



# Madera High-Speed Rail Station Full-Build Project Phase 3

APPENDIX E

MADERA HSR STATION FULL-BUILD PROJECT PHASE 3

INITIAL STUDY

*April 2025*

**MADERA HSR STATION FULL-BUILD  
PROJECT PHASE 3  
INITIAL STUDY**

**PREPARED FOR:**

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# Acronyms and Abbreviations

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A	Agriculture
AB	Assembly Bill
AC	alternating current
ACE	Altamont Corridor Express
ADA	Americans with Disabilities Act
AE	Agriculture Exclusive
AQAP	air quality attainment plan
AQMD	South Coast Air Quality Management District
AR	Agriculture Residential
ARE	Agriculture Rural Exclusive
AsA	Alamo clay
AwA	Atwater loamy sand
BAT	Best Available Technology Economically Feasible
BCT	Best Conventional Pollutant Control Technology
bgs	below ground surface
BLNN	blunt-nosed leopard lizard
BMP	Best Management Practice(s)
CAA	Clean Air Act
CAL FIRE	California Department of Forestry and Fire Protection
CalEEMod	California Emissions Estimator Model
CALGreen	California Green Building Standards Code
CalSTA	California State Transportation Agency
Cal/OSHA	California Division of Occupation Safety and Health
CARB	California Air Resources Board
CASQA	California Stormwater Quality Association
CC	Community Commercial
CCR	California Code of Regulations
CDFW	California Department of Fish and Wildlife
CDP	census-designated place
CEQA	California Environmental Quality Act
CHRIS	California Historic Resources Information System
CHSRA	California High-Speed Rail Authority
CIDH	cast-in-drilled-hole
CO	carbon monoxide
CPUC	California Public Utilities Commission
CRHR	California Register of Historic Resources
CRMP	construction risk management plan
CUPA	Certified Unified Program Agency
CVFPB	Central Valley Flood Protection Board

CVRWQCB	Central Valley Regional Water Quality Control Board
CWPP	Community Wildfire Protection Plan
dB	decibel(s)
DOC	California Department of Conservation
DTSC	California Department of Toxic Substances Control
DWR	California Department of Water Resources
EIR	Environmental Impact Report
EIS	Environmental Impact Statement
EOS	Early Operating Segment
EPA	U.S. Environmental Protection Agency
FEMA	Federal Emergency Management Agency
FHSZ	Fire Hazard Severity Zone
FMMP	Farmland Mapping and Monitoring Program
FRA	Federal Railroad Administration
FRAP	Fire and Resource Assessment Program
FTA	Federal Transit Administration
FY	Fiscal Year
GHG	greenhouse gas
HbA	Hanford fine sandy loam
HI	Heavy Industrial
HMTA	Hazardous Materials Transportation Act
HSR	high-speed rail
IH	Industrial, Urban or Rural, Heavy
IPaC	Information for Planning and Consultation
IS	Initial Study
LAMP	Local Agency Management Program
LDR	Low Density Residential
LOS	level of service
LRA	Local Responsibility Area
Madera CTC	Madera County Transportation Commission
MCOAEO	Madera County Operational Area Emergency Operations Plan
MGD	million gallons per day
MND	Mitigated Negative Declaration
MOU	memorandum of understanding
mph	miles per hour
MRZ	Mineral Resource Zone
MTSP	Madera Transit Station Specific Plan
MUTCD	Manual on Uniform Traffic Control Devices
NAAQS	National Ambient Air Quality Standards
NAHC	California Native American Heritage Commission
NEPA	National Environmental Policy Act
NIMS	National Incident Management System



NO <sub>2</sub>	nitrogen dioxide
NPDES	National Pollutant Discharge Elimination System
NRCS	Natural Resources Conservation Service
NRHP	National Register of Historic Places
O <sub>3</sub>	ozone
OCS	overhead contact system
OES	Office of Emergency Services
OPR	Governor's Office of Planning and Research
OS	Open Space
OSHA	Occupational Safety and Health Administration
OWTS	on-site wastewater treatment system
P-C	Production-Consumption
Pb	lead
PGP	pentachlorophenol
PG&E	Pacific Gas and Electric
PI	Public Institution
PM	particulate matter
PPV	peak particle velocity
RCRA	Resource Conservation and Recovery Act
ROW	right-of-way
RTP	Regional Transportation Plan
RWQCB	Regional Water Quality Control Board
SaA	San Joaquin sandy loam
SB	Senate Bill
ScB	San Joaquin Whitney sandy loam
SCCC	State Center Community College
SOS	Sustainable Communities Strategy
SGMA	Sustainable Groundwater Management Act
SIP	State Implementation Plan
SJJPA	San Joaquin Joint Powers Authority
SJKF	San Joaquin kit fox
SJRRC	San Joaquin Regional Rail Commission
SJVAB	San Joaquin Valley Air Basin
SJVAPCD	San Joaquin Valley Air Pollution Control District
SLF	Sacred Lands File
SMGB	State Mining and Geology Board
SO <sub>2</sub>	sulfur dioxide
SOI	Sphere of Influence
SR	State Route
SRA	State Responsibility Area
SWPPP	Storm Water Pollution Prevention Plan
SWRCB	State Water Resources Control Board

TOD	transit-oriented development
TPSS	traction power substation
TS	Transit Station
USACE	United States Army Corps of Engineers
USDA	United States Department of Agriculture
USDOT	U.S. Department of Transportation
USEPA	U.S. Environmental Protection Agency
USFWS	U.S. Fish and Wildlife Service
USGS	U.S. Geological Survey
VdB	vibration decibel(s)
VLDR	Very Low Density Residential
VMT	vehicle miles traveled
WWTP	wastewater treatment plant

# 1. Introduction

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## 1.1. Purpose of Initial Study

The purpose of conducting this Initial Study as part of the environmental clearance of the Madera High-Speed Rail (HSR) Station Full Build Project ("Project") is to provide initial environmental analysis that will be utilized in determining what environmental topics will need to be analyzed in full detail in the Environmental Impact Report (EIR) and which topics will be analyzed as lesser detail under the "Other Considerations" section of the EIR.

## 1.2. Background

In July 2015, San Joaquin Joint Powers Authority (SJJPA) assumed the responsibility of day-to-day management, planning, funding, and support services related to the *San Joaquins* intercity rail service. The SJJPA contracts with the San Joaquin Regional Rail Commission (SJRRRC) to provide staffing, consultants, and other services to support SJJPA. SJJPA's governing board consists of 10 member agencies within the Central Valley and the San Francisco Bay Area. Additional information about SJJPA and SJRRRC can be found at <https://sjjpa.com> and <https://www.sjrcc.com>, respectively.

The California High-Speed Rail Authority (CHSRA) is developing the Merced-Bakersfield High-Speed Rail (HSR) Early Operating Segment (EOS). SJJPA is partnering with CHSRA, and CalSTA on network integration with the EOS and the SJJPA is expected to be the operating agency for the EOS. Once the HSR EOS begins operations between Merced and Bakersfield, the *San Joaquins* service will be truncated and will terminate at a multi-modal station in Downtown Merced (R Street) where passengers would be able to transfer between *San Joaquins* and HSR trains. Future *San Joaquins* service improvements would also increase service north of Merced, enhancing ongoing connections to/from Sacramento, the Northern San Joaquin Valley and the Bay Area and maximizing the ridership and benefits of the EOS.

The *San Joaquins* currently serve Madera at a station located in Madera Acres, a census-designated place (CDP) in unincorporated Madera County north of the City of Madera. SJJPA is currently working in coordination with the CHSRA, the California State Transportation Agency ("CalSTA"), Madera County, the Madera County Transportation Commission ("Madera CTC"), and the City of Madera to relocate the existing *San Joaquins* station to a new location along Avenue 12 to capture anticipated higher ridership due to existing land uses in the immediate vicinity such as the Madera Community College, existing land uses in north Fresno County, as well as anticipated higher levels of future development in areas around the new station location over that of the current location in Madera Acres. The relocated station would then be expanded to accommodate HSR service and become the future Madera HSR Station. Once EOS service is initiated, HSR service at the proposed Madera HSR Station along Avenue 12 would become Madera County's passenger rail connection to the larger statewide passenger rail network.

In 2012, the CHSRA completed environmental clearance of the EOS project section between Merced and Fresno, with two stations in Downtown Merced and Downtown Fresno. The CHSRA later identified Madera as a location for a proposed HSR station for the first time in its 2016 Business Plan. The environmental clearance of the project section between Merced and Fresno did not include a station in

Madera; therefore, a separate environmental clearance process was required for the Madera HSR Station.

The evolution of the Madera Station is being planned in 3 phases of implementation as follows:

**Phase 1: Relocated Station (for San Joaquins only).** Phase 1 would close the current San Joaquins Station in Madera Acres and relocated it to site just north of Avenue 12. See the site plan in **Figure 1-1**, which illustrates the specific components of this phase. Phase 1 was environmentally cleared through the preparation and adoption of an Initial Study/Mitigated Negative Declaration (IS/MND) in 2021 and is currently in final design. The IS/MND can be found at (<https://sjjpa.com/final-initial-study-mitigated-negative-declaration-documents/>).

