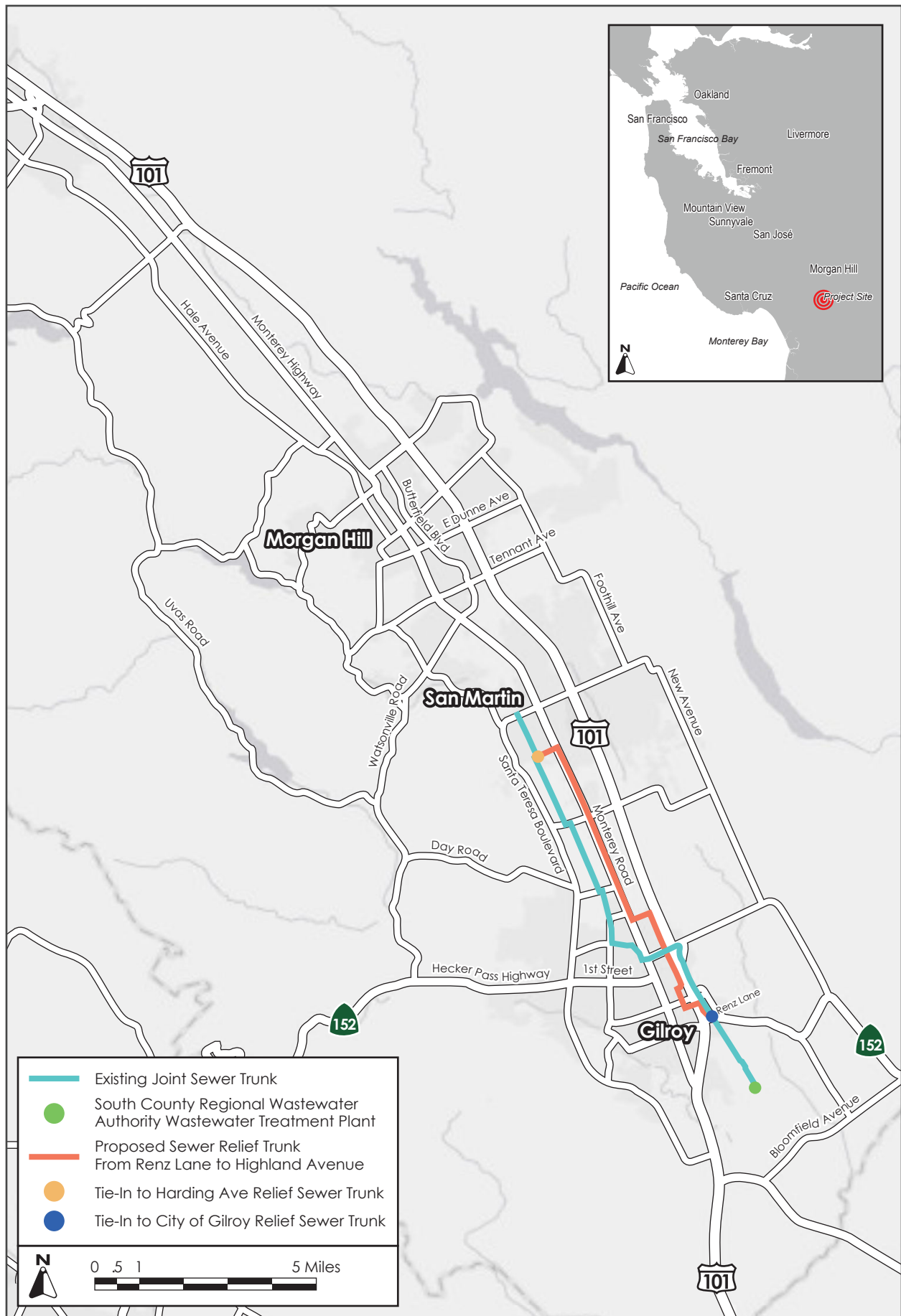
- Encroachment Permit
- Utility Crossing Permit
- Tree Removal Permits
- Public Works Clearance

The City of Morgan Hill, as the lead agency, anticipates that discretionary approvals by responsible agencies, including but not limited to the following, may be required to implement the proposed project addressed in this IS:

- City of Gilroy
- County of Santa Clara
- California Department of Transportation (Caltrans)
- California Public Utilities Commission



- California Department of Public Health Services
- Santa Clara Valley Water District
- Central Coast Regional Water Quality Control Board (NPDES Permit)
- Union Pacific Railroad (UPRR)



REGIONAL MAP

FIGURE 2.4-1











AERIAL PHOTOGRAPH AND SURROUNDING LAND USES

FIGURE 2.4-3







## **SECTION 3.0      PROJECT DESCRIPTION**

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### **3.1.1              Project Background**

The City of Morgan Hill (City) Department of Public Works is responsible for planning, design, maintenance, and repair of all sanitary sewer mains and sewer lift stations within the City. Municipal wastewater is transported from the City of Morgan Hill via a joint trunk sewer that carries combined flows from both Morgan Hill and the City of Gilroy to the wastewater treatment plant located in the City of Gilroy, where it is treated and discharged. This plant is owned and operated by the South County Regional Wastewater Authority (SCRWA), under a Joint Exercise of Powers Agreement with the City of Morgan Hill and the City of Gilroy.

The City of Morgan Hill collects wastewater from 12,400 accounts in Morgan Hill servicing a total population of approximately 41,000. The sewer infrastructure facilities collect roughly 2.5 mgd of wastewater. To facilitate the City of Morgan Hill's planned growth, a new sewer relief trunk is required to accommodate the associated additional wastewater flows. The new trunk sewer alignment extends from the start of the existing joint trunk sewer at California Avenue and Monterey Highway through to the termination at the SCRWA WWTP. The first segment has been constructed by the City of Gilroy and extends from Renz Lane in Gilroy to the SCRWA WWTP. The second segment has been constructed by Morgan Hill and extends from the intersection of California Avenue and Monterey Highway southerly to the intersection of Harding Avenue and Highland Avenue. The third segment, i.e. the subject project discussed in this Initial Study, would be constructed by Morgan Hill and would connect together the first and second segments by extending from Renz Lane to Highland Avenue.

### **3.1.2              Project Overview**

The Sewer Relief Trunk – from Renz Lane to Highland Avenue Project (“Project”) proposes the installation of approximately 6.6 miles of sewer pipeline that would extend from the termination of the previously constructed Harding Avenue segment of the sewer relief trunk located at the intersection of Harding Avenue and Highland Avenue in San Martin, southeast to the previously constructed City of Gilroy segment of the sewer relief trunk located on Renz Lane in Gilroy. The proposed project area and alignment are shown in Figure 3.1-1.

The proposed project alignment is located in the unincorporated Santa Clara County in the San Martin planning area and in the City of Gilroy. Land uses within this area are designated Neighborhood Commercial, Industrial, Recreation, and Urban Low and Urban Medium Density Residential.

The proposed trunk sewer alignment would be located mostly within the existing roadway right-of-way, plus a few new utility easements. Generally, the trunk line would be located in the paved roadway, unimproved private roadway, two highway crossings, one railroad (UPRR) crossing, and two waterway crossings, as discussed in more detail below.

The existing sewer pipeline that travels from Morgan Hill through San Martin to Gilroy is owned jointly by the City of Morgan Hill and the City of Gilroy. The new relief trunk line will be owned entirely by the City of Morgan Hill.







- LEGEND:
- EXISTING JOINT SEWER TRUNK
  - SOUTH COUNTY REGIONAL WASTEWATER AUTHORITY WASTEWATER TREATMENT PLANT
  - PROPOSED SEWER RELIEF TRUNK FROM RENZ LANE TO HIGHLAND AVENUE
  - TIE-IN TO HARDING AVE RELIEF SEWER TRUNK
  - TIE-IN TO CITY OF GILROY RELIEF SEWER TRUNK

PROJECT AREA AND ALIGNMENT

FIGURE 3.1-1





### 3.1.2.1 *Sewer Relief Trunk*

#### **Location**

The proposed project starts at the intersection of Harding Avenue and Highland Avenue; from this location the line extends approximately 2000 feet east on Highland Avenue to Monterey Highway. The line will turn south onto Monterey Highway and extend south along Monterey Highway approximately 3.4 miles to Las Animas Avenue. This portion of the alignment will be located within existing County road right-of-way and installed by means of open trench construction.

From the intersection of Monterey Highway and Las Animas, the sewer will continue east on Las Animas for approximately 1,750 feet to Murray Avenue, crossing the UPRR tracks that run parallel to Monterey Highway. The line will continue south on Murray Avenue for approximately 1.5 miles to Chestnut Street. Along Murray Avenue, the sewer will cross West Branch Llagas Creek and Leavesley Road (SR 152). The majority of this portion of the alignment will be constructed within existing City of Gilroy road right-of-way by means of open trench construction. The crossings of the UPRR, West Branch Llagas Creek, and SR 152 will be installed by trenchless construction methods. Depending on the depth of the existing facilities, siphons<sup>1</sup> may be required for one or more of these trenchless crossings.

From the southern end of Murray Avenue, the trunk sewer will follow Chestnut Street west then south approximately 0.5 miles, crossing Lewis Street and a branch of Miller Slough, to East 7<sup>th</sup> Street. This portion of the alignment will be located primarily within existing City of Gilroy road right-of-way and installed by means of open trench construction. The crossing of Miller Slough will utilize trenchless construction methods.

The trunk sewer will continue approximately 0.2 miles east by way of East 7<sup>th</sup> Street to Highway 101. This portion of the alignment will be located within City of Gilroy road right-of-way and City of Gilroy property, and an easement through private property and installed by open trench construction.

The trunk sewer will continue east approximately 375 feet underneath Highway 101. The pipe will be located within Caltrans right-of-way and be installed using trenchless construction methods. The highway crossing will terminate on Renz Lane, east of Highway 101, within an easement on PG&E property.

From the termination of the Highway 101 crossing, the alignment will continue approximately 1,900 feet southeast along Renz Lane to the start of the relief trunk previously constructed by the City of Gilroy. This portion of the pipeline will be installed by open trench construction starting within a new easement on PG&E property, then within City of Gilroy right-of-way in Renz Lane. The pipeline will terminate with the connection to the City of Gilroy relief trunk, within a new easement on private property on the south side of Renz Lane.

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<sup>1</sup> Pipelines called inverted siphons are used to carry sewage or stormwater under streams, highway cuts, or other depressions in the ground. In an inverted siphon the liquid completely fills the pipe and flows under pressure, as opposed to the open-channel gravity flow that occurs in most sanitary or storm sewers..

## **Construction**

The trunk sewer will consist of 36-inch diameter pipe installed by open trench and trenchless construction methods. The pipes will be installed at a depth that provides approximately four (4) to 15 feet of cover, on average. Deeper or shallower installation may be required accommodate other existing utilities and crossings of railroad tracks, waterways, and major highways.

### Waterway Crossings

At the West Branch Llagas Creek crossing on Murray Avenue, the proposed pipeline would likely be installed under the creek by microtunneling or guided-auger-boring to avoid disturbance to the creek. This may result in a siphon crossing in order to meet minimum clearance requirements to avoid damaging the creek bed. This construction method would restrict construction activities to the street right-of-way on either side of the crossing and will not require activities within the creek itself.

At the Miller Slough crossing on Chestnut Street, the proposed pipeline would be installed by microtunneling or guided auger-boring to avoid disturbance to the slough. This will result in a siphon crossing in order to meet minimum clearance requirements to avoid damaging the slough bed. This construction method will not require activities within the slough or adjacent riparian areas.

Coordination and permitting would be required with/from Santa Clara Valley Water District for these waterway crossings.

### Railroad Crossing

The project would require installation of pipe under the Union Pacific Railroad tracks east of Monterey Highway at Las Animas Avenue. This crossing would require a utility crossing permit from the railroad. The construction will be accomplished by microtunnelling or guided auger-boring to avoid disturbing the tracks and railroad operation. Coordination and approval would be required with/from UPRR for this railroad crossing.

### Caltrans Crossings

The crossing of Leavesley Road (SR 152) is under the jurisdiction of Caltrans and will require a trenchless crossing of the intersection. This crossing will likely be installed by microtunneling or guided auger-boring. This construction method would restrict work activities to the Murray Avenue right-of-way to the north and south of SR 152 thereby limiting the impact to traffic on SR 152. Crossing depth will be dictated by the minimum clearance required to avoid existing buried utilities within Leavesley Road.

The crossing of Highway 101 from East 7<sup>th</sup> Street to Renz Lane will require the pipe be installed by trenchless methods. The pipe construction would likely be accomplished by microtunneling or guided auger-boring with work activities restricted to the 7<sup>th</sup> Street and Renz Lane right-of-way or easements on City and/or private property. In order to maintain minimum clearance requirements so as not to compromise the existing road bed, a siphon may be required.

Coordination and permitting would be required with/from Caltrans for these state highway crossings.

### Construction Duration

Project construction would occur over a period of six years. The majority of the project's construction activities would occur during the five-year open trenching pavement portion while installing the new sewer pipeline. The trenching and installation would constantly be moving over the entire construction area and would only occur for approximately 30 days near any one receptor, except if near microtunneling sites. Microtunneling at the various crossings would occur for several months, along with the trenching and line installation.





## SECTION 4.0 ENVIRONMENTAL SETTING, CHECKLIST, AND IMPACT DISCUSSION

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This section presents the discussion of impacts related to the following environmental subjects in their respective subsections:

4.1	Aesthetics	4.12	Mineral Resources
4.2	Agriculture and Forestry Resources	4.13	Noise
4.3	Air Quality	4.14	Population and Housing
4.4	Biological Resources	4.15	Public Services
4.5	Cultural Resources	4.16	Recreation
4.6	Energy	4.17	Transportation
4.7	Geology and Soils	4.18	Tribal Cultural Resources
4.8	Greenhouse Gas Emissions	4.19	Utilities and Service Systems
4.9	Hazards and Hazardous Materials	4.20	Wildfire
4.10	Hydrology and Water Quality	4.21	Mandatory Findings of Significance
4.11	Land Use and Planning		

The discussion for each environmental subject includes the following subsections:

- **Environmental Setting** – This subsection 1) provides a brief overview of relevant plans, policies, and regulations that compose the regulatory framework for the project and 2) describes the existing, physical environmental conditions at the project site and in the surrounding area, as relevant.
- **Impact Discussion** – This subsection 1) includes the recommended checklist questions from Appendix G of the CEQA Guidelines to assess impacts and 2) discusses the project’s impact on the environmental subject as related to the checklist questions. For significant impacts, feasible mitigation measures are identified. “Mitigation measures” are measures that will minimize, avoid, or eliminate a significant impact (CEQA Guidelines Section 15370). Each impact is numbered to correspond to the checklist question being answered. For example, Impact BIO-1 answers the first checklist question in the Biological Resources section. Mitigation measures are also numbered to correspond to the impact they address. For example, MM BIO-1.3 refers to the third mitigation measure for the first impact in the Biological Resources section.

## **4.1 AESTHETICS**

### **4.1.1 Environmental Setting**

#### **4.1.1.1 *Regulatory Framework***

##### **State**

##### **Streets and Highway Code Sections 260 through 263**

The California Scenic Highway Program (Streets and Highway Code, Sections 260 through 263) is managed by the California Department of Transportation (Caltrans). The program is intended to protect and enhance the natural scenic beauty of California highways and adjacent corridors through special conservation treatment. There are no state-designated scenic highways in Gilroy.

In Santa Clara County, the one state-designated scenic highway is SR 9 from the Santa Cruz County line to the Los Gatos City Limit. Eligible State Scenic Highways (not officially designated) include: SR 17 from the Santa Cruz County line to SR 9, SR 35 from Santa Cruz County line to SR 9, Interstate 280 from the San Mateo County line to SR 17, and the entire length of SR 152 within the County.

##### **Local**

##### **Santa Clara County General Plan**

As stated in the General Plan, Santa Clara County scenic resources include the coastal mountain ranges to the west of the valley and the oak chaparral of the Diablo Range on the east, which together frame an urban landscape in the middle. The County's natural rivers and streams, wetlands near the Bay's edge, urban parks, and architecture of distinction are considered to be scenic resources.

##### **Regional Parks, Trails, and Scenic Highways Plan Map**

The Santa Clara County Regional Parks, Trails, and Scenic Highways Plan Map (part of the County's General Plan) shows the location of regional parks, trails, and scenic highways. It provides information regarding the current status and future plans for these features. Freeways and expressways are included on the map to recognize quality urban road design, and to promote the protection of scenic surroundings of notable urban and rural routes.

#### **4.1.1.2 *Existing Conditions***

The project alignment is located in Monterey Road, Cohansey Avenue, Murray Avenue, Chestnut Street, E. 7<sup>th</sup> Street, US 101, and Renz Lane, in the City of Gilroy. Urban development, consisting of commercial buildings (including a regional shopping center, gas station, and other neighborhood shopping centers), and associated parking lots, single-family residential homes, major thoroughfares, agricultural lands, and undeveloped lands are located throughout the project alignment's extent.

Numerous trees, including ornamental landscaping are planted along the roadways near residences. Larger, more mature trees are found along the extent of Monterey Road. Monterey Road is generally a four-lane roadway, with two lanes in each direction.

West Branch Llagas Creek and Miller Slough cross under Murray Avenue and Chestnut Street just south of Las Animas Avenue and Lewis Street (Miller Slough), respectively. Railroad tracks are located east of Monterey Road. Vegetation found along both the West Branch Llagas Creek and Miller Slough consists of low growing grasses and herbaceous plants. Small trees are found along both water bodies, however, the tree canopy is very limited.

Views of the project alignment are shown in Photos 1 – 6.

#### 4.1.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Except as provided in Public Resources Code Section 21099, would the project:				
1) Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) In non-urbanized areas, substantially degrade the existing visual character or quality of public views <sup>2</sup> of the site and its surroundings? (Public views are those that are experienced from 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

<sup>2</sup> Public views are those that are experienced from publicly accessible vantage points.





**Photo 1** Intersection of Harding Avenue and Highland Avenue, location of northernmost portion of project alignment.



**Photo 2** View of Harding Avenue and Monterey Road intersection, facing east.







**Photo 3** View of West Branch Llagas Creek and Murray Avenue, facing north.



**Photo 4** View of pedestrian/bicycle bridge crossing of Miller Slough on Chestnut Street.







**Photo 5** View of E. 7th Street, facing east.



**Photo 6** View of connection of proposed pipeline at Renz Lane, facing north.



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**Impact AES-1:** The project would not have a substantial adverse effect on a scenic vista. **(No Impact)**

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The proposed project would install underground sewer trunk infrastructure to address City of Morgan Hill's planned growth and associated additional wastewater flows. The proposed project is located in the unincorporated Santa Clara County in the San Martin planning area and the City of Gilroy in an area developed with urban uses (e.g., residential and commercial uses). The City of Gilroy 2020 General Plan does not identify the project area as a scenic resource. The proposed underground sewer line would not be visible from any point aboveground, and therefore, would not impact any scenic vista. Upon project completion, the visual appearance of the project area would be identical to existing conditions, except for the removal of two trees, as stated in *Section 4.4 Biological Resources*. The trees in the project area are not located within an area considered to provide a scenic vista, and all trees removed by the project would be replaced in accordance with the City of Gilroy Tree Removal Guidelines and County's Tree Preservation Ordinance, as applicable. For these reasons, the proposed project would not have a substantial adverse effect on a scenic vista. **(No Impact)**

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**Impact AES-2:** The project would not substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway. **(No Impact)**

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The location of the proposed trunk sewer line is not within or visible from a designated state scenic highway.<sup>3</sup> Upon project completion, the visual appearance of the project area would be identical to existing conditions, except for the removal of trees. All trees removed by the project would be replaced in accordance with City of Gilroy Tree Removal Guidelines and County's Tree Preservation Ordinance, as applicable. For these reasons, the proposed project would not substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a state scenic highway. **(No Impact)**

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**Impact AES-3:** The project would not substantially degrade the existing visual character or quality of public views of the site and its surroundings. **(Less than Significant Impact)**

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The project proposes to construct an approximately 7-mile long underground 36-inch sewer pipeline extending from the intersection of Harding Avenue and Highland Avenue in San Martin, to Renz Lane in Gilroy. The project alignment would be located primarily below ground and therefore, will have limited to no impact on the visual character of the area during operations phase. Construction impacts, including the use of heavy equipment within the street ROW, would be temporary and thus would not have a significant impact on the visual quality of the surroundings. No impact is anticipated during the operational phase. **(Less than Significant Impact)**

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<sup>3</sup> California Department of Transportation. California Scenic Highway Mapping System, Santa Clara County. Available at: [http://www.dot.ca.gov/hq/LandArch/16\\_livability/scenic\\_highways/](http://www.dot.ca.gov/hq/LandArch/16_livability/scenic_highways/). Accessed November 7, 2019.

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**Impact AES-4:** The project would not create a new source of substantial light or glare which would adversely affect day or nighttime views in the area. **(Less than Significant Impact)**

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The construction phase of the project is temporary; while in the short-term it would alter the visual environment; it would not substantially degrade the overall visual character or quality of the project area. The operational phase of the proposed project would not include light sources which could affect day or nighttime views. **(Less than Significant Impact)**



## 4.2 AGRICULTURE AND FORESTRY RESOURCES

### 4.2.1 Environmental Setting

#### 4.2.1.1 *Regulatory Framework*

##### State

##### Farmland Mapping and Monitoring Program

The California Department of Conservation's Farmland Mapping and Monitoring Program (FMMP) assesses the location, quality, and quantity of agricultural land and conversion of these lands over time. Agricultural land is rated according to soil quality and irrigation status. The best quality land is called Prime Farmland. In CEQA analyses, the FMMP classifications and published county maps are used, in part, to identify whether agricultural resources that could be affected are present on-site or in the project area.<sup>4</sup>

##### California Land Conservation Act

The California Land Conservation Act (Williamson Act) enables local governments to enter into contracts with private landowners to restrict parcels of land to agricultural or related open space uses. In return, landowners receive lower property tax assessments. In CEQA analyses, identification of properties that are under a Williamson Act contract is used to also identify sites that may contain agricultural resources or are zoned for agricultural uses.<sup>5</sup>

##### Forest Land, Timberland, and Timberland Production

The California Department of Forestry and Fire Protection (Cal Fire) identifies forest land, timberland, and lands zoned for timberland production that can (or do) support forestry resources.<sup>6</sup> Programs such as Cal Fire's Fire and Resource Assessment Program (FRAP) are used to identify whether forest land, timberland, or timberland production areas that could be effected are located on or adjacent to a project site.<sup>7</sup>

##### Local

##### Santa Clara County General Plan

The project site has a General Plan land use designation of *Rural Residential Areas*. Allowable land uses are residential, agricultural and open space uses are the primary uses. Commercial, industrial and institutional uses may be established only where they are sized to be local-serving in nature.

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<sup>4</sup> California Department of Conservation. *Farmland Mapping and Monitoring Program*. Accessed May 21, 2019. <http://www.conservation.ca.gov/dlrp/fmmp/Pages/Index.aspx>.