**Phase 2: Partial Build-Out of the Madera HSR Station.** Phase 2, which is at the same station site as the relocated San Joaquins site near Avenue 12, would develop the eastern half of the Madera HSR Station, including a station siding track, a single side-platform located immediately east of the HSR mainline tracks (which are being implemented as part of California HSR Project by CHSRA), a new station building, and expanded parking over that from Phase 1. These improvements, along with other station facilities, would accommodate the EOS's anticipated service of 18 trains (round trips) per day are envisioned to be in place when HSR service commences on the Merced-Bakersfield EOS, as described in the CHSRA's 2022 Business Plan.<sup>O</sup> See the site plan in **Figure 1.2-1**, which illustrates the specific components of this phase. Phase 2 was also environmentally cleared as part of same Initial Study/Mitigated Negative Declaration (IS/MND) in 2021 that cleared Phase 1.<sup>(1)</sup> Phase 2 will enter final design upon receiving full funding.

**Phase 3: Full Build-Out of the Madera HSR Station.** Phase 3, which is the phase this EIR pertains to, would complete the west side of the Madera HSR station by adding a second station siding track and second platform. This phase would also include a pedestrian overpass, several culverts (new and extended), wildlife corridor extensions, and the expansion of parking and the station building over that from Phase 2. These improvements, along with other station facilities, would accommodate the "Valley-to-Valley HSR Service" (San Francisco to Bakersfield) in the medium-term and "Phase 1 HSR Service" (San Francisco to Los Angeles). See the site plan in **Figure 1.2-1**, which illustrates the specific components of this phase. Train service levels accommodated by these improvements are discussed further below.

SJJPA and the CHSRA completed a memorandum of understanding (MOU) in 2020 that establishes SJJPA as the expected operator of the Merced-Bakersfield HSR EOS. Based on this partnership and at the direction from CHSRA and CalSTA, SJJPA was assigned responsible for environmental clearance of the three phases of the Madera Station. Moving forward beyond environmental clearance, SJJPA is also responsible for securing funding for final design and construction of each phase. As mentioned, Phase 1 of the project is already in final design and construction is fully funded and will commence in 2025. Phase 2 has received funding for final design and construction via a pair of grants: a State of California Trade Corridor Enhancement Grant (TCEP) grant and a federal National Infrastructure Project

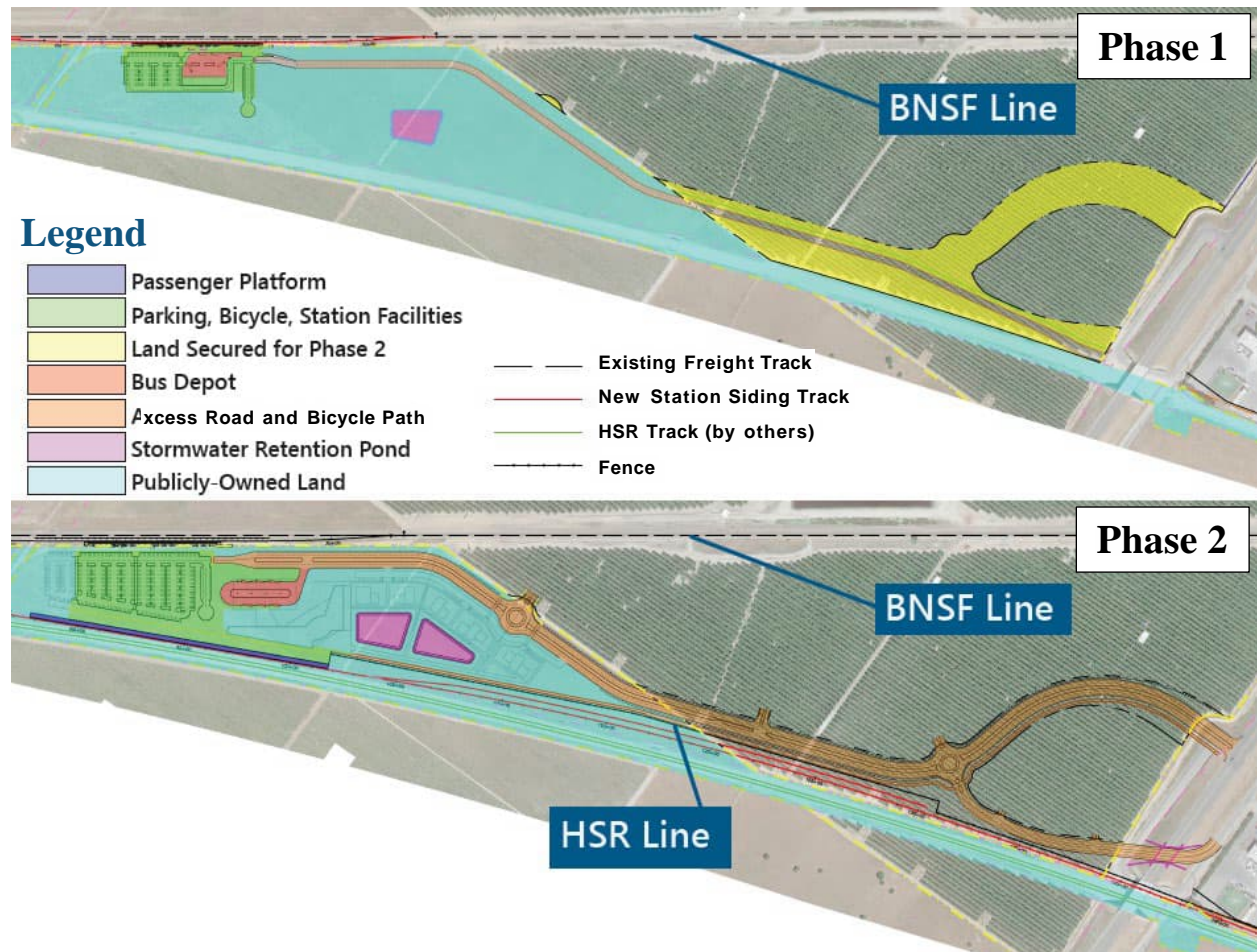
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<sup>f1)</sup> This document can be found on the CHSRA's website at <https://hsr.ca.gov/about/high-speed-rail-business-plans/2022-business-plan/>.

<sup>(2)</sup> Note: The reason Phases 1 and 2 were cleared together while excluding Phase 3 is that SJJPA had not yet received direction at that time to include a fully built out Madera HSR Station in the environmental clearance. Subsequently, CHSRA saw a need to clear the full station earlier than originally anticipated, hence they request SJJPA to conduct a follow up the ISMND with a clearance for a Phase 3 expansion of the Madera HSR Station.

Assistance [MEGA] grant. Utilizing state funds from these grants, final design work will begin in 2025. Funding for final design and construction of Phase 3 has currently not been identified yet.

**Figure 1.2-1: Phase 1 and Phase 2 Components**



### 1.2.1. Environmental Documentation

The Initial Study was prepared using desktop resources, publicly-available datasets, and information from previous environmental documentation.

Based on the information in this Initial Study, it has been determined that for certain environmental topics and subtopics, the Project would have no impact, less than significant impact, or less-than-significant impact with typical best management practices or standard permitting requirements. For these topics and subtopics, a summary of potential impacts would be included in the Other CEQA Considerations chapter of the Draft EIR.

For other environmental topics or subtopics where project-specific mitigation measures are required to reduce impacts to less-than-significant, or where impacts are potentially significant, they would be carried into the EIR for more detailed evaluation.

## 1.3. Project Description

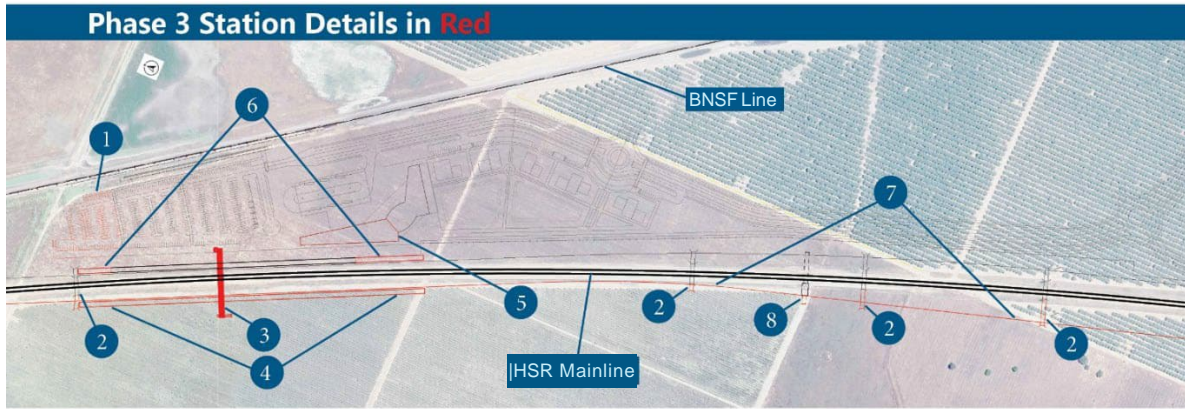
The Project would be designed to serve as the key connection for Madera County and portions of Fresno County to the intercity rail network, supporting expanded HSR operations and service levels (beyond the EOS) associated with HSR Service (north to the Bay Area, south to Southern California, or both) and subsequently Phase 1 HSR service (San Francisco to Los Angeles) at the proposed Madera HSR Station. The Project would include improvements in addition to those previously cleared for Phases 1 and 2 in the 2021 IS/MND, and the 2025 IS/MND Addendum.

### 1.3.1. Project Components

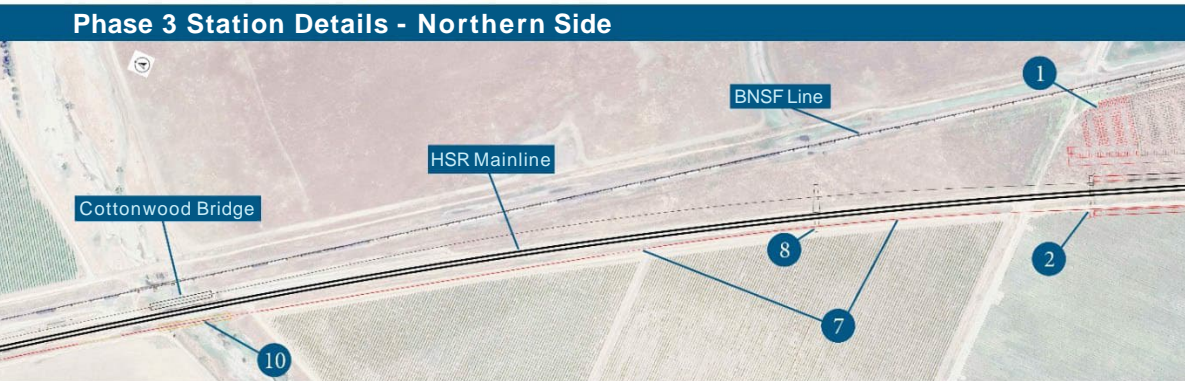
The components of the Project include platforms, trackwork, bridges, overhead contact system, substations, grade separations, station and parking expansions, and culverts. These are shown in red **Figure 1.3-1** and the components approved earlier in Phase 1 and Phase 2 are shown in black. More detailed figures for the Project and the permanent right-of-way (ROW) needed are provided in Appendix G, *Engineering Plans* of the Draft EIR.

Design, construction, and operation of the Project's rail components would comply with applicable standards from the Federal Railroad Administration, California Public Utilities Commission, and CHSRA. Design, construction, and operation of Project site access improvements, including the modifications to the access road, would adhere to applicable standards such as the California Manual on Uniform Traffic Control Devices and local design guidelines and specifications. Design approval for specific components would be sought from the appropriate agencies as part of the detailed design and subsequent stages of the Project. Specific components of the Project are described in more detail in the following subsections.

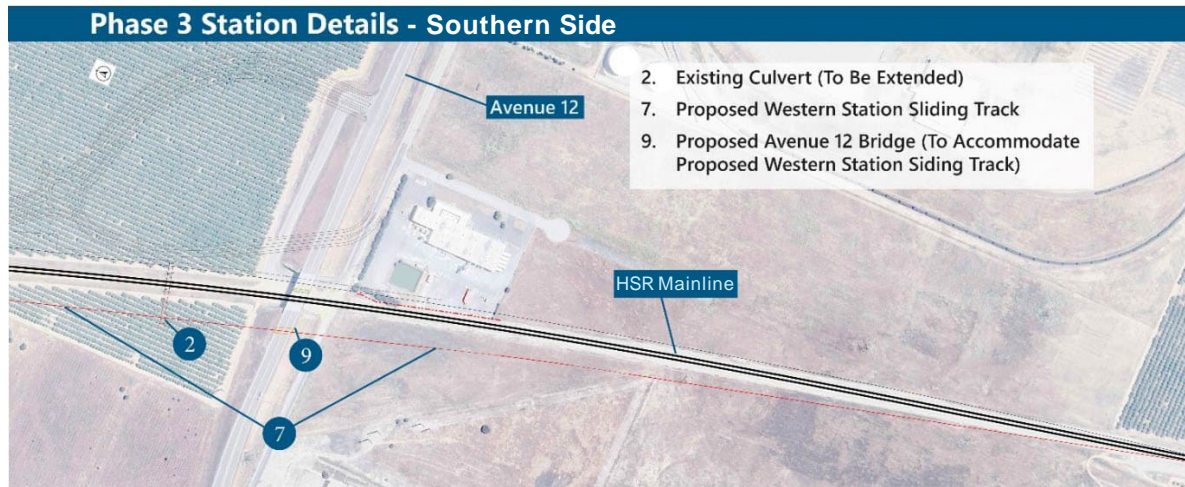
Figure 1.3-1: Project Components - Station Overview



- |   |   |
|---|---|
| 1. Proposed Additional Parking                            | 5. Proposed Station Building/Canopy   |
| 2. Existing Culvert (To Be Extended)                      | 6. Eastern Station Platform Extended to 1,410 ft. (Platform In Previous Phase 2 Was 1,000 > |
| 3. Proposed Overhead Pedestrian Bridge                    | 7. Proposed Western Station Siding Track  |
| 4. Proposed Western Station Platform (20 ft. x 1,410 ft.) | 8. Existing Wildlife Crossing (To Be Extended)  |



1. Proposed Additional Parking
2. Existing Culvert (To Be Extended)
7. Proposed Western Station Sliding Track
8. Existing Wildlife Crossing (To Be Extended)
10. Proposed Cottonwood Bridge



- |   |
|---|
| 2. Existing Culvert (To Be Extended)  |
| 7. Proposed Western Station Sliding Track   |
| 9. Proposed Avenue 12 Bridge (To Accommodate Proposed Western Station Siding Track) |

Source: (Kerns and West, 2024)

### **1.3.2. Platforms**

The Project would include a 1,410-foot platform along the westside of the station to accommodate the full length of the HSR trainsets. The Project also includes the extension of the eastside platform by 410 feet to 1,410 feet, matching the new westside platform. The platform height would be designed to accommodate the trainsets selected for the HSR system. Canopies would be provided on the new westside platform and on the extended portions of the eastside platform to protect passengers from the environmental elements.

Access between the platforms and the station would be provided by a new Americans with Disabilities Act-compliant accessible pedestrian crossing (i.e., footbridge) over the HSR mainline and station tracks.

### **1.3.3. Trackwork**

In conjunction with the new westside platform, the Project would construct a new station siding track on the westside of the station. Together with the station siding track on the eastside of the station completed under Phase 2, the Project would provide the Madera HSR Station with a total of four tracks. These would be arranged in a typical "local" station layout: two through tracks in the center (for faster trains not stopping at the station) and one siding track on either side (for slower trains stopping at the station).

The entire length of the new siding track, from the turnout locations at the north and south, would be approximately 14,600 feet. The turnouts would be designed for speeds up to 110 miles per hour.

### **1.3.4. Bridges**

Three bridge structures (one track bridge, one roadway bridge, and one pedestrian bridge) are included in the Project as follows:

- Track bridge at Cottonwood Creek. The western siding track would include a new single-track, five-span continuous cast-in-place, reinforced concrete slab structure over Cottonwood Creek. This bridge would match the span arrangement and hydraulic conveyance capacity of the existing double-track bridge constructed as part of the CHSRA Project.
- Pedestrian bridge at the station. A pedestrian overpass would be provided to allow passengers to access the new westside platform from the eastside of the station. The pedestrian bridge would include a shade structure, stairs, and two elevators.
- Roadway bridge at Avenue 12. The southern portion of the new western siding track would traverse Avenue 12 below the roadway surface. The existing Avenue 12 berm would be modified by creating a new penetration to accommodate the alignment of the proposed station siding track and expanding the roadway bridge to span the single siding track below.

### **1.3.5. Overhead Contact System and Traction Power Substation**

In conjunction with the proposed station siding track that would serve the proposed western platform, an overhead contact system (OCS) would be constructed along its entire length to provide



electrical power to electrified trainsets. The OCS would consist of poles at intervals matching the OCS poles being constructed as part of the CHSRA Project. These OCS poles are expected to be approximately 30 feet tall and would have foundations extending approximately 6 to 10 feet below the ground surface. To provide power to the OCS, a small traction power substation (TPSS) may be needed, though there is a possibility that electrical power could be drawn from the OCS planned to be constructed in association with the CHSRA Project's adjacent mainline tracks. If a TPSS is required, it would be located in an area in the vicinity of the northern end of the western platform.

### 1.3.6. Parking Expansion

The surface parking lot that is being constructed as part of Phase 2 would be extended north in this Project and utilize unused space between the HSR corridor and the BNSF Stockton Subdivision. The expanded parking lot would result in a net increase of approximately 542 parking spaces above the 401 parking spaces cleared for Phase 2, for a new total of 943 parking spaces as shown in **Table 1-1**.

**Table 1-1. Summary of Proposed Parking Spaces by Phase for Madera HSR Station**

Project Phase	Number of Parking Spaces by Phase	Total Parking Spaces
<b>Phase 1</b>	98	98
<b>Phase 2</b>	303	401
<b>Phase 3</b>	542	943

Source: (AECOM, 2024)

Parking calculations for this Project are based on the highest forecasted ridership at the Madera HSR Station related to the implementation of the Project (i.e. ridership based on the Phase 1 HSR Service, which will run from San Francisco and Los Angeles).

### 1. J.7. Station Building Expansion

The Project includes construction of an expanded or new separate station building, which would expand upon the station support services provided with the Phase 2 building identified in the prior IS/MND. The new station structure would also include a large canopy structure or structures that would extend out from the enclosed building portion to provide shaded outdoor plaza/seating areas. This station building (including the canopy) would be located adjacent to the eastern edge HSR platform (southern portion) and slightly west of the bus plaza. The total indoor building area would be expanded by approximately 5,000 square feet to provide space for enhanced passenger amenities and station support functions to accommodate the increased ridership from additional service, such as ticketing areas and waiting areas. The outdoor canopy could be designed to cover up to 20,000 square feet of outdoor plaza/seating space. A further 20,000 square feet of space would be reserved for expansion of the building/canopy structure in the future (when and if that becomes needed) but is not part of the Project. The Phase 3 building expansion would include a roof height of about 25 feet compared to the Phase 2 building roof height of about 15 feet.