<sup>5</sup> California Department of Conservation. *Williamson Act*. Accessed May 21, 2019. <http://www.conservation.ca.gov/dlrp/lca>.

<sup>6</sup> *Forest land* is land that can support 10 percent native tree cover and allows for management of one or more forest resources, including timber, fish, wildlife, and biodiversity (California Public Resources Code Section 12220(g)); *Timberland* is land not owned by the federal government or designated as experimental forest land that is available for, and capable of, growing a crop of trees used to produce lumber and other forest products, including Christmas trees (California Public Resources Code Section 4526); and *Timberland Production* is land devoted to and used for growing and harvesting timber and other compatible uses (Government Code Section 51104(g)).

<sup>7</sup> Cal Fire. *FRAP*. Accessed May 21, 2019. <http://frap.fire.ca.gov/>.



#### 4.2.1.2 *Existing Conditions*

The project alignment is located along Monterey Road between Highland Avenue and Renz Lane. According to the 2016 Santa Clara County Important Farmland Map, the project area is within lands designated as *Urban and Built-Up Land*.

#### 4.2.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code Section 12220(g)), timberland (as defined by Public Resources Code Section 4526), or timberland zoned Timberland Production (as defined by Government Code Section 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) Result in a loss of forest land or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
5) Involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland to non-agricultural use or conversion of forest land to non-forest use?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

---

**Impact AG-1:** The project would not convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance, as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use. **(No Impact)**

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As stated in Section 4.2.1.2, the project area is designated Urban and Built-Up Land, not Farmland on the *Santa Clara County Important Farmland 2016 map*.<sup>8</sup> As The project would be constructed within existing right-of-way and utility easements, and would not result in the conversion or loss of prime farmland, unique farmland, or farmland of statewide importance to non-agricultural use. **(No Impact)**

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<sup>8</sup> Farmland Mapping and Monitoring Program. *Santa Clara County Important Farmland 2016*. September 2018.

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**Impact AG-2:** The project would not conflict with existing zoning for agricultural use, or a Williamson Act contract. **(No Impact)**

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Refer to Impact AG-1. The project area is not under a Williamson Act contract. For these reasons, the proposed project would not conflict with existing zoning for agricultural use or a Williamson Act contract. **(No Impact)**

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**Impact AG-3:** The project would not conflict with existing zoning for, or cause rezoning of, forest land, timberland, or timberland zoned Timberland Production. **(No Impact)**

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The project area does not contain forest land or timberland and is located in a developed area zoned for urban uses (e.g., residential and commercial uses). For these reasons, the project would not conflict with existing zoning for, or cause rezoning of, forest land, timberland, or timberland zoned Timberland Production. **(No Impact)**

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**Impact AG-4:** The project would not result in a loss of forest land or conversion of forest land to non-forest use. **(No Impact)**

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The project area does not contain forest land. Therefore, the proposed trunk sewer project would not result in a loss of forest land or conversion of forest land to non-forest use. **(No Impact)**

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**Impact AG-5:** The project would not involve other changes in the existing environment which, due to their location or nature, could result in conversion of Farmland, to non-agricultural use or conversion of forest land to non-forest use. **(No Impact)**

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Refer to Impact AG-1 through AG-4. **(No Impact)**

## 4.3 AIR QUALITY

The following discussion is based, in part, on an Air Quality Assessment report prepared by *Illingworth & Rodkin, Inc.* in July 2020. A copy of the report is included in Appendix A of this Initial Study.

### 4.3.1 Environmental Setting

#### 4.3.1.1 *Background Information*

##### **Criteria Pollutants**

Air quality in the Bay Area is assessed related to six common air pollutants (referred to as criteria pollutants), including ground-level ozone (O<sub>3</sub>), nitrogen oxides (NO<sub>x</sub>), particulate matter (PM), carbon monoxide (CO), sulfur oxides (SO<sub>x</sub>), and lead.<sup>9</sup> Criteria pollutants are regulated because they result in health effects. An overview of the sources of criteria pollutants and their associated health are summarized in Table 4.3-1. The most commonly regulated criteria pollutants in the Bay Area are discussed further below.

<b>Table 4.3-1: Health Effects of Air Pollutants</b>		
<b>Pollutants</b>	<b>Sources</b>	<b>Primary Effects</b>
O <sub>3</sub>	Atmospheric reaction of organic gases with nitrogen oxides in sunlight	<ul style="list-style-type: none"><li>• Aggravation of respiratory and cardiovascular diseases</li><li>• Irritation of eyes</li><li>• Cardiopulmonary function impairment</li></ul>
Nitrogen Dioxide (NO <sub>2</sub> )	Motor vehicle exhaust, high temperature stationary combustion, atmospheric reactions	<ul style="list-style-type: none"><li>• Aggravation of respiratory illness</li><li>• Reduced visibility</li></ul>
Fine Particulate Matter (PM <sub>2.5</sub> ) and Coarse Particulate Matter (PM <sub>10</sub> )	Stationary combustion of solid fuels, construction activities, industrial processes, atmospheric chemical reactions	<ul style="list-style-type: none"><li>• Reduced lung function, especially in children</li><li>• Aggravation of respiratory and cardiorespiratory diseases</li><li>• Increased cough and chest discomfort</li><li>• Reduced visibility</li></ul>
Toxic Air Contaminants (TACs)	Cars and trucks, especially diesel-fueled; industrial sources, such as chrome platers; dry cleaners and service stations; building materials and products	<ul style="list-style-type: none"><li>• Cancer</li><li>• Chronic eye, lung, or skin irritation</li><li>• Neurological and reproductive disorders</li></ul>

High O<sub>3</sub> levels are caused by the cumulative emissions of reactive organic gases (ROG) and NO<sub>x</sub>. These precursor pollutants react under certain meteorological conditions to form high O<sub>3</sub> levels. Controlling the emissions of these precursor pollutants is the focus of the Bay Area's attempts to

<sup>9</sup> The area has attained both state and federal ambient air quality standards for CO. The project does not include substantial new emissions of sulfur dioxide or lead. These criteria pollutants are not discussed further.

reduce O<sub>3</sub> levels. The highest O<sub>3</sub> levels in the Bay Area occur in the eastern and southern inland valleys that are downwind of air pollutant sources.

PM is a problematic air pollutant of the Bay Area. PM is assessed and measured in terms of respirable particulate matter or particles that have a diameter of 10 micrometers or less (PM<sub>10</sub>) and fine particulate matter where particles have a diameter of 2.5 micrometers or less (PM<sub>2.5</sub>). Elevated concentrations of PM<sub>10</sub> and PM<sub>2.5</sub> are the result of both region-wide emissions and localized emissions.

### **Toxic Air Contaminants**

TACs are a broad class of compounds known to have health effects. They include but are not limited to criteria pollutants. TACs are found in ambient air, especially in urban areas, and are caused by industry, agriculture, diesel fuel combustion, and commercial operations (e.g., dry cleaners). TACs are typically found in low concentrations, even near their source (e.g., diesel particulate matter [DPM] near a freeway).

Diesel exhaust is the predominant TAC in urban air and is estimated to represent about three-quarters of the cancer risk from TACs. Diesel exhaust is a complex mixture of gases, vapors, and fine particles. Medium- and heavy-duty diesel trucks represent the bulk of DPM emissions from California highways. The majority of DPM is small enough to be inhaled into the lungs. Most inhaled particles are subsequently exhaled, but some deposit on the lung surface or are deposited in the deepest regions of the lungs (most susceptible to injury).<sup>10</sup> Chemicals in diesel exhaust, such as benzene and formaldehyde, have been previously identified as TACs by the California Air Resources Board (CARB).

#### **4.3.1.2      *Regulatory Framework***

##### **Federal and State**

###### Clean Air Act

At the federal level, the United States Environmental Protection Agency (EPA) is responsible for overseeing implementation of the Clean Air Act and its subsequent amendments. The federal Clean Air Act requires the EPA to set national ambient air quality standards for the six common criteria pollutants (discussed previously), including PM, O<sub>3</sub>, CO, SO<sub>x</sub>, NO<sub>x</sub>, and lead.

CARB is the state agency that regulates mobile sources throughout the state and oversees implementation of the state air quality laws and regulations, including the California Clean Air Act. The EPA and the CARB have adopted ambient air quality standards establishing permissible levels of these pollutants to protect public health and the climate. Violations of ambient air quality standards are based on air pollutant monitoring data and are determined for each air pollutant. Attainment status for a pollutant means that a given air district meets the standard set by the EPA and/or CARB.

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<sup>10</sup> California Air Resources Board. "Overview: Diesel Exhaust and Health." Accessed June 16, 2018. <https://www.arb.ca.gov/research/diesel/diesel-health.htm>.

## Risk Reduction Plan

To address the issue of diesel emissions in the state, CARB developed the Risk Reduction Plan to Reduce Particulate Matter Emissions from Diesel-Fueled Engines and Vehicles. In addition to requiring more stringent emission standards for new on-road and off-road mobile sources and stationary diesel-fueled engines to reduce particulate matter emissions by 90 percent, the plan involves application of emission control strategies to existing diesel vehicles and equipment to reduce DPM (in addition to other pollutants). Implementation of this plan, in conjunction with stringent federal and CARB-adopted emission limits for diesel fueled vehicles and equipment (including off-road equipment), will significantly reduce emissions of DPM and NO<sub>x</sub>.

## **Regional**

### 2017 Clean Air Plan

The Bay Area Air Quality Management District (BAAQMD) is the agency primarily responsible for assuring that the federal and state ambient air quality standards are maintained in the San Francisco Bay Area. Regional air quality management districts, such as BAAQMD, must prepare air quality plans specifying how state and federal air quality standards will be met. BAAQMD's most recently adopted plan is the Bay Area 2017 Clean Air Plan (2017 CAP). The 2017 CAP focuses on two related BAAQMD goals: protecting public health and protecting the climate. To protect public health, the 2017 CAP describes how BAAQMD will continue its progress toward attaining state and federal air quality standards and eliminating health risk disparities from exposure to air pollution among Bay Area communities. To protect the climate, the 2017 CAP includes control measures designed to reduce emissions of methane and other super-greenhouse gases (GHGs) that are potent climate pollutants in the near-term, and to decrease emissions of carbon dioxide by reducing fossil fuel combustion.<sup>11</sup>

### CEQA Air Quality Guidelines

The BAAQMD CEQA Air Quality Guidelines are intended to serve as a guide for those who prepare or evaluate air quality impact analyses for projects and plans in the San Francisco Bay Area. Jurisdictions in the San Francisco Bay Area Air Basin utilize the thresholds and methodology for assessing air quality impacts developed by BAAQMD within their CEQA Air Quality Guidelines. The guidelines include information on legal requirements, BAAQMD rules, methods of analyzing impacts, and recommended mitigation measures.

## **Local**

### City of Morgan Hill 2035 General Plan

Adopted July 27, 2016, the *Morgan Hill 2035 General Plan* includes goals and policies to improve air quality issues facing the City of Morgan Hill.<sup>12</sup> The following goals, policies, and actions are applicable to the proposed project:

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<sup>11</sup> BAAQMD. *Final 2017 Clean Air Plan*. April 19, 2017. <http://www.baaqmd.gov/plans-and-climate/air-quality-plans/current-plans>.

<sup>12</sup> City of Morgan Hill. *City of Morgan Hill 2035 General Plan. Chapter 8 Natural Resources and Environment*. Adopted July 27, 2016. Accessed May 21, 2019. <https://www.morgan-hill.ca.gov/DocumentCenter/View/22839/MH2035-General-Plan---December-2017?bidId>

- Goal NRE-11:* Minimized exposure of people to toxic air contaminants such as ozone, carbon monoxide, lead, and particulate matter.
- Policy NRE-11.1:* **TACs and Proposed Sensitive Uses.** Require modeling for sensitive land uses, such as residential development, proposed near sources of pollution such as freeways and industrial uses. Require new residential development and projects categorized as sensitive receptors to incorporate effective mitigation measures into project designs or be located adequate distances from sources of toxic air contaminants (TACs) to avoid significant risk to health and safety.
- Policy NRE-11.2:* **TACs and Existing Sensitive Uses.** Encourage the installation of appropriate air filtration mechanisms at existing schools, residences, and other sensitive receptors adversely affected by existing or proposed pollution sources.
- Policy NRE-11.3:* **Health Risk Assessments.** For proposed development that emits toxic air contaminants, require project proponents to prepare health risk assessments in accordance with Bay Area Air Quality Management District procedures as part of environmental review and implement effective mitigation measures to reduce potential health risks to less-than-significant levels. Alternatively, require these projects to be located an adequate distance from residences and other sensitive receptors to avoid health risks. Consult with the Bay Area Air Quality Management District to identify stationary and mobile toxic air contaminant sources and determine the need for and requirements of a health risk assessment for proposed developments
- Goal NRE-12:* Minimized air pollutant emissions from demolition and construction activities
- Policy NRE-12.1:* **Best Practices.** Requirement that development projects implement best management practices to reduce air pollutant emissions associated with construction and operation of the project.
- Policy NRE-12.2:* **Conditions of Approvals.** Include dust, particulate matter, and construction equipment exhaust control measures as conditions of approval for subdivision maps, site development and planned development permits, grading permits, and demolition permits. At a minimum, conditions shall conform to construction mitigation measures recommended in the current BAAQMD CEQA Guidelines.

#### **4.3.1.3 Existing Conditions**

The project is located in Santa Clara County, which is in the San Francisco Bay Area Air Basin. Ambient air quality standards have been established at both the state and federal level. The Bay Area meets all ambient air quality standards with the exception of ground-level ozone, respirable particulate matter (PM10), and fine particulate matter (PM2.5).

## Sensitive Receptors

There are groups of people more affected by air pollution than others. CARB has identified the following persons who are most likely to be affected by air pollution: children under 16, the elderly over 65, athletes, and people with cardiovascular and chronic respiratory diseases. These groups are classified as sensitive receptors. Locations that may contain a high concentration of these sensitive population groups include residential areas, hospitals, daycare facilities, elder care facilities, and elementary schools. This project would not introduce new sensitive receptors to the area. There are sections of the sewer pipeline alignment that are surrounded by residences and schools and other sections that are not. The sections of the alignment that require microtunneling or guided auger-boring and longer periods of construction are approximately 20 to 200 feet from the nearest sensitive receptors.

### 4.3.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Conflict with or obstruct implementation of the applicable air quality plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) 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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3) Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4) Result in other emissions (such as odors) adversely affecting a substantial number of people?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>



As discussed in CEQA Guidelines Section 15064(b), the determination of whether a project may have a significant effect on the environment calls for judgment on the part of the lead agency and must be based to the extent possible on scientific and factual data. The City of Morgan Hill has considered the air quality thresholds updated by BAAQMD in May 2017 and regards these thresholds to be based on the best information available for the San Francisco Bay Area Air Basin and conservative in terms of the assessment of health effects associated with TACs and PM<sub>2.5</sub>. The BAAQMD CEQA Air Quality thresholds referenced in this analysis are identified in Table 4.3-2.

Table 4.3-2: BAAQMD Air Quality Significance Thresholds			
Pollutant	Construction Thresholds	Operation Thresholds	
	Average Daily Emissions (pounds/day)	Annual Daily Emissions (pounds/year)	Annual Average Emissions (tons/year)
Criteria Air Pollutants			
ROG, NO <sub>x</sub>	54	54	10
PM <sub>10</sub>	82 (exhaust)	82	15
PM <sub>2.5</sub>	54 (exhaust)	54	10
CO	Not Applicable	9.0 ppm (eight-hour) or 20.0 ppm (one-hour)	
Fugitive Dust	Dust-Control Measures/Best Management Practices	Not Applicable	
Health Risks and Hazards for New Sources (within a 1,000-foot Zone of Influence)			
Health Hazard	Single Source	Combined Cumulative Sources	
Excess Cancer Risk	10 per one million	0.3 µg/m <sup>3</sup>	
Hazard Index	1.0	10.0	
Incremental Annual PM <sub>2.5</sub>	0.3 µg/m <sup>3</sup>	0.8 µg/m3 (average)	
Notes: ROG = reactive organic gases, NO <sub>x</sub> = nitrogen oxides, PM <sub>10</sub> = course particulate matter with a diameter of 10 micrometers (µm) or less, and PM <sub>2.5</sub> = fine particulate matter with a diameter of 2.5 µm or less.			

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**Impact AIR-1:** The project would not conflict with or obstruct implementation of the applicable air quality plan. **(Less than Significant Impact)**

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Determining consistency with BAAQMD 2017 Clean Air Plan involves assessing whether a project would alter the population-growth and vehicle miles traveled assumption of the Plan. Construction of the project would not be considered growth-inducing as it would not in and of itself increase the region's population or provide expanded infrastructure that would remove an existing constraint on growth in the region. In fact, the project is proposing a new sewer relief trunk to facilitate the City of Morgan Hill's planned growth and accommodate the associated additional wastewater flows. Since the construction of the project would be short-term and temporary and there would be no long-term operational component to the project that would generate air emissions, it would not generate substantial new vehicle trips in the Air Basin that would conflict with the Clean Air Plan. As a result,

the project would not conflict with or obstruct implementation of the Plan, and this impact would be less than significant. **(Less than Significant Impact)**

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**Impact AIR-2:** The project would not 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. **(Less than Significant Impact with Mitigation Incorporated)**

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The Bay Area is considered a non-attainment area for ground-level ozone and PM2.5 under both the Federal Clean Air Act and the California Clean Air Act. The area is also considered non-attainment for PM10 under the California Clean Air Act, but not the federal act. The area has attained both State and Federal ambient air quality standards for carbon monoxide. As part of an effort to attain and maintain ambient air quality standards for ozone and PM10, the BAAQMD has established thresholds of significance for these air pollutants and their precursors. These thresholds are for ozone precursor pollutants (ROG and NOX), PM10, and PM2.5 and apply to both construction period and operational period impacts. The California Emissions Estimator Model (CalEEMod) Version 2016.3.2 was used to estimate emissions from construction and operation of the site assuming full build-out of the project.

### **Construction Period Emissions**

Construction activities, particularly during grading, would temporarily generate fugitive dust in the form of PM10 and PM2.5. Sources of fugitive dust would include disturbed soils along the alignment and trucks carrying uncovered loads of soils. Unless properly controlled, vehicles would deposit mud on local streets, which could be an additional source of airborne dust after it dries. The BAAQMD CEQA Air Quality Guidelines consider these impacts to be less than significant if best management practices are implemented to reduce these emissions. Mitigation Measure AIR-2.1 would implement BAAQMD-recommended best management practices.

Table 4.3-3 shows average daily construction emissions of ROG, NOx, PM10 exhaust, and PM2.5 exhaust during each year of the construction of the project. As indicated in Table 4.3-3, the predicted daily NOx emissions exceed the threshold of 54 pounds per average day in the first year of construction. Mitigation Measures AIR-2.1 and AIR-2.2 would reduce these emissions to a less than significant level.

**Table 4.3-3: Construction Period Emissions-Unmitigated**

<b>Scenario</b>	<b>ROG</b>	<b>NOx</b>	<b>PM<sub>10</sub> Exhaust</b>	<b>PM<sub>2.5</sub> Exhaust</b>
Open trenching pavement construction emissions	2.88 tons	25.15 tons	1.28 tons	1.22 tons
Open trenching no pavement construction emissions	0.02 tons	0.17 tons	0.01 tons	0.01 tons
UPRR crossing construction emissions	0.04 tons	0.40 tons	0.02 tons	0.02 tons
Miller Slough crossing construction emissions	0.08 tons	0.70 tons	0.04 tons	0.04 tons
Leavesley Road (S.R. 152) crossing construction emissions	0.08 tons	0.67 tons	0.04 tons	0.04 tons
Miller Slough Branch crossing construction emissions (tons)	0.05 tons	0.44 tons	0.02 tons	0.02 tons
U.S. 101 crossing construction emissions	0.08 tons	0.75 tons	0.04 tons	0.04 tons
Total project construction emissions	3.23 tons	28.28 tons	1.45 tons	1.39 tons
2020 total project construction emissions	0.92 tons	8.16 tons	0.43 tons	0.41 tons
2021 total project construction emissions	0.58 tons	5.03 tons	0.26 tons	0.24 tons
2022 total project construction emissions	0.58 tons	5.03 tons	0.26 tons	0.24 tons
2023 total project construction emissions	0.58 tons	5.03 tons	0.26 tons	0.24 tons
2024 total project construction emissions	0.58 tons	5.03 tons	0.26 tons	0.24 tons
2024 total project construction emissions	0.58 tons	5.03 tons	0.26 tons	0.24 tons
<b>2020 Average daily emissions<sup>1</sup></b>	7.11 lbs./day	<b>62.75 lbs./day</b>	3.30 lbs./day	3.15 lbs./day
<b>2021 Average daily emissions<sup>1</sup></b>	3.69 lbs./day	32.24 lbs./day	1.64 lbs./day	1.57 lbs./day
<b>2022 Average daily emissions<sup>1</sup></b>	3.69 lbs./day	32.24 lbs./day	1.64 lbs./day	1.57 lbs./day
<b>2023 Average daily emissions<sup>1</sup></b>	3.69 lbs./day	32.24 lbs./day	1.64 lbs./day	1.57 lbs./day
<b>2024 Average daily emissions<sup>1</sup></b>	3.69 lbs./day	32.24 lbs./day	1.64 lbs./day	1.57 lbs./day
<b>2025 Average daily emissions<sup>1</sup></b>	3.69 lbs./day	32.24 lbs./day	1.64 lbs./day	1.57 lbs./day
<i>BAAQMD Thresholds (pounds per day)</i>	54 lbs./day	54 lbs./day	82 lbs./day	54 lbs./day
<b>Exceed Threshold?</b>	No	<b>YES</b>	No	No
Notes: <sup>1</sup> Assumes 260 workdays per year.				

**Mitigation Measures:** Implementation of the following mitigation measures would reduce the NOx emissions below the significance threshold:

**MM AIR-2.1:** During any construction period ground disturbance, the applicant shall ensure that the project contractor implement measures to control dust and exhaust. Implementation of the measures recommended by BAAQMD and listed below would reduce the air quality impacts associated with grading and new construction to a less than significant level. Additional measures are

identified to reduce construction equipment exhaust emissions. The contractor shall implement the following best management practices that are required of all projects:

- All exposed surfaces (e.g., parking areas, staging areas, soil piles, graded areas, and unpaved access roads) shall be watered two times per day.
- All haul trucks transporting soil, sand, or other loose material off-site shall be covered.
- All visible mud or dirt track-out onto adjacent public roads shall be removed using wet power vacuum street sweepers at least once per day. The use of dry power sweeping is prohibited.
- All vehicle speeds on unpaved roads shall be limited to 15 miles per hour (mph).
- All roadways, driveways, and sidewalks to be paved shall be completed as soon as possible. Building pads shall be laid as soon as possible after grading unless seeding or soil binders are used.
- Idling times shall be minimized either by shutting equipment off when not in use or reducing the maximum idling time to five (5) minutes (as required by the California airborne toxics control measure Title 13, Section 2485 of California Code of Regulations [CCR]). Clear signage shall be provided for construction workers at all access points.
- All construction equipment shall be maintained and properly tuned in accordance with manufacturer's specifications. All equipment shall be checked by a certified mechanic and determined to be running in proper condition prior to operation.
- Post a publicly visible sign with the telephone number and person to contact at the Lead Agency regarding dust complaints. This person shall respond and take corrective action within 48 hours. The Air District's phone number shall also be visible to ensure compliance with applicable regulations.