### 1.3.8. Culverts

There are 10 proposed drainage culverts as part of the Project, all of which would be extensions of culverts originally constructed as part of Phase 2 of proposed Madera HSR Station. These 10 culverts

extensions are listed below. The culverts are marked with position measurements (e.g., 41+85 for the northernmost culvert) on the preliminary engineering plans and in the list below. The culvert extensions are listed below with the stationing measurements, from north to south, as follows:

- Proposed Culvert Extension Number (#) 1: 41+85;
- Proposed Culvert Extension #2: 48+22;
- Proposed Culvert Extension #3: 87+46;
- Proposed Culvert Extension #4: 112+55;
- Proposed Culvert Extension #5: 119+57;
- Proposed Culvert Extension #6: 126+96;
- Proposed Culvert Extension #7: 135+05;
- Proposed Culvert Extension #8: 157+85;
- Proposed Culvert Extension #9: 162+51; and
- Proposed Culvert Extension #10: 171+40.

### **1.3.9. Wildlife Crossings**

There are two proposed wildlife crossings as part of the Project; both would be extensions of wildlife crossings facilities originally constructed as part of Phase 2 of the proposed Madera HSR Station. As with the proposed culvert extensions, the wildlife crossing extensions are demarked with stationing measurements on the plans and in the list below. The wildlife crossing extensions are listed below with the stationing measurements, going from north to south as follows:

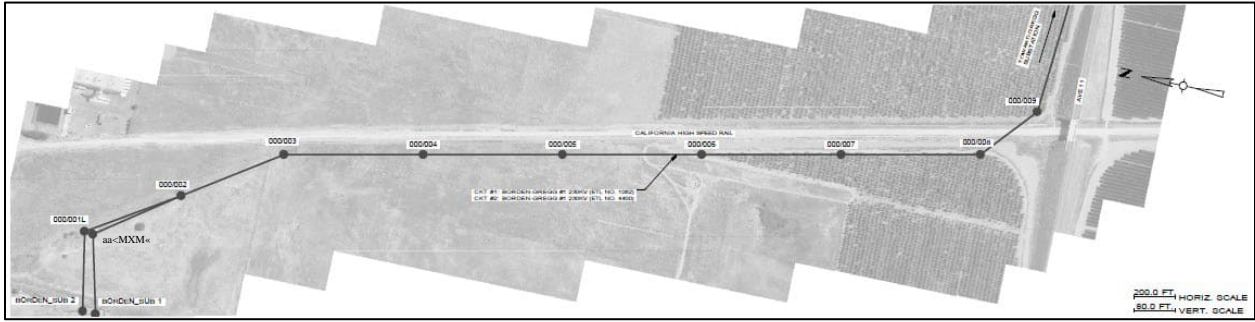
- Proposed Wildlife Crossing Extension #1: 76+41; and
- Proposed Wildlife Crossing Extension #2: 117+20.

### **1.3.10. Relocation of Pacific Gas and Electric Company Transmission Line**

Pacific Gas and Electric Company (PG&E) is currently implementing the Borden-Gregg Transmission Line Re-Alignment Project (BGTLRP) in the vicinity of the Project. The BGTLRP would construct a portion of the re-aligned 230-kilovolt transmission line (including two transmission poles) in the Project Footprint. The BGTLRP is currently in final design and is expected to be completed prior to the construction of the Project.

The BGTLRP conflicts with the location of the southern end of the western side station siding track and with a culvert extension, both of which would be constructed as part of the Project. Identified in **Figure 1.3-2**, Poles 003 and 004 from the BGTLRP would need to be relocated as part of the Project slightly to the west.

Figure 1.3-2: Proposed Alignment of PG&E Borden-Gregg Transmission Line Re-Alignment Project



Source: (RailPros, 2024)

## 2. Potentially-Affected Resources

**Table 2-1** below summarizes the potential impacts by resource topic and sub-topic. The subsequent subsections provide a detailed discussion of each potential impact.

**Table 2-1. Summary of Potential Impacts**

<b>Resource Area</b>	<b>Potentially-Significant Impact or Requires Project-Specific Mitigation</b> (Subtopic will be evaluated further in EIR)	<b>Less-than-Significant Impact or No Impact</b> <i>(Subtopic Evaluation in Other CEQA Considerations Chapter)</i>
Aesthetics		All Subtopics
Agricultural and Forestry Resources	Agricultural Land Conversion and Conflicting with Existing Agricultural Zoning (Construction)	All Other Subtopics
Air Quality	Conflict with AQ Plans and Pollutant Net Increase (Construction)	All Other Subtopics
Biological Resources	All Subtopics, except for conflicts with Conservation Plans (Construction)	Conflicts with Conservation Plans
Cultural Resources	Unknown Historic, Archaeological Resources, and Human Remains (Construction)	All operations subtopics
Energy		All Subtopics
Geology, Soils, and Paleontological Resources	Unknown Paleontological Resources (Construction)	All Other Subtopics
Greenhouse Gas Emissions		All Subtopics
Hazards and Hazardous Materials	Exposure to contaminants from accidental release (Construction)	All Other Subtopics
Hydrology and Water Quality	Impervious Surfaces and Drainage (Construction and Operations)	All Other Subtopics
Land Use and Planning		All Subtopics
Mineral Resources		All Subtopics
Noise	Noise/Vibration Generation (Construction)	All Other Subtopics
Population and Housing		All Subtopics
Public Services		All Subtopics
Recreation		All Subtopics
Transportation	Traffic Management Plan - Avenue 12 (Construction)	All Other Subtopics
Tribal Cultural Resources	Known Area of Importance to Native American Tribes (Construction)	All operations subtopics
Utilities and Service Systems		All Subtopics

<b>Resource Area</b>	<b>Potentially-Significant Impact or Requires Project-Specific Mitigation</b> (Subtopic will be evaluated further in EIR)	<b>Less-than-Significant Impact or No Impact</b> <i>[Subtopic Evaluation in Other CEQA Considerations Chapter]</i>
Wildfire		All Subtopics
Mandatory Findings of Significance	Degrade quality of the environment and Cumulative Impacts (Construction)	Direct or Indirect Substantial Adverse Effects on Human Beings

## 2.1. Aesthetics

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Except as provided in <i>Public Resources Code</i> § 21099, would the project:				
(a) Have a substantial adverse effect on a scenic vista?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) 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"/>
(c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from 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"/>
(d) 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"/>

### Discussion

*(a) Have a substantial adverse effect on a scenic vista?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project site is located in the San Joaquin Valley, approximately 50 miles from the foothills of the Diablo Mountain Range to the west and the Sierra Nevada Mountain Range to the east. This topography places the Project in an area with flat terrain. Existing vistas to the mountains are occasionally afforded over the broad plain views on clear days. Views, however, are intermittent and partially obscured by existing features in the vicinity of the Project, including low- and mid-rise buildings for manufacturing, roadways, and overhead utility lines. This includes a Pacific Gas and Electric ("PG&E") transmission line with towers that are over 100 feet in height that protrude into the skyline and lead to a power substation on Avenue 12. Public roadways adjacent to the Project site include Avenue 12 (oriented east-west), Road 30 % (oriented north-south and approximately 0.5 miles west of the site), and Santa Fe Road (adjacent to the easterly side of the BNSF railroad). The area surrounding the Project is characterized by agricultural land uses and is sparsely developed with rural residences. There are no sensitive viewers in the Project footprint or in the immediate vicinity of the Project footprint.

The Madera County General Plan establishes two policy items related to visual and scenic resources that the Project would abide by:

- **Policy 1.H.1-** Avoid locating structures along ridgelines, on steep slopes, or in other highly visible locations, except under certain conditions.
- **Policy 1.H.2-** Requires new developments to minimize land alterations that involve grading.

#### *Construction Impacts*

The construction staging areas and standard industry equipment (such as excavators, pavers, and dump and concrete trucks) would be employed for Project construction. It was noted that no equipment would have the height or scale to block any vista, and views from surrounding rural residences with potentially sensitive viewers in the vicinity of the Project or from travelers on surrounding roadways would not be substantially affected.

Construction of the additional bridge over Cottonwood Creek proposed as part of the Project would require tall pile-driving equipment. However, the equipment would be used intermittently and result in a minor and temporary change in the visual environment that would not block or substantially obstruct long-distance vistas.

The Project includes an ADA-compliant pedestrian bridge over the HSR mainline tracks. The bridge would be primarily viewed by travelers on Avenue 12, and although it is a new visual element, the views from Avenue 12 are already interrupted by existing powerlines, an industrial complex, and the Avenue 12 bridge. Thus, the pedestrian bridge is consistent with these other visual elements and would not have a substantial long-distance impact on a scenic vista. In addition, the new station platform may include canopies to protect passengers from the elements, but these elements would not protrude into the skyline or obstruct distant views as seen from off-site areas. As such, these elements would not substantially affect any scenic vista. Therefore, construction impacts related to having a substantial effect on a scenic vista would be less than significant.

#### *Operational Impacts*

The Project would require additional right-of-way to implement the new infrastructure. The proposed support buildings would be one-to-two-story (approximately 12-24 feet) in height and placed in such a way that they would not have any substantial impact on a scenic vista as viewed from a public right-of-way. The Project would expand upon the overhead contact system (OCS) from Phase 2, requiring approximately 30-foot-tall poles to be built along the entire length of the station siding track at intervals consistent with the OCS poles being constructed as part of the CHSRA Project (approximately 200 to 250 feet). The OCS poles are highly visible at close viewing distances but become less visible as distance increases. These poles would also be intermittently spaced, similar in appearance to the existing 100-foot-tall powerlines, and would not obstruct the long-range mountain views. Therefore, Project operation would have a less-than-significant impact on scenic vistas.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction or operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this subtopic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) Substantially damage scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway?***

**Determination: NO IMPACT**

The Project site is characterized by flat terrain, portions of which are currently used for agriculture (more specifically, orchards), as well as existing roadways, dirt farm roads, BNSF railroad, and an industrial site adjacent to the southerly portion of the Project area. While some areas within the Project footprint contain trees, these are common crop trees.

There are no significant rocks or outcroppings on the Project footprint or in the vicinity. The closest State scenic highway that is eligible for official designation is the segment of State Route [SR] 41 that starts north of the SR 49 junction, approximately 30 to 35 miles from the Project (Caltrans, 2019). This highway segment is not visible from the Project footprint and the Project is not visible from the highway. The closest historic building (National Register of Historic Places) is the Historic Madera County Courthouse, which is approximately five miles from the Project and not visible from the Project, nor is the Project visible from this site.

*Construction Impacts*

There are no scenic resources near the Project footprint. Thus, construction activities associated with the Project would not damage any scenic resources. Therefore, Project construction would have no impact on scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway.

*Operational Impacts*

There are no scenic resources close to the alignments of the proposed rail service for the Project. Therefore, Project operation would have no impact on scenic resources, including, but not limited to, trees, rock outcroppings, and historic buildings within a State scenic highway.

*Conclusion/Determination*

The Project would have no construction or operational impacts related to scenic resources. A detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this subtopic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(c) In non-urbanized areas, substantially degrade the existing visual character or quality of public views of the site and its surroundings? (Public views are those that are experienced from 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?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

The visual character of the Project site and surroundings is composed primarily of agricultural landscape with rows of planted vegetation commonly found in farming practices. Buildings in the southerly portions of the Project area exist to support manufacturing and a PG&E substation. These buildings are one to two stories in height and are rectangular in shape. There are no major structures within the northerly portion of the Project area, but existing infrastructure includes Santa Fe Drive (a roadway) and the existing BNSF track with bridges spanning Cottonwood Creek. Overhead PG&E transmission lines and electrical lines also exist and are generally oriented north-



south over the agricultural fields and east-west along Avenue 12. Approximately 0.5 miles further to the west is Madera Community College, with the intervening areas consisting of agricultural lands.

The HSR EOS between Merced and Bakersfield has been designed as the first building block of the full 500-mile system. The CHSRA Project trackwork and electrical poles are currently under construction in the vicinity of the Project footprint (and are part of the baseline for the Madera HSR Station Full-Build Project).

### *Construction Impacts*

Public views of the Project site are limited and consist of direct views from Avenue 12 and Santa Fe Road. Road 30 % is approximately 0.5 miles to the west, and due to its distance, direct views are limited. During construction, activities and storage of equipment would result in a temporary alteration of the visual character of the Project footprint. Clearing and grubbing activities would remove vegetation from current agricultural land use. The Project would include Best Management Practices (BMPs) that would be implemented to minimize the changes in the visual environment. BMPs would include, but would not be limited to, the use of fabric-covered screening fences to minimize public views of the construction activities, equipment, and stockpiles. Although construction activities would introduce equipment and machinery to the Project site and change the visual character, this would not represent a substantial change in the visual environment.

Proposed improvements include the construction of a new siding track west of the two HSR mainline tracks to provide expanded HSR service and enable full operation of the Madera HSR Station in the larger HSR network. Construction impacts related to new trackwork, including the construction of OCS poles, would be minimal and would not significantly obstruct the visual quality and public views of the existing site and surrounding lands. Additionally, the TPSS would be constructed, which would help reduce impacts to the quality of public views of the site. Construction activities would be primarily visible to travelers on Avenue 12 (for a very short duration) and only as they pass through the construction area. Upon completion of the short-term construction phase, all machinery and equipment would be removed from the site and visual changes from construction would cease. Therefore, Project construction would have a less-than-significant impact on the existing visual character and quality of public views of the site and its surroundings.

### *Operational Impacts*

Project elements would alter the visual character of the agricultural landscape through the potential construction of a one-to-two story building, potential station building expansion, and construction of the new station platform on the west side of the site. The Project would also add a new ADA-compliant pedestrian bridge over the HSR mainline tracks to ensure pedestrian connectivity between the east and west sides of the station.

Although the existing visual character is primarily agricultural, train operations already exist in the area along the same railroad (BNSF) right-of-way used by the existing *San Joaquins* service (including the future relocated station under Phase 1 of the Madera Station Relocation Project). Single-story buildings already exist in the area, and the addition of the station elements would be consistent with the existing visual character in the vicinity of the Project footprint. The Madera HSR Station Full-Build Project would introduce visual elements including a new station platform with canopy or canopies, ADA-compliant pedestrian bridge, additional information panels, lighting, and a building.

Given the extension of rail service along existing railroad right-of-way, no public views would be altered due to the operations of the Project. Thus, at the project level, the design of the proposed facilities would integrate well into the landscape context and reduce potential view blockage. Additionally, design of the proposed facilities would be consistent with existing landscape settings, other elements of previously-approved HSR improvements, light and shadow effects, and other potential visual impacts (California High Speed Rail Authority, 2005]. Therefore, Project operations would have a less-than-significant impact on the existing visual character and quality of public views of the site and its surroundings.

#### *Conclusion/Determination*

The Project would have less than significant construction or operational impacts related to visual character. A detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this subtopic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

#### *(d) Create a new source of substantial light or glare which would adversely affect day or nighttime views in the area?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project footprint and its vicinity are primarily characterized by agricultural uses north of Avenue 12 with minimal sources of nighttime lighting. However, the southerly portion of the Project site is adjacent to an industrial use, a PG&E substation, and vehicle headlights on Avenue 12, which contribute lighting to the nighttime light environment. At the time of Project construction, it should be noted that elements of Phase 1 and Phase 2 of the station would be under construction or completed and would include some nighttime lighting, typically for security purposes. Accordingly, the Madera HSR Station and its ancillary facilities, such as the parking lot and access road, would be sources of nighttime lighting. Street lighting is not typically present along roadways in the vicinity of the Project, except adjacent to the Madera Community College. There is security lighting at the buildings located on Avenue 12, including the Church and Dwight and Pacific Ethanol manufacturing buildings and the PG&E substation.

#### *Construction Impacts*

Construction activities for this Project would introduce new sources of lighting if night work were required. In addition, nighttime security lighting of the construction staging site would be required. Lighting needed for night work would be intermittent and temporary, only occurring during the construction phase, and would be localized to the project areas in which active work is occurring. The use of light shields and directional lighting is a common BMP that can be used during construction to minimize light spilling off-site and light observed from off-site areas, as well as light associated with the halo effect and sky glow. These minimization measures would be included as a part of the lighting plan for the Project and minimize effects during the Project construction phase. Construction equipment is not a typical source of glare. Therefore, Project construction would have a less-than-significant impact related to creating a new source of substantial light or glare which would adversely affect day or nighttime views in the area, and additional mitigation efforts are not anticipated.

### *Operational Impacts*

New lighting for safety and security at the Project's new station platform, expanded parking, station track, pedestrian bridge, and any potential expansion of the station building would introduce permanent sources of nighttime lighting to the Project. To minimize the creation of new sources of light and glare, all artificial outdoor lighting would be limited to safety and security requirements, would be designed using the Illuminating Engineering Society's design guidelines, and would be compliant with the International Dark Sky Association's approved fixtures. As such, the Project would include lighting BMPs that would be incorporated into the design of the Project. This includes positioning of light direction and shielding, which would minimize lighting spillover and sky glow. Lighting would be installed at the lowest allowable height and designed to cast low-angle illumination to minimize the light spill and backscatter to the night sky. Lighting would also be installed at the lowest allowable illumination level while still ensuring safety. Additionally, the number of nighttime lights would be minimized to the extent feasible.

Regarding glare, the lighting in the new parking lot area would be designed to meet safety requirements and provide good color rendering with natural light qualities. Parking lot lighting would be at the minimum brightness feasible while still providing safety and security. Furthermore, the materials used for the station platform and canopies, the potential one-story building for west-side parking access, and the proposed bridge include concrete, painted steel, and glass, which would cause minimal glare to surrounding areas. All coatings would be anti-reflective to further minimize glare.

With incorporation of the design elements and BMPs to minimize light and glare, Project operation would have a less-than-significant impact related to creating a new source of substantial light or glare which would adversely affect day or nighttime views in the area.