**MM AIR-2.2:**

The project shall develop a plan demonstrating that the off-road equipment to be used in the construction project and hauling truck traffic would achieve a 20-percent NO<sub>x</sub> reduction compared to the CalEEMod modeled emissions used in this report. In addition, the plan would reduce diesel particulate matter exhaust emissions from microtunneling activities by 75 percent. Acceptable options for reducing emissions include the use of late model engines, low-emission diesel products, alternative fuels, engine retrofit technology, after-treatment products, add-on devices such as particulate filters, and/or other options as such become available. One feasible plan to achieve this reduction would include the following:

- During all Open Trenching Pavement and No Pavement portions, all diesel-powered off-road equipment, larger than 25 horsepower operating on the site for more than two days continuously shall, at a minimum, meet U.S. EPA emissions standards for Tier 3 engines or equivalent.

- During all Microtunneling portions, all diesel-powered off-road equipment, larger than 25 horsepower, operating on the site for more than two days continuously shall, at a minimum, meet U.S. EPA particulate matter emissions standards for Tier 4 interim engines or equivalent.
- Alternatively, for all portions of construction, the use of equipment meeting U.S. EPA Tier 3 standards for particulate matter that are equipped with CARB-certified verifiable diesel emission control devices (VDECs) that altogether achieve an 85 percent reduction in particulate matter exhaust or the use of equipment that includes electric or alternatively-fueled equipment (i.e., non-diesel) would meet this requirement.

Table 4.3-4 includes the modeled mitigated construction emissions. Implementation of Mitigation Measure AIR-2.1 is considered to reduce NOx emissions by five (5) percent. Implementation of Mitigation Measure AIR-2.2 using construction equipment meeting Tier 3 engine standards for Trenching portions and Tier 4 interim standards for Microtunneling portions would further reduce NOx emissions from construction equipment by over 25 percent. This would reduce the NOx emissions, such that the mitigated construction NOx emissions from the project would be 40.8 pounds per day, which would not exceed the BAAQMD significance threshold. After implementation of these mitigation measures, the project would have a less than significant impact with respect to construction criteria pollutant emissions. **(Less than Significant Impact with Mitigation Incorporated)**

<b>Table 4.3-4 Construction Period Emissions - Mitigated</b>				
<b>Scenario</b>	<b>ROG</b>	<b>NOx</b>	<b>PM<sub>10</sub> Exhaust</b>	<b>PM<sub>2.5</sub> Exhaust</b>
Open trenching pavement construction emissions	1.09 tons	21.19 tons	1.26 tons	1.26 tons
Open trenching no pavement construction emissions	0.01 tons	0.13 tons	0.01 tons	0.01 tons
UPRR crossing construction emissions	0.01 tons	0.23 tons	<0.01 tons	<0.01 tons
Miller Slough crossing construction emissions	0.02 tons	0.39 tons	<0.01 tons	<0.01 tons
Leavesley Road (S.R. 152) crossing construction emissions	0.02 tons	0.37 tons	<0.01 tons	<0.01 tons
Miller Slough Branch crossing construction emissions	0.01 tons	0.25 tons	<0.01 tons	<0.01 tons
U.S. 101 crossing construction emissions	0.02 tons	0.42 tons	<0.01 tons	<0.01 tons
Total project construction emissions (tons)	1.18 tons	22.96 tons	1.28 tons	1.28 tons
2020 total project construction emissions	0.31 tons	6.01 tons	0.27 tons	0.27 tons
2021 total project construction emissions	0.22 tons	4.24 tons	0.25 tons	0.25 tons
2022 total project construction emissions	0.22 tons	4.24 tons	0.25 tons	0.25 tons
2023 total project construction emissions	0.22 tons	4.24 tons	0.25 tons	0.25 tons
2024 total project construction emissions	0.22 tons	4.24 tons	0.25 tons	0.25 tons
2024 total project construction emissions	0.22 tons	4.24 tons	0.25 tons	0.25 tons
<b>2020 Average daily emissions<sup>1</sup></b>	2.39 lbs./day	46.26 lbs./day	2.07 lbs./day	2.07 lbs./day
<b>2021 Average daily emissions<sup>1</sup></b>	1.67 lbs./day	32.59 lbs./day	1.94 lbs./day	1.94 lbs./day
<b>2022 Average daily emissions<sup>1</sup></b>	1.67 lbs./day	32.59 lbs./day	1.94 lbs./day	1.94 lbs./day
<b>2023 Average daily emissions<sup>1</sup></b>	1.67 lbs./day	32.59 lbs./day	1.94 lbs./day	1.94 lbs./day
<b>2024 Average daily emissions<sup>1</sup></b>	1.67 lbs./day	32.59 lbs./day	1.94 lbs./day	1.94 lbs./day
<b>2025 Average daily emissions<sup>1</sup></b>	1.67 lbs./day	32.59 lbs./day	1.94 lbs./day	1.94 lbs./day
<i>BAAQMD Thresholds (pounds per day)</i>	54 lbs./day	54 lbs./day	82 lbs./day	54 lbs./day
<b>Exceed Threshold?</b>	No	No	No	No
Notes: <sup>1</sup> Assumes 260 workdays.				

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**Impact AIR-3:** The project would not expose sensitive receptors to substantial pollutant concentrations. **(Less than Significant Impact with Mitigation Incorporated)**

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Construction equipment and associated heavy-duty truck traffic generates diesel exhaust, which is a known TAC. These exhaust air pollutant emissions would not be considered to contribute substantially to existing or projected air quality violations. Construction exhaust emissions may still

pose health risks for sensitive receptors such as surrounding residents. The primary community risk impact issues associated with construction emissions are cancer risk and exposure to PM2.5. Diesel exhaust poses both a potential health and nuisance impact to nearby receptors. A health risk assessment of the project construction activities was conducted that evaluated potential health effects to nearby sensitive receptors from construction emissions of DPM and PM2.5. This assessment included dispersion modeling to predict the offsite and onsite concentrations resulting from project construction, so that lifetime cancer risks and non-cancer health effects could be evaluated.

The majority of the project's construction activities occur during the five-year Open Trenching Pavement portion while installing the new sewer pipeline. The trenching and installation would constantly be moving over the entire construction area and would only occur for approximately 30 days near any one receptor, except if near microtunneling sites. Microtunneling at the various crossings would occur for several months, along with the trenching and line installation. Much of this activity is near sensitive receptors. To analyze this effect, one of the microtunneling portions with the adjacent trenching was chosen to model as the worst-case scenario for assessing construction health risk impacts. The microtunneling crossing portion with the highest PM10 exhaust emissions and the closest receptors to the construction activities was at the Miller Slough crossing. This analysis evaluated the impacts from the construction of the Miller Slough crossing and the adjacent Open Trenching Pavement portions that were 500 feet in each direction from the crossing.

### **Construction Emissions**

The CalEEMod model provided total annual PM10 exhaust emissions (assumed to be DPM) for the off-road construction equipment and for exhaust emissions from on-road vehicles. The on-road emissions are a result of haul truck travel during demolition and grading activities, worker travel, and vendor deliveries during construction. For the Open Trenching Pavement portion, the emissions were totaled and then averaged out over the five-year construction period. The average yearly emissions were then divided by the total excavation length of the project (33,700 feet) to get the emissions per foot ratio. The model included 500 feet of Open Trenching Pavement construction on each side of microtunneling, so the PM10 exhaust emissions for each Open Trenching Pavement portion were calculated to be 0.0038 tons/500-feet and the fugitive PM2.5 dust emissions for each portion were calculated to be 0.0003 tons/500-feet.

The Miller Slough crossing portion would only occur for four months during the first year of project construction. Therefore, the CalEEMod model's total annual PM10 exhaust emissions and fugitive PM2.5 dust emissions were used. The annual emissions were divided evenly between the two portions of microtunneling. The emissions from all construction stages at each microtunneling site was 0.0192 tons for PM10 exhaust and 0.0016 tons for fugitive PM2.5 dust emissions.

### **Dispersion Modeling**

The U.S. EPA AERMOD dispersion model was used to predict concentrations of DPM and PM2.5 concentrations at existing sensitive receptors in the vicinity of the project construction area. The AERMOD dispersion model is a BAAQMD-recommended model for use in modeling these types of emission activities for CEQA projects. Construction emissions were modeled as occurring daily between 7:00 a.m. and 3:00 p.m., when most of the construction activity involving equipment usage would occur.



The maximum-modeled annual DPM and PM2.5 concentrations, which includes both the DPM and fugitive PM2.5 concentrations, were identified at nearby sensitive receptors (as shown in Implementation of Mitigation Measure AIR-2.1 is considered to reduce exhaust emissions by five (5) percent and fugitive dust emissions by over 50 percent. Implementation of Mitigation Measure AIR-2.2 using construction equipment meeting Tier 3 engine standards for Trenching portions and Tier 4 interim standards for Microtunneling portions would further reduce on-site diesel exhaust emissions from construction equipment by over 85 percent. This would reduce the cancer risk, such that the mitigated infant cancer risk from the project at the construction MEI would be 4.6 in one million, which would not exceed the BAAQMD significance threshold. After implementation of these mitigation measures, the project would have a less than significant impact with respect to community risk caused by construction activities. **(Less than Significant with Mitigation Incorporated)**

Figure 4.3-1) to find the maximally exposed individuals (MEIs). Using the maximum annual modeled DPM concentrations, the maximum increased cancer risks were calculated using BAAQMD recommended methods and exposure parameters described in Attachment 1 of Appendix A. Non-cancer health hazards and maximum PM2.5 concentrations were also calculated and identified.

#### Community Health Risk at Construction MEI

Results of this assessment indicated that the cancer risk and PM2.5 concentration MEIs were located on the first floor (1.5 meters) of the receptors adjacent to the east of the northern microtunneling site (West Branch Llagas Creek crossing on Murray Avenue – See Figure 4.3-1). The maximum excess residential cancer risks for infant exposure at this location would exceed the BAAQMD single-source threshold of 10 in one million. Table 4.3-5 summarizes the maximum cancer risks, PM2.5 concentrations, and health hazard indexes for project related construction activities affecting the construction MEIs.

<b>Table 4.3-5: Impacts from Construction Risk at MEIs</b>				
<b>Source</b>		<b>Cancer Risk (per million)</b>	<b>Annual PM<sub>2.5</sub> (µg/m<sup>3</sup>)</b>	<b>Hazard Index</b>
Project Construction	Unmitigated	<b>40.0 (infant)</b>	0.25	0.05
	Mitigated	4.6 (infant)	0.06	0.01
<b>BAAQMD Single-Source Threshold</b>		<b>&gt;10.0</b>	<b>&gt;0.3</b>	<b>&gt;0.1</b>
<i>Above threshold?</i>	Unmitigated	<b>Yes</b>	<i>No</i>	<i>No</i>
	Mitigated	<i>No</i>	<i>No</i>	<i>No</i>

Implementation of Mitigation Measure AIR-2.1 is considered to reduce exhaust emissions by five (5) percent and fugitive dust emissions by over 50 percent. Implementation of Mitigation Measure AIR-2.2 using construction equipment meeting Tier 3 engine standards for Trenching portions and Tier 4 interim standards for Microtunneling portions would further reduce on-site diesel exhaust emissions from construction equipment by over 85 percent. This would reduce the cancer risk, such that the mitigated infant cancer risk from the project at the construction MEI would be 4.6 in one million, which would not exceed the BAAQMD significance threshold. After implementation of these mitigation measures, the project would have a less than significant impact with respect to community risk caused by construction activities. **(Less than Significant with Mitigation Incorporated)**





LOCATIONS OF OFF-SITE SENSITIVE RECEPTORS AND TAC IMPACTS

FIGURE 4.3-1



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**Impact AIR-4:** The project would not result in other emissions (such as those leading to odors) adversely affecting a substantial number of people. **(Less than Significant Impact)**

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The proposed project would install underground sewer main line to facilitate City of Morgan Hill's planned growth. With appropriate design and installation, operation of the proposed sewer relief trunk would not create objectionable odors affecting a substantial number of people.

Odors from construction equipment (e.g., diesel exhaust) and materials (e.g., asphalt) may be noticeable during construction of the proposed sewer relief trunk project. Project construction would be temporary and, therefore, odors generated during construction activities are not considered significant. **(Less Than Significant Impact)**



## 4.4 BIOLOGICAL RESOURCES

The following discussion is based, in part, on a Biological Reconnaissance Letter prepared by *WRA, Inc.* in November 2019. A copy of the report is attached as Appendix B of this Initial Study.

### 4.4.1 Environmental Setting

#### 4.4.1.1 *Regulatory Framework*

##### **Federal and State**

##### Special-Status Species

Individual plant and animal species listed as rare, threatened or endangered under state and federal Endangered Species Acts are considered ‘special-status species.’ Federal and state “endangered species” legislation has provided the United States Fish and Wildlife Service (USFWS) and the California Department of Fish and Wildlife (CDFW) with a mechanism for conserving and protecting plant and animal species of limited distribution and/or low or declining populations. Permits may be required from both the USFWS and CDFW if activities associated with a proposed project will result in the take of a species listed as threatened or endangered. To “take” a listed species, as defined by the State of California, is “to hunt, pursue, catch, capture, or kill, or attempt to hunt, pursue, catch, capture or kill” said species. “Take” is more broadly defined by the federal Endangered Species Act to include “harm” of a listed species.

In addition to species listed under state and federal Endangered Species Acts, Section 15380 (b) and (c) of the CEQA Guidelines provide that all potential rare or sensitive species, or habitats capable of supporting rare species, are considered for environmental review per the CEQA Guidelines. These may include plant species of concern in California listed by the California Native Plant Society and CDFW listed “Species of Special Concern”.

##### Migratory Bird and Birds of Prey Protections

Federal and state laws also protect most bird species. The federal Migratory Bird Treaty Act prohibits killing, possessing, or trading in migratory birds, except in accordance with regulations prescribed by the Secretary of the Interior. This act encompasses whole birds, parts of birds, and bird nests and eggs.

Birds of prey, such as owls and hawks, are protected in California under provisions of the State Fish and Game Code. The code states that it is “unlawful to take, possess, or destroy any birds in the order Falconiformes or Strigiformes (birds of prey) or to take, possess, or destroy the nest or eggs of any such bird except as otherwise provided by this code or any regulation adopted pursuant thereto.” Construction disturbance during the breeding season could result in the incidental loss of fertile eggs or nestlings, or otherwise lead to nest abandonment. Disturbance that causes nest abandonment and/or loss of reproductive effort is considered “taking” by the CDFW.

##### Sensitive Habitats

Wetland and riparian habitats are considered sensitive habitats under CEQA. They are also afforded protection under applicable federal, state, and local regulations, and are generally subject to

regulation, protection, or consideration by the US Army Corps of Engineers (USACE), Regional Water Quality Control Board (RWQCB), CDFW, and/or the USFWS under provisions of the federal Clean Water Act (e.g., Sections 303, 304, 404) and State of California Porter-Cologne Water Quality Control Act. US Environmental Protection Agency (EPA) regulations, called for under Section 402 of the Clean Water Act, also include the National Pollutant Discharge Elimination System (NPDES) permit program, which controls sources that discharge into waters of the United States (e.g., streams, lakes, bays, etc.).

#### CDFW Stream/Riparian Habitat

Streambeds and banks, as well as associated riparian habitat, are regulated by the CDFW per Section 1602 of the Fish and Game Code. Work within the bed or banks of a stream or the adjacent riparian habitat requires a Streambed Alteration Agreement from the CDFW. Provisions of these regulations apply to modifications of sensitive aquatic habitats and riparian habitats within the project area.

### **Regional**

#### Santa Clara Valley Habitat Plan/Natural Community Conservation Plan

The Santa Clara Valley Habitat Plan/Natural Community Conservation Plan (SCVHP) covers an area of 519,506 acres, or approximately 62 percent of Santa Clara County. It was developed and adopted through a partnership between Santa Clara County, the Cities of San José, Morgan Hill, and Gilroy, Santa Clara Valley Water District (SCVWD), Santa Clara Valley Transportation Authority (VTA), USFWS and CDFW. The SCVHP is intended to promote the recovery of endangered species and enhance ecological diversity and function, while accommodating planned growth in approximately 500,000 acres of southern Santa Clara County. The Santa Clara Valley Habitat Agency is responsible for implementing the plan.

### **Local**

#### Santa Clara County General Plan

The following policies and goals in the Santa Clara County General Plan provide for the protection of biotic resources.

<b>Policy</b>	<b>Description</b>
C-RC 27	Habitat types and biodiversity within Santa Clara County and the region should be maintained and enhanced for their ecological, functional, aesthetic, and recreational importance.
R-RC 31	Natural streams, riparian areas, and freshwater marshes shall be left in their natural state providing for percolation and water quality, fisheries, wildlife habitat, aesthetic relief, and educational or recreational uses that are environmentally compatible. Streams which may still provide spawning areas for anadromous fish species should be protected from pollution and development impacts which would degrade the quality of the stream environment.
R-RC 32	Riparian and freshwater habitats shall be protected through the following general means: a. setback of development from the top of the bank; b. regulation of tree and vegetation removal; c. reducing or eliminating use of herbicides, pesticides, and fertilizers by public

agencies; d. control and design of grading, road construction, and bridges to minimize environmental impacts and avoid alteration of the streambed and stream banks (free-span bridges and arch culverts, for example); and e. protection of endemic, native vegetation.

- R-RC 37      Lands near creeks, streams, and freshwater marshes shall be considered to be in a protected buffer area, consisting of the following: 1. 150 feet from the top bank on both sides where the creek or stream is predominantly in its natural state; 2. 100 feet from the top bank on both sides of the waterway where the creek or stream has had major alterations; and 3. In the case that neither (1) nor (2) are applicable, an area sufficient to protect the stream environment from adverse impacts of adjacent development, including impacts upon habitat, from sedimentation, biochemical, thermal and aesthetic impacts.
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#### County Tree Preservation and Removal Ordinance

The County of Santa Clara Tree Preservation and Removal Ordinance serves to protect trees in certain zoning districts that are over 37.7 inches in circumference (12 inches or more in diameter) measured at 4.5 feet above the ground, or exceed 20 feet in height. County-designated heritage trees are also protected. In accordance with the Tree Preservation and Removal Ordinance, the County's Guidelines for Tree Protection and Preservation for Land Use Applications are used to evaluate how trees are protected, preserved, removed and replaced, as part of land use approvals.

#### City of Gilroy Consolidated Landscape Policy

Section 6.0 of the City's Consolidated Landscaping Policy states that the following trees are designated significant 1) existing native trees (naturally occurring in species in Gilroy) six inches or more in diameter, at a point four and one-half feet above the ground, or 2) important to the historical or visual aspect of Gilroy. The City is in the process of codifying tree protection measures contained in the policy. However, new codified standards have not been adopted. Therefore, for purposes of this review the Consolidated Landscaping Policy remains the City of Gilroy adopted threshold of significance for this impact.

#### **4.4.1.2      *Existing Conditions***

The sewer alignment crosses Miller Slough at Chestnut Street and West Branch Llagas Creek at Murray Avenue. The southern half of the alignment is primarily bordered by residential homes and commercial businesses. The north half of the alignment is bordered by low density single-family dwellings and agricultural fields and orchards. In the greater landscape context, the proposed alignment traverses from a more developed southern portion within the City of Gilroy to a less developed, more agricultural setting, in Santa Clara County.

### **Wetland and Waters of the US/State**

One potentially jurisdictional non-wetland water feature was observed within the study area. The study area crosses waterways in two locations: Miller Slough at Chestnut Street and West Branch Llagas Creek at Murray Avenue. Miller Slough is a freshwater slough and West Branch Llagas Creek is a freshwater creek. Both are considered sensitive vegetation communities as they are seasonally inundated waterways connected to the Pajaro River. The waterways at both locations are located in a constructed channel with a defined bed and bank and visible signs of inundation on historic and current imagery (Google Earth 2019). Miller Slough at the

Chestnut Street crossing is approximately 14 feet wide with a natural bottom substrate. The slough main channel was dry during the site visit in August and consisted of compacted soil and trash/debris build-up. Vegetation in the channel consisted of Dallis grass (*Paspalum dilatatum*), chicory, Italian ryegrass (*Festuca perennis*), and Italian thistle (*Carduus pycnocephalus*). West Branch Llagas Creek at the Murray Avenue crossing is approximately 80 feet wide with a rip rap bottom substrate underneath Murray Avenue and a natural bottom substrate on either side. This portion of the creek was also dry during the site visit. Observed facultative vegetation within the slough consisted of cocklebur (*Xanthium strumarium*), curly dock (*Rumex crispus*), and tall cyperus (*Cyperus eragrostis*). Riparian vegetation was absent and the banks at the locations of the crossings were dominated by non-native grasses.

## **Special Status Species**

### Special-Status Plant Species

Based upon a search of the databases listed above, 16 special-status plant species have documented occurrences within the Gilroy, Mt. Madonna, and Chittenden USGS quadrangle and the vicinity of the study area. Of the 16 special-status species documented (refer to Appendix B), all are either unlikely or have no potential to occur within the study area for one or more of the following reasons:

- The project area has been repeatedly and intensively altered from a natural state thereby eliminating the seedbank or diminishing establishment of the special-status plant(s);
- The project area does not contain hydrologic conditions (e.g., vernal pools, marshes and swamps) necessary to support the special-status plant(s);
- The project area does not contain edaphic (soil) conditions (e.g., serpentine substrate) necessary to support the special-status plant(s);
- The project area does not contain vegetation communities (e.g., chaparral, vernal pools) associated with the special-status plant(s);

No special-status plant species were observed during the site visit.

### Special-status Wildlife Species

Of the 25 special-status wildlife species documented (refer to Appendix B) in the vicinity of the Study Area, most are excluded from the Study Area based on a lack of habitat features. The absence of such habitat features eliminates components critical to the survival or movement of most special-status species found in the vicinity. Species like California red-legged frog (*Rana draytonii*) and California tiger salamander (*Ambystoma californiense*) are known to occur in the open spaces in the vicinity. However, suitable aquatic habitat and movement corridors connecting the study area to outside source populations are absent, precluding these species from the study area. In addition, the bulk of the study area is located within residential or light industrial urban development with no suitable habitat for these species. It should be mentioned that other portions of West Branch Llagas Creek support the southcentral California coast distinct population segment of steelhead (*Oncorhynchus mykiss*). However, the impacts associated with the project will occur in a channelized creek location where suitable steelhead habitat is not present.

Two special status species have potential to occur in the immediate vicinity of portions of the project alignment: white-tailed kite (*Elanus leucurus*) and burrowing owl (*Athene cunicularia*). White-tailed

kite may nest in trees of varying size in open spaces adjacent to the project area, and may forage in ruderal and open agricultural areas, chiefly in the portions of the study area adjacent to Monterey Highway. Burrowing owl presence is only possible on a small portion of the alignment between Monterey Highway and Murray Avenue on West Las Animas Avenue. Ground squirrels are active in ruderal open spaces on either side of the road in this location, creating possible wintering and breeding habitat for burrowing owl.

### **Vegetation Communities**

The project area is primarily composed of developed/landscaped areas, and ruderal/disturbed areas, both of which are not considered sensitive vegetation communities. The developed/landscaped areas are located throughout the 6.6-mile sewer alignment and consist of paved roadway, paved parking lots, and ornamental landscape plantings. Ruderal/disturbed areas are located in the southernmost portion of the alignment and appear to have been recently disturbed by construction and/or maintenance activities. Ruderal areas are dominated by nonnative invasive grasses and herbaceous plants including oat (*Avena* sp.), ripgut brome (*Bromus diandrus*), yellow star thistle (*Centaurea solstitialis*), chicory (*Cichorium intybus*), and prickly lettuce (*Lactuca serriola*).

### **Wildlife Corridors**

The project area does not function as a wildlife movement corridor. The extent and density of existing development surrounding the project alignment means that the site does not function as a habitat corridor for the movement of terrestrial wildlife or plants. The distance between viable core habitat areas for terrestrial species is too great, and the intensity of disturbance from traffic along major roads, nighttime lighting, noise, and human presence over that distance is a major deterrent to terrestrial wildlife movement.

#### **4.4.2      Impact Discussion**

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
<hr/> Would the project:				
1) Have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife (CDFW) or United States Fish and Wildlife Service (USFWS)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations, or by the CDFW or USFWS?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>



	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
3) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
5) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
6) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

**Impact BIO-1:** The project would not have a substantial adverse effect, either directly or through habitat modifications, on any species identified as a candidate, sensitive, or special status species in local or regional plans, policies, or regulations, or by the CDFW or USFWS. **(Less than Significant Impact)**

### Special-Status Plant Species

As discussed in *Section 4.4.1.2 Existing Conditions*, based on the highly disturbed nature of the alignment, and lack of associated natural vegetation communities, the project area does not provide suitable habitat for special-status plant species. No impacts to special-status plant species are therefore, anticipated as a result of the proposed project. **(No Impact)**

### Special-Status and Non-Special-Status Nesting Birds

Two special-status wildlife species have the potential to occur within the immediate vicinity of the project alignment: burrowing owl (CDFW SSC) and white-tailed kite (CDFW CFP). White-tailed kite may nest in trees of varying size in open spaces adjacent to the project area, and may forage in ruderal and open agricultural areas, chiefly in the portions of the project area adjacent to Monterey Highway. Burrowing owl presence is only possible on a small portion of the alignment between Monterey Highway and Murray Avenue on West Las Animas Avenue. Ground squirrels are active in ruderal open spaces on either side of the road in this location, creating possible wintering and breeding habitat for burrowing owl.

Non-special status native birds may also nest on the ground, as well as in trees and vegetation within the project area. The nests of such birds are protected under the Migratory Bird Treaty Act (MBTA) as well as by California Fish and Game Codes (CFGF). Due to the location of the majority of the sewer alignment on active paved roads, any species that nest nearby are likely accustomed to a baseline level of disturbance that will not be drastically increased by project activities. However, if construction begins during the nesting season window, generally between February 1 to August 31, nesting birds may be impacted through the removal of nest structures or through localized disturbance sufficient to cause nest abandonment. To avoid and minimize these potential impacts and maintain compliance with the MBTA and CFGC, the following conditions of approval are recommended:

#### Conditions of Approval

- If construction activities are initiated during the nesting season (February 1 – August 31), a nesting bird survey (including for burrowing owl) shall be conducted by a qualified biologist within 14 days prior to the start of construction. In areas of potential burrowing owl habitat, an additional survey shall be completed within 48 hours of the start of construction. If nests are present, exclusion buffers appropriate to the species shall be established by the qualified biologist to prevent impacts to nesting birds. No work shall be completed within the buffers until the biologist determines that young have fledged or the nest becomes inactive.
- If construction activities are initiated outside of the nesting season (September 1 – January 31), pre-construction surveys for over-wintering burrowing owl shall be conducted at the portion of the alignment along West Las Animas Avenue between Monterey Highway and Murray Avenue in the City of Gilroy where ground squirrels were observed to be active. Surveys shall be conducted within 14 days of the start of construction and assess the immediate vicinity of the project area as well as a 250-foot buffer. Surveys shall be conducted by a qualified biologist, and assess extant ground squirrel burrows of suitable size for the presence of burrowing owls or signs of burrowing owl occupancy (i.e. whitewash, pellets, feathers). If burrowing owl are discovered within 250 feet of areas of construction disturbance, exclusion buffers appropriate to the conditions present shall be established by the qualified biologist. No work shall be completed within the buffers until the burrow has been determined abandoned by a qualified biologist.

With implementation of the above conditions of approval, the impacts to burrowing owls and other nesting birds species would be less than significant. **(Less than Significant Impact)**

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**Impact BIO-2:** The project would not have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, regulations or by the CDFW or USFWS. **(Less than Significant Impact)**

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The study area contains two sensitive communities: Miller Slough and West Branch Llagas Creek. Both Miller Slough and West Branch Llagas Creek are seasonally inundated freshwater waterways that drain to the Pajaro River, a perennial watercourse. Fill placed within Miller Slough or West Branch Llagas Creek would require a Section 404 permit from the U.S. Army Corps of Engineers

(Corps), a Section 401 Water Quality Certification from the Regional Water Quality Control Board (RWQCB), and a Section 1602 Lake and Streambed Alteration Agreement from the California Department of Fish and Wildlife (CDFW).

The entry and exit locations for the crossings are located above top-of-bank and outside of riparian areas present outside of the study area. Depending on the method of crossing employed, high pressures present during drilling can force drilling material to the surface from beneath the ground, an incident known as a “frac-out”. If frac-out occurred, drilling material (typically primarily comprised of bentonite) could enter the bed and/or banks of Miller Slough or West Branch Llagas Creek, requiring entry into the slough to clean up the material. As explained in the Project Description, the waterway crossings would be designed at a sufficient depth to protect the bed and avoid potential for frac-out. Based on the condition of Miller Slough and West Branch Llagas Creek at the point of crossing, low frequency and duration of flow, and very low probability of frac-out when accounting for design depth, this is considered a less than significant potential impact. No other potential impacts to sensitive communities are likely to occur as a result of the project. **(Less than Significant Impact)**

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**Impact BIO-3:** The project would not have a substantial adverse effect on state or federally protected wetlands through direct removal, filling, hydrological interruption, or other means. **(No Impact)**

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The study area contains two sensitive vegetation community, Miller Slough at Chestnut Street and West Branch Llagas Creek at Murray Avenue. Based on proposed crossing techniques, no impacts to potentially jurisdictional features are anticipated. No additional sensitive communities or areas of potential wetlands, non-wetland waters, streams, lakes, ponds, or riparian habitats are present within the study area. Therefore, no impact would occur. **(No Impact)**

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**Impact BIO-4:** The project would not 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. **(No Impact)**

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As discussed in *Section 4.4.1.2 Existing Conditions*, the project area does not function as a wildlife corridor. Additionally, the majority of work that would occur as a result of the proposed project will take place in already paved areas. As such, any disturbances that would occur are essentially equivalent to existing conditions when considering wildlife movements through the study area. The project will thus have no further impact on wildlife movement than current existing conditions. Therefore, no effects to wildlife corridors will result from the proposed project. **(No impact)**

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**Impact BIO-5:** The project would not conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance. **(Less than Significant Impact)**

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In the project area, a variety of trees are located at both sides of Hwy 101 trenchless crossing from 7th Street to Renz Lane and near the pedestrian bridge at the intersection of Chestnut Street and

Lewis Street in the City of Gilroy, and near the intersection of Las Animas Avenue and Electa Court in the City of Gilroy. The exact location and sizing of pits for trenchless construction has not been determined. Depending on the proximity of the proposed sewer main modifications to the existing street trees, some trees may need to be pruned/trimmed or removed due to conflicts with the proposed project. All tree pruning/trimming and removal completed by the proposed project would adhere to the City of Gilroy tree removal guidelines and County of Santa Clara's Tree Preservation Ordinance, as applicable. For these reasons, the project would not conflict with any local policies or ordinances protecting biological resources. **(Less Than Significant Impact)**

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**Impact BIO-6:** The project would not conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or state habitat conservation plan. **(Less than Significant Impact)**

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The project is located within the boundaries of the Santa Clara Valley Habitat Plan/Natural Community Conservation Plan (SCVHP) and is considered a Rural development area not covered under the VHP for the northern part of the alignment until Cohansey Avenue. Alignment south of it is categorized as urban development equal to or greater than two acres is covered. The proposed project would be consistent with the goals and objectives identified in VHP. Thus, the proposed project does not present any conflicts with any provisions of an adopted SCVHP or other conservation plan and would have no impact. **(Less than Significant Impact)**

## 4.5 CULTURAL RESOURCES

The following discussion is based, in part, on an Archaeological Records Search prepared by *Holman & Associates, Inc.* in October 2017 and revised in January 2020. A copy of the archaeology report is on file with the City of Morgan Hill and available for review by qualified professionals.

### 4.5.1 Environmental Setting

#### 4.5.1.1 *Regulatory Framework*

##### **Federal and State**

##### National Historic Preservation Act

Federal protection is legislated by the National Historic Preservation Act of 1966 (NHPA) and the Archaeological Resource Protection Act of 1979. These laws maintain processes for determination of the effects on historical properties eligible for listing in the National Register of Historic Places (NRHP). Section 106 of the NHPA and related regulations (36 Code of Federal Regulations [CFR] Part 800) constitute the primary federal regulatory framework guiding cultural resources investigations and require consideration of effects on properties that are listed or eligible for listing in the NRHP. Impacts to properties listed in the NRHP must be evaluated under CEQA.

##### California Register of Historical Resources

The California Register of Historical Resources (CRHR) is administered by the State Office of Historic Preservation and encourages protection of resources of architectural, historical, archeological, and cultural significance. The CRHR identifies historic resources for state and local planning purposes and affords protections under CEQA. Under Public Resources Code Section 5024.1(c), a resource may be eligible for listing in the CRHR if it meets any of the NRHP criteria.<sup>13</sup>

Historical resources eligible for listing in the CRHR must meet the significance criteria described previously and retain enough of their historic character or appearance to be recognizable as historical resources and to convey the reasons for their significance. A resource that has lost its historic character or appearance may still have sufficient integrity for the CRHR if it maintains the potential to yield significant scientific or historical information or specific data.

The concept of integrity is essential to identifying the important physical characteristics of historical resources and, therefore, in evaluating adverse changes to them. Integrity is defined as “the authenticity of a historical resource’s physical identity evidenced by the survival of characteristics that existed during the resource’s period of significance.” The processes of determining integrity are similar for both the CRHR and NRHP and use the same seven variables or aspects to define integrity that are used to evaluate a resource’s eligibility for listing. These seven characteristics include 1) location, 2) design, 3) setting, 4) materials, 5) workmanship, 6) feeling, and 7) association.

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<sup>13</sup> California Office of Historic Preservation. “CEQA Guidelines Section 15064.5(a)(3) and California Office of Historic Preservation Technical Assistance Series #6.” March 14, 2006.



## California Native American Historical, Cultural, and Sacred Sites Act

The California Native American Historical, Cultural, and Sacred Sites Act applies to both state and private lands. The act requires that upon discovery of human remains, construction or excavation activity must cease and the county coroner be notified.

### Public Resources Code Sections 5097 and 5097.98

Section 15064.5 of the CEQA Guidelines specifies procedures to be used in the event of an unexpected discovery of Native American human remains on non-federal land. These procedures are outlined in Public Resources Code Sections 5097 and 5097.98. These codes protect such remains from disturbance, vandalism, and inadvertent destruction, establish procedures to be implemented if Native American skeletal remains are discovered during construction of a project, and establish the Native American Heritage Commission (NAHC) as the authority to resolve disputes regarding disposition of such remains.

Pursuant to Public Resources Code Section 5097.98, in the event of human remains discovery, no further disturbance is allowed until the county coroner has made the necessary findings regarding the origin and disposition of the remains. If the remains are of a Native American, the county coroner must notify the NAHC. The NAHC then notifies those persons most likely to be related to the Native American remains. The code section also stipulates the procedures that the descendants may follow for treating or disposing of the remains and associated grave goods.

#### **4.5.1.2      *Existing Conditions***

The Morgan Hill Sewer Relief Trunk project is located in south-central Santa Clara County between San Martín and the City of Gilroy, the most southerly city in the county. The project site is contained on the USGS “Gilroy” 7.5 minute topographic quadrangle. The Project route runs basically north/south in the middle of the southern Santa Clara Valley, crossing several small seasonal to larger watercourses running south/west to Monterey Bay. Elevation at the north end of the project is about 269 feet and at the south end about 186 feet. The terrain is generally flat and nearly level. This area varies from sparsely populated mainly agricultural areas generally at the north to fully urbanized portions of Gilroy at the south.

### **Archaeological Resources**

The southern Santa Clara Valley floor has been inhabited by humans for at least 10,000 years and contains many prehistoric Native American archaeological sites, as well as historic archaeological and cultural resources dating to the Spanish/Mexican era. Known sites tend to cluster along watercourses and at the foot of the hills where streams emerge from canyons to create natural alluvial fans of materials carried to and spread by water and colluvial action. Alluvial fans, which cover most of the valley, are likely to contain buried sites because the fans bury cultural resources with sediments transported by fluvial processes. These landforms usually contain optimal subsistence resources (e.g., distance to water), and other environmental factors that would have made the location more favorable for prehistoric occupation than others. The high number of prehistoric sites recorded along streams like Llagas Creek and Little Llagas Creek near the project area illustrate the region’s archaeological sensitivity, which may be termed moderately high. Sensitivity for historic archaeological resources is assessed as low because the project will run in roads mostly established

more than 100 years ago and therefore not likely to contain historic deposits.

### Historic Resources

The 10 recorded cultural resources within the records search area are all historic structures or remnants (Table 4.5-1); some are still in use, primarily as transportation facilities. As seen in Table 4.5-1 below, nine of the ten historic resources' records have evaluative statements included and all nine are found to be not eligible for the National Register of Historic Places (NRHP) or the California Register of Historical Resources (CRHR), so they would not qualify as historical resources under CEQA.

<b>Table 4.5-1: Morgan Hill Sewer Trunk Project: Recorded Historical Resources in the Record Search Area.</b>					
<b><i>Primary Number</i></b>	<b><i>Site Number</i></b>	<b><i>Name</i></b>	<b><i>Type</i></b>	<b><i>Evaluation*</i></b>	<b><i>NWIC Report#</i></b>
P-43-000555	SCL-560H	Fitzgerald-Alemand Ranch	19 <sup>th</sup> Cent. Farmstead	Potentially significant (unevaluated)	Cartier and Detlefs 1984 S-6519a
P-43-000898	n/a	7651 Forest Street	private residence	not eligible	Minor 1994 P-43-000898
P-43-000928	n/a	Southern Pacific Railroad	railroad tracks	not eligible	Herbert 2002 S-029657a
P-43-0001487	n/a	Southern Pacific Railroad	railroad tracks	not eligible	Berg and Mikesell 1999 P-43-0001487
P-43-0001490	n/a	Pacheco Pass Highway	historic/modern highway	not eligible	Wee and Rogers 2001 P-43-0001490
P-43-0001497	n/a	Eliot Elementary School	public school	not eligible	Cartier 2003 P-43-0001497
P-43-0001807	n/a	Gilroy Canning Company	remnant of industrial buildings	not eligible	Urban Programmers 2005 P-43-0001807
P-43-0002665	n/a	Pacheco Pass Motel	standing structure	not eligible	Arrigoni 2012 P-43-0002665
P-43-0003023	n/a	PG&E Tower	standing structure	not eligible	Crawford 2013 P-43-0003023
P-43-0003043	n/a	25 Cohansey Avenue	standing structures	not eligible	Rogers 2001 P-43-0003043
*Evaluation for eligibility to the NRHP and/or CRHR					

## 4.5.2

## Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Cause a substantial adverse change in the significance of a historical resource pursuant to CEQA Guidelines Section 15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Cause a substantial adverse change in the significance of an archaeological resource as pursuant to CEQA Guidelines Section 15064.5?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
3) Disturb any human remains, including those interred outside of dedicated cemeteries?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

---

**Impact CUL-1:** The project would not cause a substantial adverse change in the significance of a historical resource pursuant to CEQA Guidelines Section 15064.5. **(No Impact)**

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The types of cultural resources that meet the definition of historical resources under CEQA generally consist of districts, sites, buildings, structures, and objects that are significant for their traditional, cultural, and/or historical associations. As discussed in *Section 4.5.1.2* above, there have been 10 recorded historical resources in the area adjacent to the project site or within 200 meters of the alignment. Nine out of 10 have been evaluated as non historic resources under CEQA criteria, would not be directly impacted by the project as the proposed alignment is designed to be placed in paved right-of-way with the exception of the locations where trenchless installation will be used (which would also all be in easements). Since the new sewer pipes would be underground and the project nearly entirely invisible when constructed, there will be no adverse indirect impacts either. The one historic resource (P-43-000555) is set well off Monterey Road (at least 360 feet/110 m) and since the proposed project would be an underground pipeline and virtually invisible, no adverse effects to the resource will result.

Since all these resources are outside the areas of direct impact and since the proposed pipelines would be entirely underground, indirect impacts are also not anticipated. Therefore, no additional research or mitigation measures are necessary. **(No Impact)**

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**Impact CUL-2:** The project would not cause a substantial adverse change in the significance of an archaeological resource pursuant to CEQA Guidelines Section 15064.5. **(Less than Significant Impact)**

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A records search was conducted at the CHRIS Northwest Information Center covering an area 200 meter wide/one-eighth mile around all of Morgan Hill Sewer Trunk project alignment. No cultural resources were identified within the project area or areas of direct impacts and no prehistoric archaeological resources are recorded as sites within the search area. Three locations are noted as containing isolated prehistoric artifacts and/or faunal materials, all near Miller Slough. There is a

moderately high potential for buried Native American sites within portions of the project area and a moderately low to low potential for historic-era features.

Most of the project pipeline route has been previously surveyed, including all of Monterey Road, most of it several times, with negative results for archaeological resources. Surveys in the vicinity near Llagas, Little Llagas, and Uvas Creeks have found prehistoric sites, but none close to the project impact zones; a few archaeological indicators have been found in disturbed areas along the historic and nearby channelized route of Miller Slough. The only reaches of the proposed project not previously surveyed are along Highland Avenue at the north, the section on Las Animas Avenue between Monterey Road and US 101, and generally along Murray Avenue and the northernmost portion of Chestnut Avenue. The archaeological report prepared for the project recommends intensive pedestrian field inspection be conducted by qualified archaeologists in zones not previously well examined. Although it is extremely unlikely that cultural resources, including human remains, would be encountered during construction of the proposed project alignment, the following measures shall be incorporated to ensure potential impacts to cultural resources are avoided:

#### Conditions of Approval

- If buried or previously unrecognized archaeological deposits or materials of any kind are inadvertently exposed during any construction activity, work within 100 feet/30 m of the find shall cease until a qualified archaeologist can assess the find and provide recommendations for further treatment, as warranted. Construction and potential impacts to the area(s) within a radius determined by the archaeologist should not recommence until the assessment is complete and any mitigation measures warranted are implemented.
- If any human remains are found during any field investigations, grading, or other construction activities, all provisions of California Health and Safety Code Sections 7054 and 7050.5 and Public Resources Code Sections 5097.9 through 5097.99, as amended per Assembly Bill 2641, shall be followed. In the event of the discovery of human remains during construction, there shall be no further excavation or disturbance of the site or any nearby area reasonably suspected to overlie adjacent remains. The project applicant shall immediately notify the Santa Clara County Coroner/ Medical Examiner's Office. The Coroner will make a determination as to whether the remains are Native American.

If the remains are believed to be Native American, the Coroner shall contact the NAHC within 24 hours. The NAHC will then designate a Most Likely Descendant (MLD). The MLD will inspect the remains and make a recommendation on the treatment of the remains and associated artifacts.

If one of the following conditions occurs, the landowner or his authorized representative shall work with the Coroner to reinter the Native American human remains and associated grave goods with appropriate dignity in a location not subject to further subsurface disturbance:

- The Native American Heritage Commission is unable to identify a most likely descendent or the most likely descendent failed to make a recommendation within 48 hours after being notified by the Commission.
- The descendant identified fails to make a recommendation; or

- The landowner or his authorized representative rejects the recommendation of the descendant, and the mediation by the NAHC fails to provide measures acceptable to the landowner.

With implementation of the Conditions of Approval listed above, the proposed project would have a less than significant impact on subsurface cultural resources. **(Less than Significant Impact)**

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**Impact CUL-3:** The project would not disturb any human remains, including those interred outside of dedicated cemeteries. **(Less than Significant Impact)**

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Refer to response to Impact CUL-2 above. As the project site is in an urbanized and disturbed area, the potential for discovery of human remains is low. The project site is not part of a formal cemetery. Although it is extremely unlikely that cultural resources, including human remains, would be uncovered during construction of the proposed project, the above listed Conditions of Approval will be incorporated to ensure potential impacts to human remains are avoided. **(Less than Significant Impact)**



## 4.6 ENERGY

The following discussion is based, in part, on an Air Quality Assessment prepared by *Illingworth & Rodkin* in July 2020. The report is provided in Appendix A of this EIR.

### 4.6.1 Environmental Setting

#### 4.6.1.1 *Regulatory Framework*

##### **Federal and State**

##### Energy Star and Fuel Efficiency

At the federal level, energy standards set by the EPA apply to numerous consumer products and appliances (e.g., the EnergyStar™ program). The EPA also sets fuel efficiency standards for automobiles and other modes of transportation.

##### Renewables Portfolio Standard Program

In 2002, California established its Renewables Portfolio Standard Program, with the goal of increasing the percentage of renewable energy in the state's electricity mix to 20 percent of retail sales by 2010. In 2008, Executive Order S-14-08 was signed into law, requiring retail sellers of electricity serve 33 percent of their load with renewable energy by 2020. In October 2015, Governor Brown signed SB 350 to codify California's climate and clean energy goals. A key provision of SB 350 requires retail sellers and publicly owned utilities to procure 50 percent of their electricity from renewable sources by 2030. SB 100, passed in 2018, requires 100 percent of electricity in California to be provided by 100 percent renewable and carbon-free sources by 2045.

##### Advanced Clean Cars Program

CARB adopted the Advanced Clean Cars program in 2012 in coordination with the EPA and National Highway Traffic Safety Administration. The program combines the control of smog-causing pollutants and GHG emissions into a single coordinated set of requirements for vehicle model years 2015 through 2025. The program promotes development of environmentally superior passenger cars and other vehicles, as well as saving the consumer money through fuel savings.<sup>14</sup>

##### **Local**

##### City of Morgan Hill 2035 General Plan

Adopted July 27, 2016, the Morgan Hill 2035 General Plan includes goals, policies, and actions to conserve energy and mitigate energy impacts resulting from planned developments within the City of Morgan Hill.<sup>15</sup> The following goals, policies, and actions are applicable to the proposed project:

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<sup>14</sup> California Air Resources Board. "The Advanced Clean Cars Program." Accessed April 6, 2018. <https://www.arb.ca.gov/msprog/acc/acc.htm>.