### *Conclusion/Determination*

The Project would have less-than-significant construction or operational impacts related to the effects on day or nighttime views in the area. A detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this subtopic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.2. Agricultural and Forestry Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
<p>In determining whether impacts to agricultural resources are significant environmental effects, lead agencies may refer to the California Agricultural Land Evaluation and Site Assessment Model (1997) prepared by the California Dept. of Conservation as an optional model to use in assessing impacts on agriculture and farmland. In determining whether impacts to forest resources, including timberland, are significant environmental effects, lead agencies may refer to information compiled by the California Department of Forestry and Fire Protection regarding the state’s inventory of forest land, including the Forest and Range Assessment Project and the Forest Legacy Assessment project; and forest carbon measurement methodology provided in Forest Protocols adopted by the California Air Resources Board. Would the project:</p>				
(a) Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(c) Conflict with existing zoning for, or cause rezoning of, forest land (as defined in <i>Public Resources Code</i> § 12220(g)), timberland (as defined by <i>Public Resources Code</i> § 4526), or timberland zoned Timberland Production (as defined by <i>Government Code</i> § 51104(g))?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(d) Result in the 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"/>
(e) 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 checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) ***Convert Prime Farmland, Unique Farmland, or Farmland of Statewide Importance (Farmland), as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use?***

#### **Determination: POTENTIALLY SIGNIFICANT IMPACT**

The California Department of Conservation (DOC) has established Important Farmland classifications—Prime Farmland, Farmland of Statewide Importance, Unique Farmland, and Farmland of Local Importance—to recognize the land’s suitability for agricultural production by

considering the physical and chemical characteristics of the soil, such as soil temperature range, depth of the groundwater table, flooding potential, rock fragment content, and rooting depth. The classifications also consider location, growing season, and moisture available to sustain high-yield crops. Together, Important Farmland and Grazing Land are defined by the DOC as "Agricultural Land" (*Public Resources Code* § 21060.1 and § 21095). Appendix G of the *CEQA Guidelines* focuses the analysis of impacts to agricultural and forestry resources on conversion of Prime Farmland, Farmland of Statewide Importance, or Unique Farmland; therefore, any conversion of these lands would be considered a significant impact under CEQA.

According to the Madera County Farmland Mapping and Monitoring Program (FMMP) map published by the DOC's Division of Land Resource Protection, the Project site is located on land designated as Prime Farmland, Farmland of Statewide Importance, and Unique Farmland (DOC 2012) (Figure 2.2-1 and Figure 2.2-2). The following list provides a description of these farmland categories mapped by the DOC (DOC, 2012):

- **Prime Farmland**—Land that has the best combination of physical and chemical features able to sustain long-term agricultural production. This land has the soil quality, growing season, and moisture supply needed to produce sustained high yields.
- **Farmland of Statewide Importance**—Land similar to Prime Farmland but with minor shortcomings, such as greater slopes or less ability to store soil moisture.
- **Unique Farmland**—Land of lesser-quality soils used for the production of the state's leading agricultural cash crops. This land is usually irrigated but may include non-irrigated orchards or vineyards as found in some climatic zones in California.

The DOC estimated that Madera County had 372,748 acres of Important Farmland in 2012, of which 98,500 acres (26 percent) were classified as Prime Farmland, 85,206 acres were classified as Farmland of Statewide Importance (23 percent), and 180,291 acres (48 percent) were classified as Unique Farmland (DOC 2012).

#### *Construction Impacts*

Construction activities such as grading for the proposed access road and siding track to the west of the two HSR mainline tracks would temporarily disturb existing land uses that are used for agricultural purposes and are identified as "Unique Farmland" as shown in Figure 2.2-1 (DOC 2022). Although construction activities are temporary, the conversion of Unique Farmland, as shown on the maps prepared pursuant to the Farmland Mapping and Monitoring Program of the California Resources Agency, to non-agricultural use would have a potentially-significant impact on agricultural land uses.

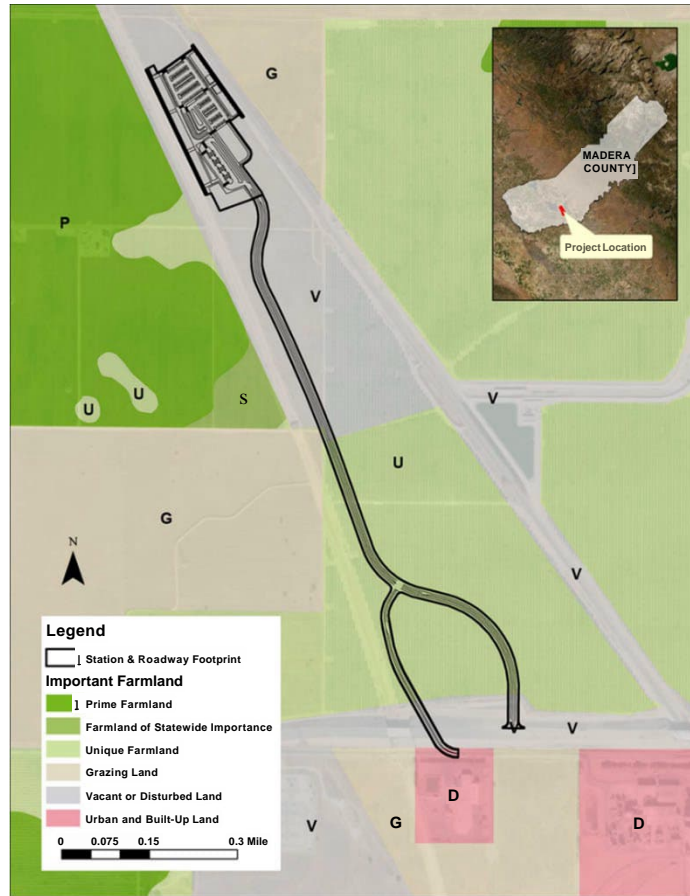
#### *Operational Impacts*

Project operation would not require additional agricultural land uses beyond those associated with Project construction. Therefore, Project operation would not 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, and no impacts would occur.

*Conclusion/Determination*

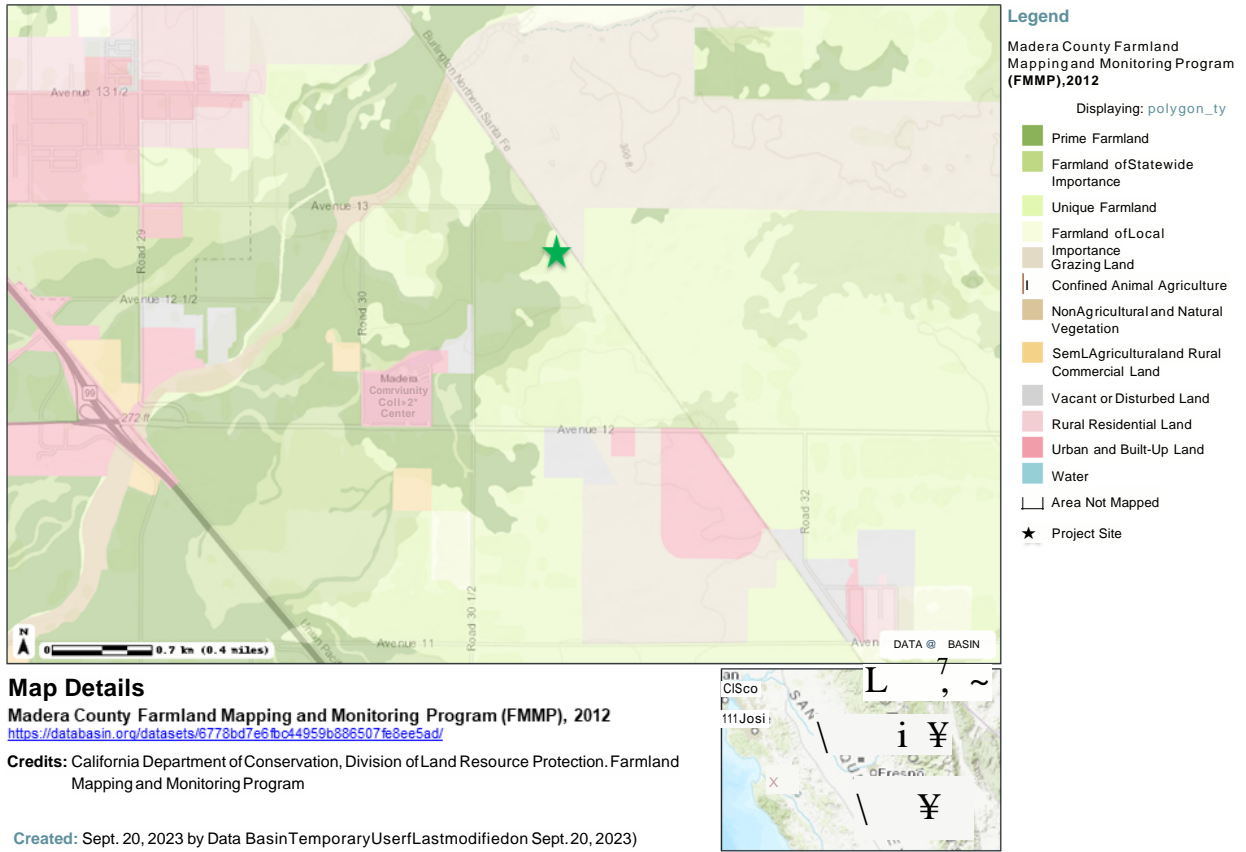
There would be no impacts related to operations. Impacts related to conversion of agricultural lands would be potentially significant during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Agricultural Resources" chapter of the EIR.

**Figure 2.2-1. Farmland Classifications at Project Site**



Source: The California Department of Conservation, 2022

**Figure 2.2-2. Madera County Farmland Mapping and Monitoring Program**



**(b) Conflict with existing zoning for agricultural use, or a Williamson Act contract?**

**Determination: POTENTIALLY-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

The Project site is not located on land under a Williamson Act contract (DOC 2022). Therefore, the Project would not conflict with a Williamson Act contract.