<sup>15</sup> City of Morgan Hill. "Chapter 8 Natural Resources and Environment." *City of Morgan Hill 2035 General Plan*. Accessed May 8, 2019. <https://www.morgan-hill.ca.gov/DocumentCenter/View/22839/MH2035-General-Plan---December-2017?bidId>

## Energy Efficiency

*Goal NRE-16:*                      *Conservation of energy resources.*

*Policy NRE-16.A:*            **Renewable Energy and Public Facilities.** Evaluate the use of renewable energy generation opportunities for all existing and future public buildings and facilities.

*Policy NRE-16.B:*            **Cooperative Energy Network.** Participate in the formation of a cooperative energy network with other local governments, particularly in Santa Clara County.

### 4.6.1.2            *Existing Conditions*

Total energy usage in California was approximately 7,881 trillion British thermal units (Btu) in the year 2017, the most recent year for which this data was available.<sup>16</sup> Out of the 50 states, California is ranked second in total energy consumption and 48<sup>th</sup> in energy consumption per capita. The breakdown by sector was approximately 18 percent (1,416 trillion Btu) for residential uses, 19 percent (1,473 trillion Btu) for commercial uses, 23 percent (1,818 trillion Btu) for industrial uses, and 40 percent (3,175 trillion Btu) for transportation.<sup>17</sup> This energy is primarily supplied in the form of natural gas, petroleum, nuclear electric power, and hydroelectric power.

### **Electricity**

Electricity in Santa Clara County in 2018 was consumed primarily by the commercial sector (77 percent), followed by the residential sector consuming 23 percent. In 2018, a total of approximately 16,668 gigawatt hours (GWh) of electricity was consumed in Santa Clara County.<sup>18</sup> The community-owned Silicon Valley Clean Energy (SVCE) is the electricity provider for the Cities of Morgan Hill, Gilroy and unincorporated Santa Clara County. SVCE sources the electricity and the Pacific Gas and Electric Company (PG&E) delivers it to customers over their existing utility lines. Customers are automatically enrolled in the GreenStart plan and can upgrade to the GreenPrime plan. Both options are considered 100 percent GHG-emission free.

### **Natural Gas**

PG&E provides natural gas services within the cities of Morgan Hill, Gilroy and incorporated Santa Clara County. In 2018, approximately one percent of California's natural gas supply came from in-state production, while the remaining supply was imported from other western states and Canada.<sup>19</sup> In 2018, residential and commercial customers in California used 34 percent of the state's natural gas, power plants used 35 percent, the industrial sector used 21 percent, and other uses used 10

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<sup>16</sup> United States Energy Information Administration. "State Profile and Energy Estimates, 2017." Accessed August 1, 2019. <https://www.eia.gov/state/?sid=CA#tabs-2>.

<sup>17</sup> United States Energy Information Administration. "State Profile and Energy Estimates, 2017." Accessed August 1, 2019. <https://www.eia.gov/state/?sid=CA#tabs-2>.

<sup>18</sup> Energy Consumption Data Management System. "Electricity Consumption by County." Accessed March 15, 2019. <http://ecdms.energy.ca.gov/elecbycounty.aspx>

<sup>19</sup> California Gas and Electric Utilities. 2019 *California Gas Report*. Accessed August 27, 2019. [https://www.socalgas.com/regulatory/documents/cgr/2019\\_CGR\\_Supplement\\_7-1-19.pdf](https://www.socalgas.com/regulatory/documents/cgr/2019_CGR_Supplement_7-1-19.pdf).

percent. Transportation accounted for one percent of natural gas use in California. In 2018, Santa Clara County used approximately 3.5 percent of the state's total consumption of natural gas.

### Fuel for Motor Vehicles

In 2018, approximately 15.5 billion gallons of gasoline were sold in California.<sup>20</sup> The average fuel economy for light-duty vehicles (autos, pickups, vans, and sport utility vehicles) in the United States has steadily increased from about 13.1 miles per gallon (mpg) in the mid-1970s to 24.9 mpg in 2018.<sup>21</sup> Federal fuel economy standards have changed substantially since the Energy Independence and Security Act was passed in 2007. That standard, which originally mandated a national fuel economy standard of 35 miles per gallon by the year 2020, was subsequently revised to apply to cars and light trucks model years 2011 through 2020.<sup>22,23</sup>

#### 4.6.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Result in a potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) Conflict with or obstruct a state or local plan for renewable energy or energy efficiency?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
<b>Impact EN-1:</b> The project would not result in a potentially significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation. <b>(Less than Significant Impact)</b>				

### Construction Impacts

Construction of the proposed project would result in a temporary increase in energy consumption due to the use of construction equipment and vehicles. As described in MM AIR-2.1, the proposed project would integrate design features and construction measures that would help to reduce the energy use associated with construction equipment and vehicles. As a result, construction of the proposed project would not result in wasteful, inefficient, or unnecessary use of energy, and impacts would be less than significant. **(Less than Significant Impact)**

<sup>20</sup> California Department of Tax and Fee Administration. "Net Taxable Gasoline Gallons." Accessed May 8, 2019. <https://www.cdtfa.ca.gov/taxes-and-fees/MVF-10-Year-Report.pdf>.

<sup>21</sup> United States Environmental Protection Agency. *The 2018 EPA Automotive Trends Report: Greenhouse Gas Emissions, Fuel Economy, and Technology since 1975*. March 2019.

<sup>22</sup> United States Department of Energy. *Energy Independence & Security Act of 2007*. Accessed May 8, 2019. <http://www.afdc.energy.gov/laws/eisa>.

<sup>23</sup> United States Department of Energy. *Energy Independence & Security Act of 2007*. Accessed May 8, 2019. <http://www.afdc.energy.gov/laws/eisa>.

## Operational Impacts

Operation of the proposed project would result in minimal energy consumption due to vehicle trips to and from the project area during operation and maintenance activities. However, the proposed project would not require any energy resources to operate efficiently as there are no pumps/lift stations and the sewer lines are gravity-fed. **(Less than Significant Impact)**

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**Impact EN-2:** The project would not conflict with or obstruct a state or local plan for renewable energy or energy efficiency. **(Less than Significant Impact)**

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As described in Impact EN-1, the proposed project would not create an increase in energy demand. For these reasons it would not conflict with or obstruct a state or local plan for renewable energy or energy efficiency and the impact would be less than significant. **(Less than Significant Impact)**

## 4.7 GEOLOGY AND SOILS

The following discussion is based in part on a Geotechnical Investigation Report prepared by *Geologic Associates* in November 2018. A copy of this report is attached in Appendix C.

### 4.7.1 Environmental Setting

#### 4.7.1.1 *Regulatory Framework*

##### State

##### Alquist-Priolo Earthquake Fault Zoning Act

The Alquist-Priolo Earthquake Fault Zoning Act was passed into law following the destructive 1971 San Fernando earthquake. The Act ensures public safety by prohibiting the siting of most structures for human occupancy across traces of active faults that constitute a potential hazard to structures from surface faulting or fault creep. Local agencies are responsible for regulating most development projects within designated fault zones. Alquist-Priolo maps are distributed to affected cities, counties, and state agencies for their use in planning and controlling new construction.

##### Seismic Hazards Mapping Act

Following the 1989 Loma Prieta earthquake, the Seismic Hazards Mapping Act (SHMA) was passed by the California legislature in 1990. The SHMA (Public Resources Code, Chapter 7.8, Section 2690-2699.6) directs the Department of Conservation, California Geological Survey to identify and map areas prone to liquefaction, earthquake-induced landslides and amplified ground shaking. It also requires that agencies only approve projects in seismic hazard zones following site-specific geotechnical investigations to determine if the identified hazard is present and the inclusion of appropriate mitigation to reduce earthquake-related hazards.

##### Local

##### City of Morgan Hill

**Policy SSI-2.5** Design of Critical Structures. Design and construct critical structures to resist minor earthquakes without damage, resist moderate earthquakes without structural damage, and resist major earthquakes of the intensity or severity of the strongest experienced in California without collapse.

##### City of Gilroy

**Policy 25.10** Roads, Bridges, and Utility Lines. Ensure that the design and engineering of new roads, bridges and utility lines (public and private) that cross active or potentially active fault traces, streams, or other areas of high seismic risk respond to the potential hazards posed by movement or ground failure along these corridors. Equip water, gas, and electric lines with shut-off devices which utilize the best technology for quick shut-off consistent with providing reliable service. Also, ensure that new water storage tanks are constructed and

anchored to prevent toppling and displacement during periods of strong seismic activity

#### County of Santa Clara Geologic Ordinance

The County's policies and standards pertaining to geologic hazards and associated investigation and mitigation standards are contained in Title C, Division C12, Chapter IV of the County of Santa Clara Ordinance Code. The geologic ordinance contains minimum requirements for geologic evaluation of proposed land uses in areas identified in the County Geologic Hazard Zones map.

#### **4.7.1.2      *Existing Conditions***

The project area is located within the Coast Ranges geomorphic province. This province consists of northwest trending mountain ranges and valleys that extend from southern California to Oregon. The bedrock within the Coast Ranges consists of a belt of sedimentary, volcanic and metamorphic rocks that have been deformed by stresses concentrated along the San Andreas fault zone. Valleys within the Coast Ranges are filled with Holocene age alluvium and older sedimentary deposits. The property is contained on the USGS "Gilroy" 7.5 minute topographic quadrangle.

### **Topography and Soils**

Topography along the alignment is essentially flat lying, with a gentle downslope from north to south. Elevation at the north end of the project is about 269 feet and at the south end about 186 feet. Soils on-site can generally be describes as alluvium with localized fill. Expansive near-surface soil is subject to volume changes during seasonal fluctuations in moisture content, which may cause movement and cracking of foundations, pavements, slabs, and below-grade walls. The project site is underlain by soils that have a low- to moderate-expansion potential. There are no unique geological features on or adjacent to the project site and the topography of the project area is relatively flat.

### **Seismicity**

The San Francisco Bay Area is one of the most seismically active regions in the United States. An earthquake of moderate to high magnitude generated within the San Francisco Bay region could cause considerable ground shaking at the project site. The degree of shaking is dependent on the magnitude of the event, the distance to its zone of rupture and local geologic conditions.

The two major faults near the project alignments are the San Andreas Fault and the Calaveras Fault, located approximately nine miles west and five miles east of the project site, respectively. The project alignment is not located within an Alquist-Priolo Earthquake Fault Zone.<sup>24</sup>

### **Liquefaction**

Soil liquefaction is a condition where saturated granular soils near the ground surface undergo a substantial loss of strength during a seismic event. Loose, water-saturated soils are transformed from

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<sup>24</sup> Santa Clara County. "Santa Clara County Planning Office Featured Mapping Applications – Geologic Hazard Zones." Accessed August 24, 2019. Available at: <https://sccplanning.maps.arcgis.com/home/index.html>.



a solid to a liquid state during ground shaking. Soils most susceptible to liquefaction are loose, uniformly saturated, fine-grained sands that lie close to the ground surface.

The project alignment sections near the intersection of Highland Avenue and Harding Avenue and from E. 7<sup>th</sup> Street to Renz Lane are located within a liquefaction hazard zone. The remainder of the project alignment is not within a liquefaction hazard zone.

### Differential Settlement

Differential settlement is the unequal settlement of material that results in gradual, uneven downward movement, which can damage improvements. Differential settlement can be induced by liquefaction or the presence of undocumented fill.

### Lateral Spreading

Lateral spreading is a type of ground failure related to liquefaction. It consists of the lateral movement of saturated soil deposits towards an open face. The open banks of the Miller Slough are adjacent to the project alignment as it crosses on Chestnut Avenue. Where the project alignment crosses Miller Slough and West Branch Llagas Creek, the banks of these waterbodies are hardened and channelized.

#### 4.7.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
– Rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault (refer to Division of Mines and Geology Special Publication 42)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
– Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
– Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
– Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Result in substantial soil erosion or the loss of topsoil?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
3) Be located on a geologic unit or soil that is unstable, or that will become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
4) Be located on expansive soil, as defined in the current California Building Code, creating substantial direct or indirect risks to life or property?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
5) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
6) Directly or indirectly destroy a unique paleontological resource or site or unique geological feature?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

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**Impact GEO-1:** The project would not directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving rupture of a known earthquake fault, as delineated on the most recent Alquist-Priolo Earthquake Fault Zoning Map issued by the State Geologist for the area or based on other substantial evidence of a known fault; strong seismic ground shaking; seismic-related ground failure, including liquefaction; or landslides. **(No Impact)**

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The proposed project would install underground sewer pipeline to accommodate City of Morgan Hill's planned growth. As discussed in *Section 4.7.1.2*, the project area is relatively flat with no existing slope instability or landslide-related hazard. The project area is located in a seismically-active region and as such, would likely be subject to strong to very strong earthquake-induced ground shaking during the lifetime of the proposed project. While there are no known active faults in the project area, ground shaking from regional fault rupture could damage the proposed project. The project's utility upgrades would not, however, exacerbate the rupture of a known earthquake fault, strong seismic ground shaking, seismic-related ground failure, or landslides. As such, there would be no CEQA impact. **(No Impact)**

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**Impact GEO-2:** The project would not result in substantial erosion or the loss of topsoil. **(Less than Significant Impact)**

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The immediate and surrounding project area is relatively flat, and there is no existing slope instability, erosion, or landslide related hazards. The project's utility upgrades would not exacerbate substantial soil erosion or the loss of topsoil. Project construction activities, however, would expose soil to the erosive forces of wind and water. As discussed in *Section 4.10, Hydrology and Water Quality*, measures are included in the proposed project to reduce erosion and associated impacts to water quality to a less than significant level. **(Less Than Significant Impact)**

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**Impact GEO-3:** The project would not 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. **(No Impact)**

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Excavations, such as those for the installation of the proposed sewer pipeline, may require shoring to limit slope instability in the temporary excavations. The proposed mains will be installed in conformance with City of Morgan Hill and City of Gilroy's Department of Public Works requirements for proper safety and engineering practice.

The immediate and surrounding project area is relatively flat, and there is no existing slope instability, erosion, or landslide related hazards. One segment of the project area is mapped within a Santa Clara County Liquefaction Hazard Zone and may sustain damage from ground shaking. The project's utility upgrades, however, would not exacerbate on- or off-site landslide, lateral spreading, subsidence, liquefaction or collapse. As such, there would be no CEQA impact. **(No Impact)**

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**Impact GEO-4:** The project would not be located on expansive soil, as defined in the current California Building Code, creating substantial direct or indirect risks to life or property. **(Less than Significant Impact)**

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The project area contains soils that have the potential for expansion, which could damage the proposed sewer pipeline. The proposed project would not, however, exacerbate the hazards of the existing expansive soils on-site, thus, the project would not result in geology and soil impacts as defined in CEQA. City of Morgan Hill Standard Conditions of Approval would be incorporated into the project to address the effects of existing expansive soils on the proposed project. **(Less than Significant Impact)**

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**Impact GEO-5:** The project would not have soils incapable of adequately supporting the use of septic tanks or alternative waste water disposal systems where sewers are not available for the disposal of waste water. **(No Impact)**

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The proposed project would install underground sewer pipeline to accommodate City of Morgan Hill's planned growth. Septic tanks or alternative wastewater disposal systems are not proposed by the project. Therefore, this threshold is not applicable. **(No Impact)**

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**Impact GEO-6:** The project would not directly or indirectly destroy a unique paleontological resource or site or unique geological feature. **(Less than Significant Impact)**

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There are no known unique paleontological resources or sites, or unique geologic features present within or adjacent to the area of the proposed sewer pipeline. All project-related construction activities would occur within areas of non-native fill (i.e., within existing utility corridors and easements) and/or previously disturbed areas (e.g., the existing paved ROW of Monterey Road). Therefore, the potential for intact paleontological resources to be present in the areas of the proposed sewer pipeline is low. However, the possibility of paleontological resources being uncovered during

project construction cannot be entirely dismissed. The following measures shall be incorporated to ensure potential impacts to paleontological resources are avoided:

### **Conditions of Approval**

- Discovery of Paleontological Resources. In the event that a fossil is discovered during construction of the project, excavations within 50 feet of the find shall be temporarily halted or delayed until the discovery is examined by a qualified paleontologist, in accordance with Society of Vertebrate Paleontology standards. The City shall include a standard inadvertent discovery clause in every construction contract to inform contractors of this requirement. If the find is determined to be significant and if avoidance is not feasible, the paleontologist shall design and carry out a data recovery plan consistent with the Society of Vertebrate Paleontology standards. **(Less Than Significant Impact)**

## **4.8 GREENHOUSE GAS EMISSIONS**

### **4.8.1 Environmental Setting**

#### **4.8.1.1 *Regulatory Framework***

##### **State**

##### **Assembly Bill 32**

Under the California Global Warming Solutions Act, also known as AB 32, CARB established a statewide GHG emissions cap for 2020, adopted mandatory reporting rules for significant sources of GHGs, and adopted a comprehensive plan, known as the Climate Change Scoping Plan, identifying how emission reductions would be achieved from significant GHG sources. The GHG reduction goals of AB 32 were guided by Executive Order S-3-05, which was signed in 2005 and set reduction targets for 2010, 2020, and 2050. Executive Order S-3-05 sets a long-term GHG reduction goal of 80 percent below 1990 levels by 2050.

In 2016, SB 32 was signed into law, amending the California Global Warming Solution Act. SB 32, and accompanying Executive Order B-30-15, require CARB to ensure that statewide GHG emissions are reduced to 40 percent below the 1990 level by 2030. CARB updated its Climate Change Scoping Plan in December of 2017 to express the 2030 statewide target in terms of million metric tons of CO<sub>2</sub>E (MMTCO<sub>2</sub>e). Based on the emissions reductions directed by SB 32, the annual 2030 statewide target emissions level for California is 260 MMTCO<sub>2</sub>e.

##### **Senate Bill 375**

SB 375, known as the Sustainable Communities Strategy and Climate Protection Act, was signed into law in September 2008. SB 375 builds upon AB 32 by requiring CARB to develop regional GHG reduction targets for automobile and light truck sectors for 2020 and 2035. The per-capita GHG emissions reduction targets for passenger vehicles in the San Francisco Bay Area include a seven percent reduction by 2020 and a 15 percent reduction by 2035.

Consistent with the requirements of SB 375, the Metropolitan Transportation Commission (MTC) partnered with the Association of Bay Area Governments (ABAG), BAAQMD, and the Bay Conservation and Development Commission to prepare the region's Sustainable Communities Strategy (SCS) as part of the Regional Transportation Plan process. The SCS is referred to as Plan Bay Area 2040.

##### **Regional and Local**

##### **2017 Clean Air Plan**

To protect the climate, the 2017 CAP (prepared by BAAQMD) includes control measures designed to reduce emissions of methane and other super-GHGs that are potent climate pollutants in the near-term, and to decrease emissions of carbon dioxide by reducing fossil fuel combustion.

## CEQA Air Quality Guidelines

The BAAQMD CEQA Air Quality Guidelines are intended to serve as a guide for those who prepare or evaluate air quality impact analyses for projects and plans in the San Francisco Bay Area. The jurisdictions in the San Francisco Bay Area Air Basin utilize the thresholds and methodology for assessing GHG impacts developed by BAAQMD within the CEQA Air Quality Guidelines. The guidelines include information on legal requirements, BAAQMD rules, methods of analyzing impacts, and recommended mitigation measures.

### City of Morgan Hill 2035 General Plan

The following GHG goal and policy is applicable to the proposed project:

*Goal NRE-15: An adaptive and resilient community that responds to climate change.*

*Policy NRE-15.1: **Greenhouse Gas Emission Reduction Targets.** Maintain a greenhouse gas reduction trajectory that is consistent with the greenhouse gas reduction targets of Executive Orders B-30-15 (40 percent below 1990 levels by 2030) and S-03-05 (80 percent below 1990 levels by 2050) to ensure the City is consistent with statewide efforts to reduce greenhouse gas emissions.*

#### **4.8.1.2 Existing Conditions**

The project alignment location is within existing right-of-way for the cities of Morgan Hill, Gilroy, and County of Santa Clara.

#### **4.8.2 Impact Discussion**

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Generate greenhouse gas (GHG) emissions, either directly or indirectly, that may have a significant impact on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) Conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of GHGs?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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**Impact GHG-1:** The project would not generate GHG emissions, either directly or indirectly, that may have a significant impact on the environment. **(Less than Significant Impact)**

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The proposed project would install underground sewer pipeline to accommodate existing and planned development within the City of Morgan Hill, accounted for in the City's General Plan and Greenhouse Gas Reduction Strategy.



GHG emissions would be generated during construction activities on the site, including trenching, grading, and paving. Construction equipment and trucks using diesel and other fuels would be the primary source of GHG emissions. These emissions would be temporary, and would not represent an on-going source of GHG emissions in the area. After project completion, maintenance activities and operation of the sewer main will not generate substantial new GHG emissions from maintenance or operation as there are no pumps/lift stations. **(Less Than Significant Impact)**

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**Impact GHG-2:** The project would not conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of GHGs. **(No Impact)**

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The proposed project would install underground sewer main infrastructure to accommodate existing and planned development in the City of Morgan Hill. Therefore, the project would not conflict with the *City of Morgan Hill 2035 General Plan* and *Greenhouse Gas Reduction Program* policies or assumptions related to greenhouse gas emissions. For these reasons, the project would not conflict with an applicable plan, policy or regulation adopted for the purpose of reducing the emissions of greenhouse gases. **(No Impact)**

## **4.9 HAZARDS AND HAZARDOUS MATERIALS**

The following discussion is based, in part, on an Environmental Summary Letter prepared by *Cornerstone Earth Group, Inc.* in August 2019. A copy of the report is attached to this Initial Study as Appendix D.

### **4.9.1 Environmental Setting**

#### **4.9.1.1 *Regulatory Framework***

##### **Federal and State**

##### Hazardous Materials Overview

The storage, use, generation, transport, and disposal of hazardous materials and waste are highly regulated under federal and state laws. Key federal regulations and policies related to development include the Comprehensive Environmental Response, Compensation, and Liability Act (CERCLA), commonly known as Superfund, and the Resource Conservation and Recovery Act (RCRA). In California, the US EPA has granted most enforcement authority over federal hazardous materials regulations to the California Environmental Protection Agency (CalEPA). In turn, local agencies including the Santa Clara County Department of Environmental Health (SCCDEH) have been granted responsibility for implementation and enforcement of many hazardous materials regulations under the Certified Unified Program Agency (CUPA) program.

Other regional agencies are responsible for programs regulating emissions to the air, surface water, and groundwater include the Bay Area Air Quality Management District (BAAQMD), which has oversight over air emissions, and the Regional Water Quality Control Board (RWQCB) which regulates discharges and releases to surface waters and groundwater.

Oversight over investigation and remediation of sites impacted by hazardous materials releases can be completed by state agencies, such as the Department of Toxic Substances Control [(DTSC) a division of CalEPA)], regional agencies, such as the RWQCB, or local agencies, such as SCCDEH. Other agencies that regulate hazardous materials include the California Department of Transportation and California Highway Patrol (transportation safety), and California Occupational Safety and Health Administration (Cal/OSHA).

##### Cortese List (Government Code Section 65962.5)

Section 65962.5 of the Government Code requires CalEPA) to develop and update a list of hazardous waste and substances sites, known as the Cortese List. The Cortese List is used by the State, local agencies, and developers to comply with CEQA requirements. The Cortese List includes hazardous substance release sites identified by DTSC, State Water Resources Control Board (SWRCB), and the Department of Resources Recycling and Recovery (CalRecycle).

##### California Accidental Release Prevention Program (CalARP)

The California Accidental Release Prevention (CalARP) Program aims to prevent accidental releases of regulated hazardous materials that represent a potential hazard beyond the boundaries of property. Facilities that are required to participate in the CalARP program use or store specified quantities of

toxic and flammable substances (hazardous materials) that can have off-site consequences if accidentally released. The City of Gilroy Hazardous Materials Ordinance (HMSO) predates the Certified Unified Program Agency (CUPA) that typically reviews risk management plans prepared for projects. The HMSO provides the local authority to regulate hazardous materials and to carry out the CUPA programs.

### **Local**

#### City of Morgan Hill 2035 General Plan

##### *Policy SSI-4.11*

Monitor the transportation of hazardous materials and wastes to reduce risks and ensure notification of South County jurisdictions in the event of a leak or spill.

#### County of Santa Clara Emergency Operations Plan

The County of Santa Clara adopted its Emergency Operations Plan (EOP) in January 2017. The EOP establishes the overall operational concepts associated with the management of incidents, emergencies, crises, disasters, and catastrophes at the County level. It is applicable to a wide variety of anticipated incident events including earthquake, wildland fires, floods, and public health issues and facilitates multiagency and multi-jurisdictional coordination during emergency operations. There are a number of separately published annexes that support this EOP. These supporting annexes further describe the operational or functional response to particular threats and hazards and the basic considerations, actions, and responsibilities of specific emergency response and management disciplines or functions.

#### **4.9.1.2 Existing Conditions**

The project involves constructing approximately 6.6 miles of 36-inch diameter sewer relief trunk pipeline that would extend from the intersection of Harding Avenue and Highland Avenue in San Martin, southeast to the previously constructed City of Gilroy segment of the sewer relief trunk located on Renz Lane in Gilroy. The pipeline traverses property within the City of Gilroy and unincorporated areas of Santa Clara County. The majority of the new sewer relief trunk would be installed within existing paved road right-of-way via open trench construction while portions of the alignment in areas that intersect with Miller Slough, West Branch Llagas Creek, Union Pacific Railroad (UPRR) tracks, and Caltrans crossings (SR 152 and US 101) would be installed via trenchless construction methods (i.e., microtunneling or guided-auger-boring).

### **Site History**

A land history of the alignment was compiled based on historical aerial photographs dated between 1954 and 2014 obtained from Environmental Data Resources (EDR) of Shelton, Connecticut.

Based on a review of these sources, the general site vicinity consisted mainly of agricultural land (orchards and row crops) with widely spaced residences. A greater density of development (mainly residences) is found in the vicinity of the southern portion of the planned sewer alignment in the City of Gilroy. Between the 1950s and the present, a gradual increase in both commercial and residential development was seen along the planned sewer alignment.

Portions of the planned sewer alignment traverse properties that were occupied by orchards or row crops prior to construction of the existing roadways. Most other portions of the alignment follow roadways that were historically bordered by orchards or row crops.

### **Existing and Surrounding Area Uses**

The project alignment location is within existing right of ways and utility easements. The project alignment is adjacent to commercial and residential lands, and current and historically agricultural lands.

### **On-Site Sources of Contamination**

Portions of the area within the project alignment, primarily those lands in Morgan Hill and San Martin, were historically used for agricultural production. Pesticides may have been applied to crops in the normal course of farming operations; therefore, residual pesticide concentrations may remain in soil within the alignment.

### **Off-Site Sources of Contamination**

Based on the information presented in the agency database report and a cursory review of reports obtained from the Geotracker and Envirostor databases, no nearby spill incidents were reported that appear likely to significantly impact soil or ground water beneath the site.

### **Airports**

The San Martin Airport is approximately 0.5 miles to the east of the project alignment at Highland Avenue and Monterey Road. The northern portion of the project alignment is located within the San Martin Airport Traffic Pattern Safety Zone.<sup>25</sup> The Traffic Pattern Zone is the portion of the airport area routinely overflown by aircraft operating in the airport traffic pattern. The potential for aircraft accidents is relatively low and the need for land use restrictions is minimal.

### **Emergency Response Plan**

The project alignment is not specifically identified in the City of Morgan Hill's Emergency Operation Plan, the City of Gilroy's Emergency Operations Plan, or the County of Santa Clara Emergency Operations Plan.

### **Wildland Fires**

The project alignment is not located within a fire hazard zone.<sup>26</sup>

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<sup>25</sup> Santa Clara County. *South County Airport Comprehensive Land Use Plan*. November 2008.

<sup>26</sup> Cal Fire. *Fire Hazard Severity Zones in SRA*. November 6, 2007.

## 4.9.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) 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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3) Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4) 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, will it create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5) 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, result in a safety hazard or excessive noise for people residing or working in the project area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
6) Impair implementation of, or physically interfere with, an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
7) Expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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**Impact HAZ-1:** The project would not create a significant hazard to the public or the environment through routine transport, use, or disposal of hazardous materials. **(Less than Significant Impact)**

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Construction of the proposed project would involve the use of potentially hazardous materials, including vehicle fuels, oils, and fluids. All hazardous materials would be transported, contained, stored, used, and disposed of in accordance with manufacturers' instructions and would be handled in compliance with all applicable standards and regulations. Construction-related hazardous materials use would be temporary, and does not constitute routine transport, use, or disposal.

Operation of the sewer pipelines is not anticipated to routinely transport, use, or dispose of hazardous materials. Compliance with applicable federal, state, and local laws and regulations pertaining to the handling, storage, and disposal of hazardous materials would ensure that no significant hazards to the public or the environment result from the project's minimal use of hazardous materials. For these reasons, impacts related to the creation of a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials would be less than significant. **(Less than Significant Impact)**

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**Impact HAZ-2:** The project would not 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. **(Less than Significant Impact with Mitigation Incorporated)**

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Portions of the planned sewer alignment were previously used for agricultural purposes (prior to construction of the existing roadways) and most of the remaining portions of the alignment follow roadways that have historically been bordered by agricultural properties. Pesticides may have been applied to crops in the normal course of farming operations. Residual concentrations of agricultural chemicals may remain in on-site soil, such as organochlorine pesticides and pesticide-related metals (i.e., arsenic, lead and mercury).

The planned sewer alignment crosses the UPRR tracks near the intersection of Monterey Highway and Las Animas Avenue. Assorted chemicals historically were commonly used for dust suppression and weed control along rail lines. Common contaminants along railroad lines include metals, petroleum hydrocarbons, pesticides and polycyclic aromatic hydrocarbons (PAHs). The following mitigation measures are included in the project to reduce construction worker and surrounding residents and employees exposure to hazardous materials contamination:

**Mitigation Measures:** The following measures shall be implemented during site clearing and grading to reduce exposure to residual concentrations of agricultural chemicals:

**MM HAZ-2.1:** Prior to construction activities, the project contractor(s) shall implement a Site Management Plan (SMP) and Health and Safety Plan (HSP) for the proposed sewer construction activities, that establishes management practices for handling contaminated soil, soil vapor, groundwater or other materials during construction. The SMP shall be prepared by an Environmental Professional and shall be submitted to the County Department of Environmental Health (DEH) for review and approval prior to the start of construction. The approved SMP shall also be provided to the City of Morgan Hill prior to ground disturbance.

**MM HAZ-2.2:** Soil materials removed from the site shall be characterized and disposed of according to the California Hazardous Waste Regulations. Contaminated soil that exceeds regulatory thresholds shall be handled by trained personnel using appropriate protective equipment and engineering and dust controls, in accordance with local, state and federal laws. Any contaminated soils that are



removed from the site shall be disposed of at a licensed hazardous materials disposal site.

**MM HAZ 2.3:** If groundwater dewatering is to be conducted, a Dewatering Plan shall be prepared documenting the dewatering method, groundwater sampling and analyses, groundwater treatment (if required), permitting requirements, and discharge location. This plan shall be submitted to the EPA for review and approval prior to construction.

With implementation of MM HAZ-2.1 through MM HAZ-2.3, significant hazards to the public or environment would be reduced to a less than significant level. **(Less Than Significant with Mitigation Incorporated)**

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**Impact HAZ-3:** The project would not emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school. **(Less than Significant Impact with Mitigation Incorporated)**

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The proposed project is located within unincorporated areas of Santa Clara County and a highly urbanized area of City of Gilroy and there are a number of schools surrounding the project alignment:

- Eliot Elementary School, adjacent to the 7<sup>th</sup> Street segment of the project alignment at 475 Old Gilroy St, in Gilroy.
- South Valley Middle School adjacent to the project alignment at 385 Ioof Ave, in Gilroy.
- Rucker Elementary School, approximately 0.25 miles from the project alignment at 325 Santa Clara Ave, in Gilroy.

Construction of the proposed project would involve the use of relatively small amounts of commonly used hazardous substances, such as fossil fuels, lubricants, and solvents, within one quarter mile of existing schools. Accident prevention and containment are the responsibility of the construction contractors. All hazardous materials would be handled in accordance with federal, state, and local laws, which ensure the safe transport, use, storage, and disposal of hazardous materials. Spill response materials and spill kits would also be kept at the construction site. Operation of the sewer pipelines would not result in the emission of hazardous emissions or handling of hazardous or acutely hazardous materials, substances, or waste. However, due to the potential impacts discussed in Impact HAZ-2 and the proximity of the project area to the schools listed above, potential impacts to schools during construction could be significant. With implementation of mitigation measures listed above (MM HAZ-2.1 through MM HAZ-2.3), significant hazards to the public or environment would be reduced to a less than significant level. **(Less Than Significant with Mitigation Incorporated)**

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**Impact HAZ-4:** The project would not 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, create a significant hazard to the public or the environment. **(Less than Significant Impact with Mitigation Incorporated)**

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As discussed in *Section 4.9.1.2 Existing Conditions*, no hazardous material spill incidents have been reported in the site vicinity that would be likely to significantly impact soil or ground water quality at the site. However, as is typical to many developed areas, several facilities in the vicinity were reported as hazardous materials users. Additionally, several spill incidents, such as leaking underground storage tank (LUST) cases, were reported near the planned sewer alignment that were listed as closed cases; thus, suggesting that the potential for significant adverse impacts is low. As with any earthwork project, there is a potential that unexpected or previously unreported contamination could be encountered during construction activities. With implementation of mitigation measures listed above (MM HAZ-2.1 through MM HAZ-2.3), significant hazards to the public or environment would be reduced to a less than significant level. **(Less Than Significant with Mitigation Incorporated)**

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**Impact HAZ-5:** The project would not be 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. **(No Impact)**

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The northern portion of the project alignment is located within the San Martin Airport Traffic Pattern Safety Zone, however, since the project is the installation of an underground wastewater pipe and does not propose the construction of permanent structures, the project would not interfere with the airport. **(No Impact)**

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**Impact HAZ-6:** The project would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan. **(Less than Significant Impact)**

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During construction, certain sections of the road would be temporarily impacted and may result in temporary traffic detours. While detours may be in place, emergency personnel would always have access throughout the project alignment. The proposed project would therefore, not substantially interfere with emergency response plans or emergency evacuation plans within the project area. **(Less Than Significant Impact)**

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**Impact HAZ-7:** The project would not expose people or structures, either directly or indirectly, to a significant risk of loss, injury or death involving wildland fires. **(No Impact)**

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According to CAL FIRE, the project alignment is not located within an area subject to wildfires. Implementation of the proposed project would not, therefore, expose people to natural hazards from wildfire risk. **(No Impact)**

## **4.10 HYDROLOGY AND WATER QUALITY**

### **4.10.1 Environmental Setting**

#### **4.10.1.1 *Regulatory Framework***

##### **Federal, State and Regional**

The Federal Clean Water Act and California's Porter-Cologne Water Quality Control Act are the primary laws related to water quality. Regulations set forth by the U.S. Environmental Protection Agency (EPA) and the State Water Resources Control Board (SWRCB) have been developed to fulfill the requirements of this legislation. EPA's regulations include the NPDES permit program, which controls sources that discharge pollutants into the waters of the United States (e.g., streams, lakes, bays, etc.). These regulations are implemented at the regional level by the water quality control boards, which for the southern Santa Clara County area is the Central Coast Regional Water Quality Control Board (RWQCB).

##### **Statewide Construction General Permit**

The SWRCB has implemented a NPDES General Construction Permit for the State of California. For projects disturbing one acre or more of soil, a Notice of Intent (NOI) and Storm Water Pollution Prevention Plan (SWPPP) must be prepared by a qualified professional prior to commencement of construction. The Construction General Permit includes requirements for training, inspections, record keeping, and for projects of certain risk levels, monitoring. The general purpose of the requirements are to minimize the discharge of pollutants and to protect beneficial uses and receiving waters from the adverse effects of construction-related storm water discharges.

##### **NPDES Municipal Stormwater Permit**

The EPA has delegated management of NPDES requirements for municipal urban runoff discharges in California to the SWRCB and the nine RWQCB's. The cities of Morgan Hill and Gilroy are designated as smaller municipal separate storm sewer systems (small MS4s) serving less than 100,000 people. Morgan Hill and Gilroy have prepared and adopted a Storm Water Management Plan (SWMP) for their respective cities, and have been issued the NPDES Small MS4s General Permit by the Central Coast Regional Water Quality Control Board (CCRWQCB) [Water Quality Order Number 2013-0001-DWQ]. Each city's SWMP outlines a comprehensive five year plan to establish Best Management Practices (BMPs) through six Minimum Control Measures (MCMs) to help reduce the discharge of pollutants into waterways and to protect local water quality caused by stormwater and urban run-off within the corporate limits of each city.

Projects resulting in the addition and/or replacement of 5,000 sf of impervious surfaces are required to comply with the City's NPDES Small MS4s General Permit and implement a project specific SWMP. BMPs shall be designed in accordance with engineering criteria in the *California Stormwater BMP Handbook for New and Redevelopment* or other accepted guidance.

## Impaired Surface Water Bodies

Under Section 303(d) of the 1972 Clean Water Act, states are required to identify impaired surface water bodies and develop total maximum daily loads (TMDLs) for contaminants of concern.<sup>27</sup> The TMDL is the quantity of pollutant that can be safely assimilated by a water body without violating water quality standards. Listing of a water body as impaired does not necessarily suggest that the water body cannot support the beneficial uses; rather, the intent is to identify the water body as requiring future development of a TMDL to maintain water quality and reduce the potential for future water quality degradation. The project site is within the Llagas Creek watershed. The Llagas Creek watershed is listed by the U.S. Environmental Protection Agency as an impaired water body for chloride, fecal coliform, low dissolved oxygen, pH, sodium, and total dissolved solids.<sup>28</sup>

## Santa Clara Valley Water District

The Santa Clara Valley Water District (Valley Water) operates as the flood control agency for the County. Its stewardship also includes creek restoration, pollution prevention efforts, and groundwater recharge. Valley Water requires permits for all well construction and abandonment/destruction work, most exploratory boring for groundwater exploration.

Valley Water, along with 15 cities, the County of Santa Clara, and business, agriculture, streamside property owners and other environmental interest groups formed the Water Resources Protection Collaborative in 2002 for the purpose of clarifying and streamlining local permitting for streamside activities. In 2007, the Collaborative adopted a guidebook entitled Guidelines and Standards for Land Use Near Streams: A Manual of Tools, Standards, and Procedures to Protect Streams and Streamside Resource in Santa Clara County, and replaced its existing streamside protection ordinance (Ordinance 83-2) with the Water Resources Protection Ordinance. The manual provides a framework for evaluating permit applications and establishing permit conditions.

### **4.10.1.2      *Existing Conditions***

#### **Drainage and Flooding**

The project alignment is approximately 6.6-miles long and located on Highland Avenue, Monterey Road, Las Animas Avenue, Murray Avenue, Chestnut Avenue, E. 7<sup>th</sup> Street, and Renz Lane. The project alignment consists of impervious surfaces (i.e. roads), and pervious surfaces (i.e. gravel, dirt, and waterbodies). Miller Slough and West Branch Llagas Creek traverse the project alignment.

The majority of the project alignment through unincorporated Santa Clara County and City of Gilroy is located within lands designated Zone X<sup>29,30</sup> except for a small portion of the alignment on Highland Avenue that is located within the 100 year flood zone. Lands within Zone X are outside of the 500-year floodplain and determined to be outside the one percent and 0.2 percent annual chance floodplain.

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<sup>27</sup> California State Water Resources Control Board. Total Maximum Daily Load Program. Accessed September 28, 2019. [http://www.swrcb.ca.gov/water\\_issues/programs/tmdl/303d\\_lists2006\\_approved.shtml](http://www.swrcb.ca.gov/water_issues/programs/tmdl/303d_lists2006_approved.shtml).

<sup>28</sup> U.S. EPA. *California 303(d) Listed Waters for Reporting Year 2010*. October 2011. Accessed November 2019. [http://www.waterboards.ca.gov/water\\_issues/programs/tmdl/2010state\\_ir\\_reports/category5\\_report.shtml](http://www.waterboards.ca.gov/water_issues/programs/tmdl/2010state_ir_reports/category5_report.shtml).

<sup>29</sup> Federal Emergency Management Agency. *Flood Insurance Rate Map*. Community Panel No. 06085C0637H.

<sup>30</sup> Federal Emergency Management Agency. *Flood Insurance Rate Map*. Community Panel No. 06085C0639H.

## Water Quality

The water quality of ponds creeks, streams, and other surface water-bodies can be greatly affected by pollution carried in contaminated surface runoff. Pollutants from unidentified sources, known as “non-point” source pollutants, are washed from streets, construction sites, parking lots, and other exposed surfaces into storm drains. Stormwater runoff often contains contaminant such as oil and grease, plant and animal debris (e.g., leaves, dust, and animal feces), pesticides, litter, and heavy metals. In sufficient concentration, these pollutants have been found to adversely affect the aquatic habitats to which they drain.

## Groundwater

Groundwater beneath the project alignment was encountered between depths of 25 to 35 feet below ground surface (bgs), with high average groundwater level as shallow as roughly 13 to 15 feet bgs. The project site is situated over the Llagas Groundwater Subbasin which drains to the south toward the Pajaro River and eventually Monterey Bay.<sup>31</sup>

### 4.10.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3) 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:	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
– result in substantial erosion or siltation on- or off-site;	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
– substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site;	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

<sup>31</sup> Santa Clara Valley Water District. 2016 Groundwater Management Plan. November 2016.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
– 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	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
– impede or redirect flood flows?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
4) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
5) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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**Impact HYD-1:** The project would not violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or ground water quality. **(Less than Significant Impact)**

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### Construction

Construction activities temporarily increase the amount of debris on-site and grading activities, which could increase pollutant loads of eroded material in stormwater runoff. The project will be required to implement standard measures listed below as a standard condition prior to issuance of a grading permit. Conformance with the measures in the erosion control plan would reduce the potential for substantial adverse impacts to water quality during construction.

#### Conditions of Approval

- In accordance with the City of Morgan Hill and Gilroy's Standard Conditions of Approval and the General National Pollutant Discharge Elimination System Storm Water Permit for Construction Activities, the project would prepare a Storm Water Pollution Prevention Plan (SWPPP) and an Erosion Control Plan (ECP). The plans will be submitted to the Director of Public Works and Central Coast Regional Water Quality Control Board for review and approval, prior to issuance of a grading permit. The ECP and SWPPP would demonstrate how the project would eliminate or reduce non-stormwater discharges into the stormwater system, how discharges into the stormwater system would be monitored, and what Best Management Practices (BMPs) would be implemented by the project to avoid water quality impacts during construction (e.g., street sweeping, fiber rolls, temporary cover and/or permanent cover) and post-construction periods. **(Less than Significant Impact)**

### Post Construction

Development of the proposed project would not increase the amount of impervious surfaces since the project would be constructed under existing right-of-way. Runoff from these existing surfaces flows



towards on-street stormwater drains or slopes towards unpaved surfaces adjacent to the roads. The project, therefore, would not result in operational water quality impacts. **(Less Than Significant Impact)**

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**Impact HYD-2:** 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. **(Less than Significant Impact with Mitigation Incorporated)**

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Installation of the sewer pipeline through open-cut construction techniques would involve construction at depths up approximately five (5)-19 feet bgs, except at the five proposed trenchless under-crossings where deeper excavations in the order of 20 to 30 feet may be required for construction of the boring and receiving pits. As stated previously, groundwater in the project alignment is approximately 25 to 35 feet bgs, with high average groundwater level as shallow as roughly 13 to 15 feet bgs. Therefore, it is anticipated that groundwater may be encountered during site construction. If groundwater is found during project construction, dewatering of groundwater would be conducted in compliance with the CCRWQCB requirements so that it does not cause localized flooding or impair off-site water quality. With adherence to the CCRWQCB requirements and MM HAZ 2.3, the project would not substantially deplete groundwater supplies. **(Less Than Significant Impact with Mitigation Incorporated)**

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**Impact HYD-3:** The project would not 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; substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site; 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 impede or redirect flood flows. **(Less than Significant Impact)**

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Since the project would not result in an increase in impervious surfaces, the project site would not increase surface runoff within the project area. The new sewer pipeline would be installed completely underground and below all nearby waterways. As a result, no existing drainages or waterways would be altered by the proposed project, and no additional erosion or surface runoff would occur on- or off-site. Stormwater on the project site would be directing into existing stormwater drains or would flow downslope towards unpaved areas. Therefore, the proposed project would not substantially alter the existing drainage pattern of the site or area **(Less Than Significant Impact)**

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**Impact HYD-4:** The project would not risk release of pollutants due to project inundation in flood hazard, tsunami, or seiche zones. **(No Impact)**

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As described previously, the project does not propose the construction of housing and therefore, would not expose people to flood hazards associated with the 100-year flood. **(No Impact)**

The project site is not subject to inundation by seiche or tsunami. **(No Impact)**

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**Impact HYD-5:** The project would not conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan. **(Less than Significant Impact with Mitigation Incorporated)**

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The project would comply with the City's Stormwater Management Guidance Manual for Low Impact Development and Post-Construction Requirements. The SCVWD prepared a Groundwater Management Plan (GMP) for the Santa Clara Plain and Llagas subbasins in 2016, describing its comprehensive groundwater management framework including objectives and strategies, programs and activities to support those objectives, and outcome measures to gauge performance. The GMP is the guiding document for how the SCVWD will ensure groundwater basins within its jurisdiction are managed sustainably. The project site is not located within, or adjacent to, a SCVWD groundwater recharge pond or facility.<sup>32</sup>

As discussed above in Impact HAZ-2, It is anticipated that groundwater may be encountered during site construction. If groundwater is found during project construction, dewatering of groundwater would be conducted in compliance with the CCRWQCB requirements so that it does not cause localized flooding or impair off-site water quality. With adherence to the CCRWQCB requirements and MM HAZ 2.3, the project would not substantially deplete groundwater supplies. **(Less Than Significant Impact with Mitigation Incorporated).**

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<sup>32</sup> SCVWD. 2016 *Groundwater Management Plan*. Figure 1-3. 2016.