The Project parcels north of Avenue 12 and most of the surrounding parcels are zoned by Madera County as ARE-40 (Agricultural, Rural, Exclusive District) and POS (Public Open Space). Project parcels south of Avenue 12 are zoned IH (Industrial, Urban or Rural, Heavy District) (Madera County, 2024). Although portions of the ARE-40 zoned land are designated as farmland by the DOC's FMMP, they are not under a Williamson Act contract, and none of the parcels located in the southern portion of the Project site are under a Williamson Act contract.

The ARE-40 zoning district is intended to preserve agricultural lands. Agricultural Exclusive land is designated for agricultural uses, including limited agricultural support service uses (e.g., barns, animal feed facilities, silos, stables, fruit stands, and feed stores), agriculturally-oriented services (e.g., wineries, cotton gins), timber production, mineral extraction, airstrips, public and commercial refuse disposal sites, recreational uses, public and quasi-public uses, and similar and compatible uses. Although the Project's proposed uses are not specifically permitted in the ARE-40 zoning district either by right or conditionally, similar uses such as, airports, landing fields, and airstrips are

conditionally permitted. Because the Project would occupy land that is zoned for ARE-40; the Project would have potentially-significant impacts related to conflicting with existing zoning for agricultural use during construction.

*Conclusion/Determination*

Impacts related to conflicting with existing zoning for agricultural use would be potentially significant during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Agricultural Resources" chapter of the EIR.

- (c) ***Conflict with existing zoning for, or cause rezoning of, forest land (as defined in Public Resources Code § 12220(g)), timberland (as defined by Public Resources Code § 4526), or timberland zoned Timberland Production (as defined by Government Code § 51104(g))?***

**Determination: NO IMPACT**

*Construction and Operational Impacts*

The Project site is not zoned as forest land, timberland, or a Timberland Production Zone. Furthermore, the Project site does not contain forest land or timberland, nor is it conducive to use as such (USDA, 2024). The Project site is zoned as agricultural land (ARE-40) and as industrial (IH) (Madera County, 2024). Thus, there is no potential for conflicting with existing zoning for, or cause of rezoning of, forest land (as defined in Public Resources Code § 12220(g)), timberland (as defined by Public Resources Code § 4526), or Timberland Production (as defined by Government Code § 51104(g)). Therefore, Project construction and operation would have no impact.

*Conclusion/Determination*

No impacts would occur during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (d) ***Result in the loss of forest land or conversion of forest land to non-forest use?***

**Determination: NO IMPACT**

*Construction and Operational Impacts*

Under *Public Resources Code* § 12220(g), forest lands are defined as having a minimum native tree cover of 10 percent. The Project site does not meet this minimum threshold to be considered as forest land. As such, there is no threat from a loss of forest land or conversion of forest land to non-forest use. Therefore, Project construction and operation would have no impact.

*Conclusion/Determination*

No impacts would occur during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.



- (e) *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?*

**Determination: POTENTIALLY-SIGNIFICANT IMPACT**

*Construction Impacts*

For conversion of forest land, see Section 2.2(c) and Section 2.2(d) above. This Project would not result in other changes in the environment that would result in the conversion of forest land to non-forest uses.

For conversion of farmland, see Section 2.2(b) above. The trackwork, new west-side station platform, and expanded parking would be constructed on undeveloped land. The northern edge of the proposed HSR platform would be constructed approximately 200 feet from the northern edge of the station platform approved as part of Phase 2. Expanded parking constructed as part of the Project would be adjacent to parking approved in Phase 2, and would marginally increase non-agricultural acreage by approximately 0.009 acres. There is a potential for a larger station building that would be expanded on the approved station building in Phase 2. However, given that the expanded station building would be constructed on land already being considered for conversion of farmland, no additional impacts are anticipated.

In addition, the Project site partially falls within the adopted Madera State Center Community College (SCCC) Specific Plan boundary. The area covered under the SCCC Specific Plan is designated as the Madera State Center New Growth Area (Madera County, 2015). Madera County General Plan Policy 5.A.5 states that the County allows the conversion of existing agricultural lands within New Growth Areas (Madera County, 2015).

Project construction would involve other changes in the existing environment which could result in the conversion of farmland to non-agricultural use. Therefore, this impact is considered potentially-significant.

*Operational Impacts*

Project operation 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. Therefore, no impacts would occur.

*Conclusion/Determination*

There would be no impacts related to operations. Impacts related to conversion of agricultural lands would be potentially significant during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Agricultural Resources" chapter of the EIR.

## 2.3. Air Quality

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Where available, the significance criteria established by the applicable air quality management district or air pollution control district may be relied upon to make the following determinations. Would the project:				
(a) Conflict with or obstruct implementation of the applicable air quality plan?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(c) Expose sensitive receptors to substantial pollutant concentrations?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(d) Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

### Discussion

#### *(a) Conflict with or obstruct implementation of the applicable air quality plan?*

#### **Determination: POTENTIALLY-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

The Project is located within the San Joaquin Valley Air Basin (SJVAB) and under the jurisdiction and regulation of the San Joaquin Valley Air Pollution Control District (SJVAPCD). The SJVAPCD monitors ambient air quality standards for criteria pollutants including carbon monoxide [CO], lead (Pb), nitrogen dioxide (NO<sub>2</sub>), ozone (O<sub>3</sub>), sulfur dioxide (SO<sub>2</sub>), and particulate matter (PM<sub>10</sub>, PM<sub>2.5</sub>) to compare against standards that have been set by both the State of California and the Federal government. The State has also set standards for sulfate and visibility. Recent monitoring shows that the SJVAB is in non-attainment status for ozone and particulate matter (PM<sub>10</sub> and PM<sub>2.5</sub>) standards under the State regulations and is classified as non-attainment for the Federal ozone 8-hour standard and PM<sub>2.5</sub> 24-hour standard (SJVAPCD, 2023a).

To help manage air quality, the SJVAPCD prepares an air quality attainment plan (AQAP), which describes how an air district intends to meet the standards for emissions as well as PM<sub>10</sub> and PM<sub>2.5</sub>. The AQAP presents comprehensive strategies to reduce emissions from stationary, area, mobile, and indirect sources. AQAP documents also are transmitted to the California Air Resources Board (CARB) and the U.S. Environmental Protection Agency (USEPA) for incorporation into the State Implementation Plan (SIP). The SIP is a comprehensive plan that describes how an area would attain and maintain the National Ambient Air Quality Standards (NAAQS) for complying with the Federal Clean Air Act (CAA) (SJVAPCD, 2023b).

The SJVAPCD has established emission thresholds for the listed criteria pollutants to be used by lead agencies to determine whether air quality impacts from implementing a project would occur. A project-level analysis will be conducted to determine if the Project's construction emissions would violate the thresholds or conflict with or obstruct implementation of the applicable AQAP. Construction will include the use of diesel-powered equipment and truck trips for hauling materials and delivery of materials. The analysis of construction emissions in the EIR will include an evaluation of construction emissions based on modeling using the California Emissions Estimator Model ("CalEEMod") (CalEEMod, 2023). The outputs will be compared to quantitative thresholds to determine the significance of this impact. Applicable plans also will be used to evaluate the impact of Project emissions and appropriate project-level mitigation will be proposed, if necessary.

A less than significant impact is anticipated for operations. In fact, given the diversion of trips from automobiles to electrified trains using renewable energy, there will be beneficial air quality emissions effects during operations

#### *Conclusion/Determination*

Impacts related to conflict with air quality plans is not likely to be potentially significant during construction. However, as those exact numbers are not known at this time, further detailed evaluation of this sub-topic is required and will be provided in the "Air Quality" chapter of the EIR. Impacts relative to operations would be less than significant/beneficial

- (b) Result in a cumulatively considerable net increase of any criteria pollutant for which the project region is non-attainment under an applicable Federal or State ambient air quality standard?**

#### **Determination: POTENTIALLY-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

As discussed above, the Project's potential short-term (i.e., construction) emissions would be generated by diesel powered equipment as well as gas powered trucks for hauling materials and delivery of materials. These emissions would need to be calculated using CalEEMOD. The anticipated construction emissions will be compared to the significance thresholds provided by the SJVAPCD and discussed in the EIR. Appropriate project-level mitigation will be proposed, if necessary.

Operational emissions will be less than significant/beneficial as discussed above.

#### *Conclusion/Determination*

Impacts related to a net increase of any criteria pollutant is not likely to be potentially significant during construction. However, as those exact numbers are not known at this time, further detailed evaluation of this sub-topic is required and will be provided in the "Air Quality" chapter of the EIR. Operational emissions would be less than significant/beneficial.

- (c) Expose sensitive receptors to substantial pollutant concentrations?**

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

Some members of the population are especially sensitive to air pollutant emissions and are given special consideration when evaluating air quality impacts. For the purposes of CEQA, sensitive

receptors are generally considered facilities that house or attract children, the elderly, and people with illnesses or others who are especially sensitive to the effects of air pollutants. Schools, parks and playgrounds, day care centers, nursing homes, hospitals, and residential dwelling units] are examples of sensitive receptors (Air Quality Management District, 2015).

The Project elements, including trackwork, platforms, parking, roadway improvements, and other related facilities would be constructed in an area typified by rural residential and agricultural uses, but there are industrial/commercial uses within and adjacent to the southerly portion of the Project area. The nearest known residential use is approximately 750 feet east of the northerly track improvements. As distance increases the potential for affecting these resources decreases. The nearest residential is far away to be considered directly impacted by the potential Project emissions. Therefore, less than significant impacts are anticipated.