## **4.11 LAND USE AND PLANNING**

### **4.11.1 Environmental Setting**

#### **4.11.1.1 *Regulatory Framework***

##### **Regional and Local**

##### **Santa Clara Valley Habitat Plan**

The Habitat Plan is a conservation program intended to promote the recovery of endangered species and enhance ecological diversity and function, while accommodating planned growth on approximately 500,000 acres of southern Santa Clara County. The northern portion of the project alignment within the San Martin area is designated Rural Development Not Covered. The southern section of the alignment in and around Gilroy is considered a covered activity under the Habitat Plan.

##### **Santa Clara County General Plan**

Policies in the County's General Plan have been adopted for the purpose of guiding land use and development in unincorporated Santa Clara County, and avoiding or mitigating impacts related to land use and planning, including the following.

Policy R-RC 5                      Public and private development projects shall be evaluated and conditioned to assure they are environmentally sound, do not degrade natural resources, and that all reasonable steps are taken to mitigate potentially adverse impacts.

##### **City of Morgan Hill General Plan**

Policy NRE-6.2                      Support the implementation of the Santa Clara Valley Habitat Plan to protect wildlife, rare and endangered plants and animals, and sensitive habitat from loss and destruction.

##### **City of Gilroy General Plan**

Policy 2.12                              SCRWA Exemption. Exempt expansions to the 20-Year Boundary to incorporate lands needed for the specific purpose of expanding the South County Regional Wastewater Authority (SCRWA) plant from the requirements of Policy 2.09.

#### **4.11.1.2 *Existing Conditions***

The project site is an approximately 6.6-mile linear alignment that is adjacent to commercial, residential, light industrial, and agricultural lands. Land uses within this area are Rural, Neighborhood Commercial, Planned Development, Recreation, and Urban Medium and Urban High Density Residential. Miller Slough and West Branch Llagas Creek intersect with the proposed alignment. An aerial photograph showing surrounding land uses is shown on Figure 2.0-3.

#### 4.11.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

---

**Impact LU-1:** The project would not physically divide an established community. **(No Impact)**

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In order to accommodate future population growth and development in Morgan Hill, the City of Morgan Hill is proposing to construct a new sewer relief trunk for additional wastewater flows. The project proposes to connect the existing joint trunk sewer at California Avenue and Monterey Highway in Morgan Hill to the South County Regional Wastewater Authority wastewater plant in Gilroy. The installation of underground sewer pipeline would not create a physical barrier that would divide an established community. **(No Impact)**

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**Impact LU-2:** The project would not 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. **(Less than Significant Impact)**

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#### **Applicable Land Use Plans and Policies**

The proposed project would extend an existing wastewater conveyance system to accommodate future population growth, and be constructed under existing right-of-way. The project would not result in a change to the existing land use or zoning designations for the project site and would not conflict with land uses or zoning in the project area. The project, therefore, would not conflict with applicable land use plans in the project area. **(No Impact)**

#### **Habitat Conservation Plan**

The northern portion of the project alignment within the San Martin area is designated Rural Development Not Covered. The southern section of the alignment in and around Gilroy is considered a covered activity under the Habitat Plan. A complete discussion of the Habitat Plan, including the land designations within and adjacent to the alignment is included in *Section 4.4 Biological Resources*. The project would comply with and participate in the Habitat Plan by paying applicable fees and implementing applicable conditions on covered activities. **(Less Than Significant Impact)**

## 4.12 MINERAL RESOURCES

### 4.12.1 Environmental Setting

#### 4.12.1.1 *Regulatory Framework*

#### State

##### Surface Mining and Reclamation Act

The Surface Mining and Reclamation Act (SMARA) was enacted by the California legislature in 1975 to address the need for a continuing supply of mineral resources, and to prevent or minimize the negative impacts of surface mining to public health, property, and the environment. As mandated under SMARA, the State Geologist has designated mineral land classifications in order to help identify and protect mineral resources in areas within the state subject to urban expansion or other irreversible land uses which would preclude mineral extraction. SMARA also allowed the State Mining and Geology Board (SMGB), after receiving classification information from the State Geologist, to designate lands containing mineral deposits of regional or statewide significance.

#### 4.12.1.2 *Existing Conditions*

The project alignment is within Gilroy and unincorporated lands of Santa Clara County. There are no known or designated mineral resources in the vicinity.

### 4.12.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Result in the loss of availability of a known mineral resource that will be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

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**Impact MIN-1:** The project would not result in the loss of availability of a known mineral resource that would be of value to the region and residents of the state. **(No Impact)**

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The project area is developed with agricultural, residential and commercial uses and does not contain known mineral resources. As such, the project would not result in the loss of availability of a known mineral resource that will be of value to the region and the residents of the state. **(No Impact)**

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**Impact MIN-2:** The project would not 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. **(No Impact)**

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See response to Impact MIN-1. **(No Impact)**

## 4.13 NOISE

### 4.13.1 Environmental Setting

#### Noise

Several factors influence sound as it is perceived by the human ear, including the actual level of sound, the period of exposure to the sound, the frequencies involved, and fluctuation in the noise level during exposure. Noise is measured on a “decibel” (dB) scale which serves as an index of loudness. Because the human ear cannot hear all pitches or frequencies, sound levels are frequently adjusted or weighted to correspond to human hearing. This adjusted unit is known as the “A-weighted” decibel or dBA. Further, sound is averaged over time and penalties are added to the average for noise that is generated during times that may be more disturbing to sensitive uses such as early morning or late evening.

Since excessive noise levels can adversely affect human activities (such as conversation and sleeping) and human health, federal, state, and local governmental agencies have set forth criteria or planning goals to minimize or avoid these effects. The noise guidelines are almost always expressed using one of several noise averaging methods such as  $L_{eq}$ , DNL, or CNEL.<sup>33</sup>

#### Vibration

Ground vibration consists of rapidly fluctuating motions or waves with an average motion of zero. Several different methods are typically used to quantify vibration amplitude. One method is the Peak Particle Velocity (PPV). The PPV is defined as the maximum instantaneous positive or negative peak of the vibration wave. In this report, a PPV descriptor with units of mm/sec or in/sec is used to evaluate construction generated vibration for building damage and human complaints.

The annoyance levels shown in Table 4.13-1 should be interpreted with care since vibration may be found to be annoying at much lower levels than those shown, depending on the level of activity or the sensitivity of the individual. To sensitive individuals, vibrations approaching the threshold of perception can be annoying. The rattling sound of windows, doors, or stacked dishes can give rise to exaggerated vibration complaints, even though there is very little risk of actual structural damage.

Construction activities can cause vibration that varies in intensity depending on several factors. The use of pile driving and vibratory compaction equipment typically generates the highest construction related ground-borne vibration levels. Because of the impulsive nature of such activities, the use of the PPV descriptor has been routinely used to measure and assess ground-borne vibration and almost exclusively to assess the potential of vibration to induce structural damage and the degree of annoyance for humans.

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<sup>33</sup>  $L_{eq}$  stands for the Noise Equivalent Level and is a measurement of the average energy level intensity of noise over a given period of time such as the noisiest hour. DNL stands for Day-Night Level and is a 24-hour average of noise levels, with 10 dB penalties applied to noise occurring between 10:00 PM and 7:00 AM. CNEL stands for Community Noise Equivalent Level; it is similar to the DNL except that there is an additional five (5) dB penalty applied to noise which occurs between 7:00 PM and 10:00 PM. Generally, where traffic noise predominates, the CNEL and DNL are typically within two (2) dBA of the peak-hour  $L_{eq}$ .



The two primary concerns with construction-induced vibration, the potential to damage a structure and the potential to interfere with the enjoyment of life, are evaluated against different vibration limits. Studies have shown that the threshold of perception for average persons is in the range of 0.008 to 0.012 in/sec PPV. Human perception to vibration varies with the individual and is a function of physical setting and the type of vibration. Persons exposed to elevated ambient vibration levels, such as people in an urban environment, may tolerate a higher vibration level.

Structural damage can be classified as cosmetic only, such as minor cracking of building elements, or may threaten the integrity of the building. Safe vibration limits that can be applied to assess the potential for damaging a structure vary by researcher and there is no general consensus as to what amount of vibration may pose a threat for structural damage to the building. Construction-induced vibration that can be detrimental to the building is very rare and has only been observed in instances where the structure is at a high state of disrepair and the construction activity occurs immediately adjacent to the structure.

<b>Table 4.13-1: Reaction of People and Damage to Buildings for Continuous Vibration Level</b>		
<b>Velocity Level, PPV (in/sec)</b>	<b>Human Reaction</b>	<b>Effect on Buildings</b>
0.02	Barely perceptible	Vibration unlikely to cause damage of any type to any structure
0.08	Distinctly perceptible	Recommended upper level of the vibration to which ruins and ancient monuments should be subjected
0.1	Strongly perceptible	Virtually no risk of damage to normal buildings
0.3	Strongly perceptible to severe	Threshold at which there is a risk of damage to older residential dwellings such as plastered walls or ceilings
0.5	Severe - Vibrations considered unpleasant	Threshold at which there is a risk of damage to newer residential structures
Source: Transportation- and Construction-Induced Vibration Guidance Manual, California Department of Transportation, June 2004.		

#### **4.13.1.1      *Regulatory Framework***

##### **City of Morgan Hill Municipal Code**

Chapter 8.28, Section 8.28.040 of the City of Morgan Hill Municipal Code states that construction activities are not permitted except within the hours of 7:00 AM and 8:00 PM on weekdays and 9:00 AM and 6:00 PM on Saturdays. No construction is permitted on Sundays or holidays. Public work projects are exempt from this section and the public works director shall determine the hours of construction for public works projects.

## City of Gilroy City Code

Gilroy City Code (GCC) Section 16.31 prohibits any loud noises that disturb any building or place regularly used for sleeping purposes in the City, between the hours of 10:00 PM and 7:00 AM of any day of the week. Section 16.38 of the GCC limits construction activities to between the hours of 7:00 AM and 7:00 PM, Monday through Friday, and between 9:00 AM and 7:00 PM on Saturday. Construction activities are not permitted on Sundays or City holidays.

## Santa Clara County

The Santa Clara County noise ordinance limits construction hours to between 7:00 AM and 7:00 PM on weekdays and Saturdays. Additionally, where technically and economically feasible, noise levels at residential properties adjacent to construction areas shall not exceed 75 dBA during construction activities.

### 4.13.1.2 Existing Conditions

The project alignment is the existing right-of-way on Highland Avenue, Monterey Road, Las Animas Avenue, Murray Avenue, Chestnut Street, E. 7<sup>th</sup> Street, and Renz Lane. Monterey Road and Las Animas Avenue in North Gilroy has daytime traffic noise between 74 to 79 dBA, measured 65 feet from the road.<sup>34</sup> 7th Street existing noise levels range between 54 and 63 dBA. Short term noise levels on Chestnut Street was measured at 65 dBA.<sup>35</sup> The project alignment is surrounded by commercial, light industrial, residential, and agricultural lands.

### 4.13.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project result in:				
1) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) Generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
3) 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 project area to excessive noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

<sup>34</sup> Illingworth & Rodkin. 2015. *North Gilroy Neighborhood Districts Urban Service Area Amendment EIR Noise and Vibration Assessment Gilroy, California*. May 2015.

<sup>35</sup> City of Gilroy. *Downtown Gilroy Station Area Plan*. Appendix B.

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**Impact NOI-1:** The project would not result in 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. **(Less than Significant Impact)**

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### **Construction Noise Impacts**

Construction of the proposed pipeline has the potential to create noise impacts through construction equipment usage and vehicle trips generated by construction workers and supply trucks traveling to and from the project site. The majority of the alignment would be constructed within existing City of Gilroy road right-of-way by means of open trench construction. The crossings of the UPRR, Miller Slough/West Branch Llagas Creek, and SR 152 would be installed by trenchless construction methods. Depending on the depth of the existing facilities, siphons may be required for one or more of these trenchless crossings.

The proposed sewer pipeline is a linear project, examples of which include power transmission lines, highways, railroad lines, and aqueducts. For these types of projects, the zone of potential noise impacts is continuously moving during the project's construction phase and would only occur for approximately 30 days near any one receptor, except if near microtunneling sites. Microtunneling at the various crossings would occur for several months, along with the trenching and line installation. Noise impacts would be most noticeable in residential areas near project construction locations. Noise levels would vary depending on the type of equipment used, how it is operated, and how well it is maintained. Standard excavation and installation equipment, such as graders, backhoes, loaders, side-boom tractors, welders, and trucks, would be used for this work.

Project construction activities would temporarily increase noise levels in the project area. Construction of the proposed project is anticipated to take approximately six years to complete. In accordance with the City of Gilroy Municipal Code, project construction activities would occur between 7:00 AM and 7:00 PM, Monday through Friday, and between 9:00 AM and 7:00 PM on Saturday. Construction activities are not permitted on Sundays or City holidays. In accordance with County of Santa Clara County noise ordinance, construction activities would occur between 7:00 AM and 7:00 PM on weekdays and Saturdays. Given the short duration at any one location and relatively low intensity of project construction activities and that the project would adhere to the construction hours specified in the City of Gilroy Municipal Code, the proposed project would not result in a substantial temporary or periodic increase in ambient noise levels in the project vicinity above levels existing without the project. **(Less Than Significant Impact)**

### **Operational Noise Impacts**

Operation of the proposed underground sewer pipeline project would not generate noise, as no pump stations are proposed. Noise during construction of the proposed project would be temporary. Therefore, the proposed project would not result in a substantial permanent increase in ambient noise levels in the project vicinity above levels existing without the project. **(No Impact)**

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**Impact NOI-2:** The project would not result in generation of excessive groundborne vibration or groundborne noise levels. **(Less than Significant Impact)**

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Operation of the proposed underground sewer pipeline project would not generate vibration. Construction of the proposed project, which is anticipated to take approximately six years to complete, may generate perceptible vibration when heavy equipment or impact tools (e.g., jackhammers, hoe rams, etc.) are used. The nearest vibration-sensitive land uses are the southern sections of the sewer pipeline alignment that are surrounded by residences. The sections of the alignment that require microtunneling or guided auger-boring and longer periods of construction are approximately 20 to 200 feet from the nearest sensitive receptors (See Figure 4.3-1).

The trenching and installation would constantly be moving over the entire construction area and would only occur for approximately 30 days near any one receptor, except if near microtunneling sites. Microtunneling at the various crossings would occur for several months, along with the trenching and line installation. Vibration generated by construction activities, completed in accordance with the project construction specifications, is not expected to damage the buildings adjacent to the proposed project, as the vibration levels are not expected to exceed 0.3 in/sec PPV. While perceptible, vibration levels during construction are not considered significant, given the intermittent and short duration of the activities that have the highest potential of producing vibration (use of equipment to remove and replace pavement). For these reasons, exposure of persons to, or generation of, excessive groundborne vibration or ground noise levels would be less than significant. **(Less Than Significant Impact)**

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**Impact NOI-3:** The project would not be 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. The project would not expose people residing or working in the project area to excessive noise levels. **(No Impact)**

---

The proposed project would install underground sewer pipeline to accommodate future growth and development in the City of Morgan Hill. Unlike a residential project, the proposed sewer pipeline project would not introduce sensitive receptors to the project area. Furthermore, the project area is located outside the 65 dBA CNEL noise contour line for aircraft activities at San Martin Airport (i.e., the nearest airport). For these reasons, the proposed project would not expose people to excessive noise levels from airport operations. The proposed project is not located within the vicinity of a private airstrip and would not introduce sensitive receptors into the project area. **(No Impact)**

## 4.14 POPULATION AND HOUSING

### 4.14.1 Environmental Setting

#### 4.14.1.1 *Regulatory Framework*

##### Local

##### Santa Clara County General Plan

As part of the Santa Clara County General Plan, and to be in accordance with state and regional housing development goals, the County of Santa Clara Housing Element Update 2015-2022 was adopted in 2014. Section 3.05 pertains to rural unincorporated areas of Santa Clara County, and is consistent with County plans to focus development in Urban Service Areas. Unincorporated rural areas are intentionally planned to allow low-density commercial uses (i.e. mineral extraction, ranching, farming, etc.), secondary dwellings, single-family homes, and agricultural worker housing.

##### Morgan Hill 2035 General Plan

The following goal and policy to reduce the effects of population and housing are applicable to the proposed project:

*Policy CNF-3.4:* Population Limit. Plan for a January 1, 2035 population of 58,200 residents.

#### 4.14.1.2 *Existing Conditions*

The population of Morgan Hill was estimated to be 46,454 as of January 2020. The population of Gilroy was estimated to be 57,084 as of January 1, 2020. The County of Santa Clara's population was estimated to be 1,961,969 as of January 1, 2020.<sup>36</sup>

Housing is located adjacent to parts of the project alignment, but is not located within the proposed alignment.

#### 4.14.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) 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)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

<sup>36</sup> State of California – Department of Finance. E-1 “Population Estimates for Cities, Counties, and the State — January 1, 2019 and 2020”. May 2020. <http://www.dof.ca.gov/Forecasting/Demographics/Estimates/E-1/>.

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
2) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

---

**Impact POP-1:** The project would not 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). **(No Impact)**

---

The proposed project would install underground sewer pipeline to accommodate City of Morgan Hill's planned growth. The project would not add new homes, businesses, or roads or other infrastructure that would induce substantial population growth in an area either directly or indirectly. The proposed sewer trunk project would serve existing and planned development within the urban envelope of Morgan Hill. **(No Impact)**

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**Impact POP-2:** The project would not displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere. **(No Impact)**

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The proposed project would install new sewer pipeline primarily within existing right of way (r.o.w.) to accommodate City of Morgan Hill's planned growth. The project would not displace existing housing or people, necessitating the construction of replacement housing elsewhere. **(No Impact)**

## **4.15 PUBLIC SERVICES**

### **4.15.1 Environmental Setting**

#### **4.15.1.1 *Regulatory Framework***

##### **Regional and Local**

###### **Countywide Trails Master Plan**

The Santa Clara County Trails Master Plan Update is a regional trails plan approved by the Santa Clara County Board of Supervisors. It provides a framework for implementing the County’s vision of providing a contiguous trail network that connects cities to one another, cities to the county’s regional open space resources, County parks to other County parks, and the northern and southern urbanized regions of the County. The plan identifies regional trail routes, sub-regional trail routes, connector trail routes, and historic trails.

#### **4.15.1.2 *Existing Conditions***

##### **Fire Services**

The project alignment is serviced by the Gilroy Fire Department, Hollister Fire Department, and the South Santa Clara County Fire District (Fire District). The Fire District is staffed by the California Department of Forestry and Fire Protection and participates in automatic aid agreements with the Morgan Hill, Gilroy, Pajaro Valley, Hollister, and San Jose Fire Departments. The Fire District responds to about 3,000 incidents per year.<sup>37</sup> The nearest fire station is approximately 0.5 miles southwest of the site at 7070 Chestnut Street in Gilroy, California.

##### **Police Services**

The project alignment is served by the Santa Clara County Sheriff’s Office (Sheriff’s Office) and the California Highway Patrol (CHP). The Sheriff’s Office is staffed by 1,453 sworn law enforcement officers, the majority of whom are enforcement and correctional deputies.<sup>38</sup> CHP operates two nearby divisions, the Golden Gate Division that includes Santa Clara County, and the Coastal Division that includes parts of Gilroy and Hollister.<sup>39</sup> The nearest police station is in the City of Gilroy adjacent to the alignment at 740 Renz Lane (CHP).

##### **Schools**

The closest schools to the project site are Eliot Elementary School at 475 Old Gilroy Street, and South Valley Middle School located at 385 Loof Avenue, Gilroy adjacent to different segments of the proposed alignment.

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<sup>37</sup> South Santa Clara County Fire District. “About Us South Santa Clara County Fire District”. Accessed December 17, 2019. <http://www.sccfd.com/about/>.

<sup>38</sup> Santa Clara County. “The Sheriff’s Office – Sheriff – County of Santa Clara”. 2019. Accessed December 17, 2019. <https://www.sccgov.org/sites/sheriff/Pages/overview.aspx>.

<sup>39</sup> State of California. “Find an Office”. 2019. Accessed December 17, 2019. <https://www.chp.ca.gov/find-an-office>.



## Parks

The City of Gilroy has 27 parks and recreational facilities, the closest of which is the Gilroy Sports Complex approximately 1.2 miles south of the southernmost segment of the project alignment.<sup>40</sup> Santa Clara County parks has 28 total parks with over 52,000 acres of land combined.<sup>41</sup> The closest park to the project site is San Ysidro Park adjacent to the project alignment.

### 4.15.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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:				
1) Fire Protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Police Protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) Schools?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) Parks?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
5) Other Public Facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

---

<b>Impact PS-1:</b>	The project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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 fire protection services. <b>(No Impact)</b>
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The proposed project would install underground sewer pipeline to accommodate City of Morgan Hill's planned growth. The proposed project would not cause an increase in public service needs. During construction, standard management practices would be implemented to maintain the efficiency of public services – such as covering trenches and bore holes during off-hours of development. For these reasons, the proposed project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities or the need for new or physically altered governmental facilities in the areas of:

- Fire Protection **(No Impact)**
- Police Protection **(No Impact)**

<sup>40</sup> City of Gilroy. "Park & Facility Rentals, Gilroy, CA – Official Website." Accessed December 17, 2019. <http://www.cityofgilroy.org/538/Park-Facility-Rentals>.

<sup>41</sup> County of Santa Clara County. "About Us – Parks and Recreation – County of Santa Clara." Accessed December 17, 2019. <https://www.sccgov.org/sites/parks/AboutUs/Pages/About-the-County-Regional-Parks.aspx>.

- Schools **(No Impact)**
- Parks **(No Impact)**
- Other Public Facilities **(No Impact)**

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**Impact PS-2:** The project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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 police protection services. **(No Impact)**

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See Response to Impact PS-1. **(No Impact)**

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**Impact PS-3:** The project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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 schools. **(No Impact)**

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See Response to Impact PS-1. **(No Impact)**

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**Impact PS-4:** The project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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 parks. **(No Impact)**

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See Response to Impact PS-1. **(No Impact)**

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**Impact PS-5:** The project would not result in substantial adverse physical impacts associated with the provision of new or physically altered governmental facilities, the 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 other public facilities. **(No Impact)**

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See Response to Impact PS-1. **(No Impact)**

## 4.16 RECREATION

### 4.16.1 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
1) Would the project increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility will occur or be accelerated?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Does the project include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

---

**Impact REC-1:** The project would not 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. **(No Impact)**

---

No recreation impacts are anticipated during the construction of proposed sewer facilities. These facilities are not located within the boundary of an identified recreation facility or area and therefore the temporary influx of construction workers and equipment would not increase park usage and would not result in the physical deterioration of park facilities. Therefore, no impacts would occur. Once constructed, the proposed sewer pipelines would be located underground and would not conflict with use of any recreational facility. The project would not increase the number of residents or employees using recreational facilities in Gilroy or Santa Clara County. For these reasons, the proposed project would not increase the use of existing neighborhood and regional parks or other recreational facilities such that substantial physical deterioration of the facility will occur or be accelerated. **(No Impact)**

---

**Impact REC-2:** The project would not include recreational facilities or require the construction or expansion of recreational facilities which might have an adverse physical effect on the environment. **(No Impact)**

---

The proposed project does not include recreational facilities and would not require the construction or expansion of recreational facilities. Maintenance of proposed project components would be addressed by existing maintenance personnel and therefore the proposed project would not induce population growth and no additional recreation facilities would be required. Therefore, no impact would occur. **(No Impact)**

## **4.17 TRANSPORTATION**

### **4.17.1 Environmental Setting**

#### **4.17.1.1 *Regulatory Framework***

##### **State**

##### California Department of Transportation

Caltrans manages interregional transportation, including management and construction of the California highway system. In addition, Caltrans is responsible for permitting and regulation of the use of state roadways. Within proximity of the project, there are several facilities that fall under Caltrans' jurisdiction, including U.S. 101 and SR 152.

##### Senate Bill 743

Senate Bill 743 (SB 743), which became effective September 2013, initiated reforms to the CEQA Guidelines to establish new criteria for determining the significance of transportation impacts that “promote the reduction of GHG emissions, the development of multimodal transportation networks, and a diversity of land uses.” Specifically, SB 743 directs the Governor’s Office of Planning and Research (OPR) to update the CEQA Guidelines to replace automobile delay—as described solely by level of service (LOS) or similar measures of vehicular capacity or traffic congestion—with vehicle miles traveled (VMT) as the recommended metric for determining the significance of transportation impacts. OPR has prepared updated draft CEQA Guidelines implementing SB 743. Beginning on July 1, 2020, the provisions of SB 743 will apply statewide.

##### **Local**

##### County of Santa Clara General Plan

The County General Plan Transportation Chapter provides information about the transportation needs of the County (County of Santa Clara, 1994a, 1994b). The Plan also includes Level of Service (LOS) standards for the County. Currently, the County deems LOS D or better to be the acceptable service levels for intersections and roadway segments, and LOS E for designated Congestion Management Program (CMP) roadways.

##### City of Gilroy LOS policy and significance threshold

Maintain traffic conditions at LOS C or better, allowing some commercial and industrial areas to operate at LOS D or better. For signalized intersections already operating at unacceptable LOS D, a significant impact would occur if a project increases average delay more than 2.0 seconds. For signalized intersections already operating at unacceptable LOS E or F, a significant impact would occur if a project increases average delay by 1.0 second.

#### 4.17.1.2 Existing Conditions

##### Roadway Network

Between Harding Avenue and Monterey Road, Highland Avenue is a paved street with one traffic lane in each eastbound and westbound direction, generally with unpaved shoulders. Between Highland Avenue and Cohansey Avenue, Monterey Road is a paved street with two lanes of traffic in each northbound and southbound direction, a paved median and a paved shoulder on each side of the road. Las Animas Avenue is a paved street with one traffic lane in each eastbound and westbound direction. Murray Avenue, Chestnut Street, East 7<sup>th</sup> Street, and Renz Lane are paved streets with single traffic lanes in each direction. The proposed pipeline will cross several private driveway entrances and intersecting streets, including Carls Court, Neva Drive, Fitzgerald Avenue, and Day Road.

##### Pedestrian Facilities

Between Harding Avenue and Monterey Road, there are no sidewalks except for the section bordering the north sides of the Santa Clara County Sig Sanchez Government Center in the southwest corner of Highland Avenue and Monterey Road. Between Highland Avenue and Cohansey Avenue, sections of sidewalk exist on each side of Monterey Road. Las Animas Avenue has sidewalk along most of the eastbound lane.

#### 4.17.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadways, bicycle lanes and pedestrian facilities?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) For a land use project, conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible land uses (e.g., farm equipment)?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) Result in inadequate emergency access?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

---

**Impact TRN-1:** The project would not conflict with a program plan, ordinance or policy addressing the circulation system, including transit, roadways, bicycle lanes and pedestrian facilities. **(Less than Significant Impact)**

---

The project area is located in an undeveloped, rural area of Santa Clara County and developed neighborhood in the City of Gilroy. Both the City of Gilroy and County of Santa Clara do not

currently have an adopted vehicle miles traveled (VMT) policy. The City's adopted transportation policy utilizes level of service (LOS) as the metric by which the City determines the functionality of the roadway system and the effect of new development on the roadway network.

The proposed project may require temporary lane closures during construction of the proposed 6.6 miles of sewer pipeline that would extend from the termination of the previously constructed Harding Avenue segment of the sewer relief trunk located at the intersection of Harding Avenue and Highland Avenue in San Martin, southeast to the previously constructed City of Gilroy segment of the sewer relief trunk located on Renz Lane in Gilroy. Temporary lane closures may increase congestion on these streets during peak travel times. Construction vehicles traveling to and from the project area may also cause a slight increase in traffic volumes during the six-year overall construction period. Any potential lane and driveway closures would be coordinated with the Cities of Gilroy, Morgan Hill, and County of Santa Clara and their area residents and businesses to provide proper access. Therefore, impacts during construction would be less than significant.

Once constructed, the proposed sewer pipelines would be located below the surface of the roadways and would not obstruct or impede any flow of transportation. Although the underground pipelines would require routine maintenance and repair in emergency situations, maintenance and repair vehicles are not anticipated to create a significant increase in traffic generation. Therefore, implementation of the proposed project would not substantially decrease the effectiveness of the circulation system and impacts would be less than significant. **(Less than Significant Impact)**

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**Impact TRN-2:** The project would not conflict or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b). **(No Impact)**

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Since the project proposes an underground sewer pipeline, the project would not conflict with or be inconsistent with CEQA Guidelines Section 15064.3, subdivision (b). **(No Impact)**

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**Impact TRN-3:** The project would not substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment). **(No Impact)**

---

The proposed project does not involve any design features or incompatible uses that would increase hazards within the project area. All construction within existing roadways would be temporary and the roadways would be restored to their existing condition after construction is complete. All of the proposed pipelines would be installed underground and would therefore not result in incompatible uses. Therefore, the proposed project would have no impact in this regard. **(No Impact)**

---

**Impact TRN-4:** The project would not result in inadequate emergency access. **(Less than Significant Impact)**

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The proposed project may require temporary lane closures during construction of the proposed sewer pipeline. These closures could temporarily affect emergency access in these areas; however, as listed in Impact TRN-1, any potential lane and driveway closures would be coordinated with the Cities of

Gilroy, Morgan Hill, and County of Santa Clara to ensure adequate emergency access is maintained throughout construction within public rights-of-way. Once completed, the roadways would be restored to their original condition and emergency access would not be affected. Therefore, impacts to emergency access would be less than significant. **(Less than Significant Impact)**



## **4.18 TRIBAL CULTURAL RESOURCES**

### **4.18.1 Environmental Setting**

#### **4.18.1.1 *Regulatory Framework***

##### **State**

##### **Assembly Bill 52 Tribal Cultural Resources**

A tribal cultural resource can be a site, feature, place, or 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. It also must be either on or eligible for the California Historic Register, a local historic register, or the lead agency, at its discretion, chooses to treat the resource as a tribal cultural resource. Assembly Bill 52 (AB 52), which amends the Public Resources Code, requires lead agencies to participate in formal consultations with California Native American tribes during the CEQA process, if requested by any tribe, to identify tribal cultural resources that may be subject to significant impacts by a project. Where a project may have a significant impact on a tribal cultural resource, the lead agency's environmental document must discuss the impact and whether feasible alternatives or mitigation measures could avoid or substantially lessen the impact.

Consultation is required until the parties agree to measures to mitigate or avoid a significant effect on a tribal cultural resource or when it is concluded that mutual agreement cannot be reached. This consultation requirement applies only if the tribes have sent written requests for notification of projects to the lead agency. No tribes have sent written requests for notification of projects to the City of Morgan Hill, City of Gilroy and County of Santa Clara. Therefore, no tribes were consulted for the proposed project.

#### **4.18.1.2 *Existing Conditions***

The project alignment is located in Monterey Road, Cohansey Avenue, Murray Avenue, Chestnut Street, E. 7th Street, US 101, and Renz Lane, in the City of Gilroy. Urban development, consisting of commercial buildings (including a regional shopping center, gas station, and other neighborhood shopping centers), and associated parking lots, single-family residential homes, major thoroughfares, agricultural lands, and undeveloped lands are located throughout the project alignment's extent. As discussed in *Section 4.5 Cultural Resources*, the project site has a moderate sensitivity for tribal cultural resources, including Native American remains and archaeological deposits. No known tribal resources occur on the site.

#### 4.18.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
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:				
1) 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)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
2) 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 Resources Code Section 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

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**Impact TCR-1:** The project would not cause a substantial adverse change in the significance of a tribal cultural resource that is 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). **(Less than Significant Impact)**

---

The project alignment is not known to contain any tribal cultural resources, however, there is the possibility that tribal cultural resources could be uncovered during project construction. As described in Impact CUL-2 in *Section 4.5, Cultural Resources*, the project would implement standard conditions of approval to avoid impacts to unknown subsurface cultural resources. These measures would be applicable to tribal cultural resources and would function to avoid impacts to such resources if they are discovered on-site. Therefore, the proposed project would not cause a substantial adverse change in the significance of a tribal cultural resource that is listed on local or state registers. **(Less than Significant Impact)**

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**Impact TCR-2:** The project would not cause a substantial adverse change in the significance of a tribal cultural resource that is 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.  
**(Less than Significant Impact)**

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See Response to TCR-1. **(Less than Significant Impact)**

## **4.19 UTILITIES AND SERVICE SYSTEMS**

### **4.19.1 Environmental Setting**

#### **4.19.1.1 *Regulatory Framework***

##### **City of Gilroy**

Policy 19.03      Sewer, Treatment, and Disposal Capacities. Provide and maintain adequate sewers, wastewater treatment, and treated water disposal capacities to meet the needs of future growth (residential, industrial, and other).

Policy 19.07      Lift Stations. Minimize and eliminate where feasible the need for lift stations (see glossary). New sewer lines should be planned and coordinated to minimize crossings and lift stations across Uvas Creek in advance of development west of the creek.

##### **City of Morgan Hill**

Policy CNF-5.2      Road and Infrastructure Extensions. Support the County’s policy to avoid premature road and infrastructure extensions in the unincorporated areas which would potentially conflict with optimal street configurations and development patterns within the UGB.

Policy SSI-2.4      Code Requirements for Critical Structures. Design and construct critical structures above and beyond the applicable engineering and building standards, where such measures are deemed necessary from available geological and engineering data. Critical structures are those structures:

- a) Needed after a disaster (e.g., emergency communications, fire stations, hospitals, bridges, and overpasses);
- b) Whose continued functioning is critical (e.g., major power lines and stations, water lines, and other public utilities); or
- c) Whose failure might be catastrophic (e.g., large dams)

Policy SSI-15.2      Wastewater Treatment Facility and Growth. Ensure that the total capacity for the Gilroy/Morgan Hill Wastewater Treatment Facility, its timing for expansion, and configuration are consistent with adopted policies for the overall growth of Morgan Hill and Gilroy. Plans for the expansion of the Wastewater Treatment Facility should be based on the flow projections found in the Gilroy and Morgan Hill Sewer Master Plans. (South County Joint Area Plan 6.00)

Action SSI-15.A      Wastewater Treatment Facility Capacity. Work with the City of Gilroy to determine the best method to increase and fund sewer treatment capacity in order to facilitate development that is consistent with both cities’ general plans. (South County Joint Area Plan 6.01)

## County of Santa Clara

- R-HS 42: All new conventional on-site wastewater treatment systems shall be located only in areas where:
- a. There is reasonable assurance that they will function effectively over a long period;
  - b. They can be designed to have a minimum negative impact on the environment; and
  - c. They will not contaminate wells, or surface and groundwater supplies

### 4.19.1.2 *Existing Conditions*

Wastewater from Morgan Hill is collected in the City's sewer collection system and treated at the South County Regional Wastewater Authority (SCRWA) Wastewater Treatment Plant (Facility).

### 4.19.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
Would the project:				
1) Require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) Have insufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) Result in a determination by the wastewater treatment provider which serves or may serve the project that it does not have adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
5) Be noncompliant with federal, state, and local management and reduction statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

---

**Impact UTL-1:** The project would not require or result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities, the construction or relocation of which could cause significant environmental effects. **(No Impact)**

---

The proposed project would install new sewer relief trunk to accommodate the additional wastewater flows associated with City of Morgan Hill's planned growth. The project would not construct any new residential or commercial structures that would require water or wastewater treatment. Therefore, the project would not exceed wastewater treatment requirements. **(No Impact)**

---

**Impact UTL-2:** The project would not have insufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry and multiple dry years. **(No Impact)**

---

No significant amounts of water would be required during project construction, other than for routine dust suppression, and the project would not require new or expanded water supply resources or entitlements. Recycled water would be utilized for construction activities like dust control. The temporary increment of potable water demand by the construction workers would not be significant to require new or expanded water supply resources or entitlements. The Project would not create new residential, commercial, industrial, or agricultural uses that would affect available water supplies or require new or expanded water supply resources or entitlements. As a result, this criterion is not applicable to the proposed Project because no impacts on existing water supplies would occur, and no mitigation measures would be required. **(No Impact)**

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**Impact UTL-3:** The project would not result in a determination by the wastewater treatment provider which serves or may serve the project that it does not have adequate capacity to serve the project's projected demand in addition to the provider's existing commitments. **(No Impact)**

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See response to Impact UTL-1. **(No Impact)**

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**Impact UTL-4:** The project would not 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. **(No Impact)**

---

During construction of the proposed project, construction workers and construction material packaging would generate solid waste. The main contributor to solid waste generated by the proposed project would be the excavation and disposal of soil from the project segment sites. All trash produced by contractors and equipment operators would be removed from the project area daily and disposed of properly in accordance with federal, state, and local statutes and regulations related to solid waste. Impacts on the surrounding landfills would be minimal and limited to

construction activities. Operation of the proposed project would not generate solid waste. Therefore, sufficient landfill capacity to accommodate the project's solid waste disposal needs is not applicable to the proposed project. **(No Impact)**

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**Impact UTL-5:** The project would not be noncompliant with federal, state, and local management and reduction statutes and regulations related to solid waste. **(No Impact)**

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See Impact UTL-4. **(No Impact)**

## 4.20 WILDFIRE

### 4.20.1 Environmental Setting

#### 4.20.1.1 *Existing Conditions*

The California Department of Forestry and Fire Hazard Protection is responsible for the identification of very high fire hazard severity zones and transmission of these maps to local government agencies. Based on the Fire Hazard Severity Zone (FHSZ) Map, the project site is not located within a FHSZ area.<sup>42</sup>

### 4.20.2 Impact Discussion

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
If located in or near state responsibility areas or lands classified as very high fire hazard severity zones, would the project:				
1) Substantially impair an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
2) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
3) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
4) 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

The project site is not located in or near state responsibility areas or lands classified as very high fire hazard severity zones; therefore, the project would not result in wildfire impacts. **(No Impact)**

<sup>42</sup> CALFIRE. "Wildland Hazard & Building Codes". Accessed: March 8, 2019. <http://egis.fire.ca.gov/FHSZ/>.



## 4.21

## MANDATORY FINDINGS OF SIGNIFICANCE

	Potentially Significant Impact	Less than Significant with Mitigation Incorporated	Less than Significant Impact	No Impact
1) Does the project 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?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2) Does the project 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 future projects)?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

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**Impact MFS-1:** The project does not 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. **(Less than Significant Impact with Mitigation Incorporated)**

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The project would not result in significant impacts to aesthetics, agricultural and forestry resources, greenhouse gas emissions, land use, mineral resources, noise, population and housing, public services, recreation, transportation, and utilities and service systems.

With the implementation of the mitigation measures and conditions of approval included in the proposed project and described in the air quality, biology, cultural, geology, hazardous materials, and hydrology and water quality sections of this Initial Study, the proposed project would not result in significant adverse environmental impacts. **(Less Than Significant Impact with Mitigation Incorporated)**

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**Impact MFS-2:** The project does not have impacts that are individually limited, but cumulatively considerable. **(Less than Significant Cumulative Impact with Mitigation Incorporated)**

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The proposed project would install sewer trunk infrastructure to address City of Morgan Hill's planned growth and associated additional wastewater flows. After project completion, existing conditions in the project area would remain unchanged, except for the removal of trees. Any tree removal would be completed in accordance with the City of Gilroy tree removal guidelines and County of Santa Clara's Tree Preservation Ordinance, as applicable, and, therefore, would not contribute to a cumulative impact. The potential environmental impacts from the proposed project are primarily limited to the construction period. Mitigation measures and conditions of approval are included in the proposed project to reduce impacts to air quality, biology, cultural, geology, hydrology and water quality, and hazardous materials impacts during project construction to a less than significant level. Therefore, the proposed project would not contribute to cumulative impacts upon these resources. **(Less Than Significant Cumulative Impact with Mitigation Incorporated)**

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**Impact MFS-3:** The project does not have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly. **(Less than Significant Impact with Mitigation Incorporated)**

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Consistent with Section 15065(a)(4) of the CEQA Guidelines, a lead agency shall find that a project may have a significant effect on the environment where there is substantial evidence that the project has the potential to cause substantial adverse effects on human beings, either directly or indirectly. Pursuant to this standard, a change to the physical environment that might otherwise be minor must be treated as significant if people would be significantly affected. This factor relates to adverse changes to the environment of human beings generally, and not to effects on particular individuals. While changes to the environment that could indirectly affect human beings would be represented by all of the designated CEQA issue areas, those that could directly affect human beings include air quality, and noise. Implementation of Conditions of Approval and mitigation measures, and adherence to General Plan, City Code, and state and federal regulations described in these sections of the report, would avoid significant impacts. No other direct or indirect adverse effects on human beings have been identified. **(Less than Significant Impact with Mitigation Incorporated)**



## SECTION 5.0 REFERENCES

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## **SECTION 6.0      LEAD AGENCY AND CONSULTANTS**

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### **6.1              LEAD AGENCY**

#### **City of Morgan Hill**

##### ***Utilities & Engineering Department***

David Gittleston, Associate Engineer

### **6.2              CONSULTANTS**

#### **David J. Powers & Associates, Inc.**

##### ***Environmental Consultants and Planners***

Akoni Daniels, Principal Project Manager

Pooja Nagrath, Project Manager

Ryan Osako, Graphic Artist

#### **Cornerstone Earth Group**

Kurt Soenen, Principal Engineer

Stason Foster, Senior Project Engineer

#### **Holman & Associates**

Matthew R. Clark, Senior Associate

#### **Illingworth & Rodkin, Inc.**

James Reyff, Principal

Casey Divine, Air Quality Consultant

#### **WRA, Inc.**

Brian Kearns, Wildlife Biologist





## SECTION 7.0      ACRONYMS AND ABBREVIATIONS

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2017 CAP	Bay Area 2017 Clean Air Plan
AB	Assembly Bill
ABAG	Association of Bay Area Governments
ADFW	Average Dry Weather Flow
AIA	Airport Influence Area
ALUC	Airport Land Use Commission
BAAQMD	Bay Area Air Quality Management District
Btu	British Thermal Unit
CalEPA	California Environmental Protection Agency
CalFire	California Department of Forestry and Fire Protection
CalGreen	California Green Building Standards Code
Cal/OSHA	California Division of Occupational Safety and Health
CARB	California Air Resources Board
CBC	California Building Standards Code
CDFW	California Department of Fish and Wildlife
CERCLA	Comprehensive Environmental Response, Compensation, and Liability Act
CEQA	California Environmental Quality Act
CGS	California Geological Survey
CFCs	Chlorofluorocarbons
CH <sub>4</sub>	Methane
CLUP	Comprehensive Land Use Plan
CO	Carbon Monoxide
CO <sub>2</sub>	Carbon Dioxide
CO <sub>2</sub> e	Carbon Dioxide Equivalents
CRHR	California Register of Historical Resources
CUP	Conditional Use Permit
CUPA	Certified Unified Program Agency
DOT	United States Department of Transportation
DPM	Diesel Particulate Matter
EIR	Environmental Impact Report
EPA	United States Environmental Protection Agency

FMMP	Farmland Mapping and Monitoring Program
FRAP	Fire and Resource Assessment Program
FTA	Federal Transit Administration
GHGs	Greenhouse Gases
GWP	Global Warming Potential
Habitat Plan	Santa Clara Valley Habitat Plan/Natural Community Conservation Plan
HFCs	Hydrofluorocarbons
LOS	Level of Service
MBTA	Migratory Bird Treaty Act
MHFD	Morgan Hill Fire Department
MHPD	Morgan Hill Police Department
MLD	Most Likely Descendant
MMTCO <sub>2e</sub>	Million Metro Tons of Carbon Dioxide Equivalent
MND	Mitigated Negative Declaration
MTC	Metropolitan Transportation Commission
N <sub>2</sub> O	Nitrous Oxide
NAHC	Native American Heritage Commission
NHPA	National Historic Preservation Act
NO <sub>x</sub>	Nitrogen Oxides
NOD	Notice of Determination
NOI	Notice of Intent
NPDES	National Pollutant Discharge Elimination System
NRHP	National Register of Historic Places
O <sub>3</sub>	Ground-Level Ozone
PDA	Priority Development Areas
PFCs	Perfluorocarbons
PG&E	Pacific Gas and Electric Company
PM	Particulate Matter
PM <sub>2.5</sub>	Fine Particulate Matter
PPV	Peak Particle Velocity
RCRA	Resource Conservation and Recovery Act
RHNA	Regional Housing Needs Allocation
RPS	Renewables Portfolio Standard

RWQCB	Regional Water Quality Control Board
SB	Senate Bill
SCS	Sustainable Communities Strategy
SF <sub>6</sub>	Sulfur Hexafluoride
SHMA	Seismic Hazards Mapping Act
SMARA	Surface Mining and Reclamation Act
SVCE	Silicon Valley Clean Energy
SWPPP	Storm Water Pollution Prevention Plan
SWRCB	State Water Resource Control Board
TACs	Toxic Air Contaminants
TCRs	Tribal Cultural Resources
UPRR	Union Pacific Railroad
USACE	United States Army Corps of Engineers
USFWS	United States Fish and Wildlife Service
USGS	U.S. Geological Survey
UWMP	Urban Water Management Plan
VMT	Vehicle Miles Traveled
VTa	Santa Clara Valley Transportation Authority