#### *Conclusion/Determination*

Less-than-significant impacts would occur during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

**(d) *Result in other emissions (such as those leading to odors) adversely affecting a substantial number of people?***

#### **Determination: NO IMPACT**

#### *Construction and Operational Impacts*

The occurrence and severity of odor impacts depend on numerous factors, including the nature, frequency, and intensity of the source; wind speed and direction; and the presence of sensitive receptors. While offensive odors rarely cause any physical harm, they can be unpleasant, can lead to distress, and can generate complaints to local governments and regulatory agencies.

Potential sources of odors that may be emitted during construction include exhaust from construction equipment, materials handled on-site, or emission from ground disturbance. However, due to the distance to the nearest sensitive receptors (a single residential unit approximately 750 feet from the northerly Project boundary), the highly diffusive properties of diesel exhaust, and the minimal work and excavation in proximity to them, the receptors are not anticipated to be affected by odors from Project construction. In addition, there are no substantial number of people in the vicinity of the Project. No Impacts are anticipated.

#### *Conclusion/Determination*

No impacts would occur during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.4. Biological Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) 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 or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(b) Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(c) Have a substantial adverse effect on State- or Federally-protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(d) Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

## Discussion

- (a) *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 or U.S. Fish and Wildlife Service?*

### **Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

#### *Construction Impacts*

The Project site and surrounding area are dominated by agricultural land uses which typically do not contain high-quality habitat that supports a substantial number of candidate, sensitive, or special-status species. In addition, the southerly portion of the Project site is adjacent to a commercial/industrial area. The northerly portion of the Project area, however, contains Cottonwood Creek, an aquatic feature under regulatory jurisdiction of the U.S. Army Corps of Engineers (USACE), CDFW and Regional Water Quality Control Board (RWQCB). Cottonwood Creek could provide habitat for sensitive-status species and could contain seasonal wetlands and riparian habitat supported by ephemeral flows. These and other areas of the Project site with appropriate soil profiles also have potential to provide suitable habitat for special-status vernal pool species. An initial screening of the USFWS Information for Planning and Consultation (IPaC) was conducted. The IPaC results revealed that a total of 10 species, including Fresno kangaroo rat [*Dipodomys nitratoides exilis*] San Joaquin kit fox (SJKF) (*Vulpes macrotis mutica*] blunt-nosed leopard lizard (BLNN) (*Gambelia silus*] California tiger salamander (*Ambystoma californiense*] monarch butterfly (*Danaus plexippus*] valley elderberry longhorn beetle (*Desmocerus californicus dimorphus*] conservancy fairy shrimp *Branchinecta conservancy*, vernal pool fairy shrimp (*Branchinecta lynche*] and two plant species—fleshy owl's-clover (*Castilleja campestris ssp. succulenta*] and hairy Orcutt grass (*Orcuttia pilosa*]—have the potential to occur in the vicinity of the Project (USFWS, 2023a). The potential direct and indirect impacts of construction on these special-status plant species, which are regionally rare and of limited distribution, would be significant. This potential impact can be reduced to a less-than-significant level with implementation of the Project-specific mitigation measures. The proposed mitigation measures are consistent with the mitigation measures in the California High-Speed Train: Merced to Fresno Section Final Project EIR/Environmental Impact Statement (EIS) (CHSRA 2012). Therefore, construction impacts related to 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 the USFWS would be less than significant with mitigation incorporated.

#### *Operational Impacts*

Impacts during operations are not expected to have adverse effects on special-status plants. In the case construction impacts to the vernal pool wetland known to support hairy Orcutt grass and with potential to support other special-status plants cannot be avoided, all the special-status plants at this location would be directly impacted by the construction of the tracks and none would remain. If, however, special-status-plants in this area were flagged and avoided, once developed, this area would be fenced and off limits to the public, and no other infrastructure or operational activities would occur here. The habitat for special-status species in this area would therefore remain in its current state following development and largely protected from future operational impacts. Operational impacts of the Project on special-status plant species are therefore considered less than significant.

### *Conclusion/Determination*

Construction impacts would likely be less than significant with Project-specific mitigation measures, therefore, a further detailed evaluation of this sub-topic is required and will be provided in the "Biological Resources" chapter of the EIR.

- (b) ***Have a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations, or by the California Department of Fish and Wildlife or U.S. Fish and Wildlife Service?***

### **Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

#### *Construction Impacts*

The construction of the Project would not result in any impacts to riparian habitat because no such habitat exists within the Project Footprint. The proposed bridge would be constructed over Cottonwood Creek, but the closest riparian woodland habitat is 50 to 100 feet downstream in the channel from the Project Footprint and therefore could be impacted. A vernal pool wetland at the north end of the Project Footprint is considered a sensitive natural community and classified as a Northern Claypan Vernal Pool (Sawyer and Keeler-Wolf 1995) or Fremont's goldfields- *Downingia* vernal pools (CNPS 2020) but this vernal pool would not be affected by the Project's construction, however, anthropogenic seasonal wetlands that would be affected by construction of the Project are not considered a sensitive natural community or jurisdictional waters of the United States. Therefore, construction impacts would occur related to a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the CDFW or the USFWS.

#### *Operational Impacts*

The riparian habitat in Cottonwood Creek that is upstream and downstream of the Project Footprint would remain undeveloped and unaffected by future operations of the Project. Therefore, operational impacts would not occur related to a substantial adverse effect on any riparian habitat or other sensitive natural community identified in local or regional plans, policies, or regulations or by the CDFW or the USFWS.

### *Conclusion/Determination*

Construction impacts would have potentially significant impacts without mitigation measures. Therefore, further detailed evaluation is required and will be provided in the "Biological Resources" chapter of the EIR.

- (c) *Have a substantial adverse effect on State- or Federally-protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction Impacts*

The Project would build a new bridge over Cottonwood Creek. Excavating, digging, and heavy equipment working within Cottonwood Creek would result in temporary and permanent impacts to non-wetland Waters of the U.S.; similar construction activity at the vernal pool location could degrade and destroy the pool, which would result in permanent direct impacts to a federally-protected wetland, and permanent hydrological alterations could result in the loss of this feature entirely. The impacts to Cottonwood Creek and the vernal pool would be a significant impact.

If direct impacts to these protected features cannot be avoided by protecting them within an environmentally sensitive areas or an ERA, mitigation can be accomplished by purchasing credits from existing mitigation banks that provide credits for vernal pool wetlands and, if needed, for other Waters of the U.S.

Mitigation shall be at least 1:1 for the actual impact (calculated by area per as-built construction drawings and the results of the preconstruction plan surveys]. Implementing these mitigation measures would reduce construction impacts on protected wetlands and Waters of the U.S. to less than significant by protecting the creek channel and the vernal pool wetland in an ERA during construction, or by implementing compensatory mitigation to offset impacts. Therefore, construction impacts related to a substantial adverse effect on federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means would be less than significant with mitigation incorporated.

*Operational Impacts*

Impacts of future operation of the Project are not expected to have adverse effects on federally protected wetlands that differ substantially from conditions that would be present after the station is constructed. Operational impacts of the CAHSR service on federally protected wetlands are therefore considered less than significant. Therefore, no operational impacts would occur related to a substantial adverse effect on federally protected wetlands (including, but not limited to, marsh, vernal pool, coastal, etc.) through direct removal, filling, hydrological interruption, or other means.

*Conclusion/Determination*

Impacts would be less-than-significant during operations. Construction impacts would likely be less than significant with Project-specific mitigation measures, therefore, a further detailed evaluation of this sub-topic is required and will be provided in the "Biological Resources" chapter of the EIR.



- (d) *Interfere substantially with the movement of any native resident or migratory fish or wildlife species or with established native resident or migratory wildlife corridors, or impede the use of native wildlife nursery sites?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction Impacts*

While the CAHSR EIR/EIS (CHSRA 2012) does not identify Cottonwood Creek as one of the important or major wildlife corridors in the region, it is the only established native resident or migratory wildlife corridor that crosses the Project area. The creek is mapped as an ephemeral or intermittent drainage, so its creek bed is often dry, and the channel from the top of bank on each side, including the upland/riparian vegetation, is 250-foot wide. Activities associated with the construction of the bridge have the potential to temporarily disrupt wildlife from utilizing the channel during the hours of construction. There is feasible mitigation that can ensure that wildlife would still be able to utilize the channel as a viable movement corridor, by delineating and marking the creek as an environmentally sensitive area, minimizing work in the channel as much as possible by restricting work during certain times during the day and night, and by training workers on the mitigation measures designed to protect species using this corridor.

Direct impacts to this wildlife corridor would be temporary because the new completed crossing would be elevated and allow unimpeded wildlife movement. However, indirect impacts could occur from construction activities such as lighting, noise, motion, and other startle effects if these activities were to occur in the vicinity of Cottonwood Creek, and they could result in indirect and temporary disruption of wildlife movement. Other temporary but direct impacts could occur across the entire Project area from the placement of barriers during construction which would affect the ability of wildlife to move across the Project area and potentially move off the Project area after being displaced by construction activities such as digging or grading with heavy equipment. Temporary direct impacts could also potentially affect wildlife in adjacent habitats by interfering with movement patterns or by causing wildlife to temporarily avoid areas adjacent to the construction areas. These impacts would be temporary and minor, given that the Project area is not a major movement corridor for wildlife, and are therefore considered less than significant.

*Operational Impacts*

Impacts of future operation of the Project are not expected to have effects on wildlife movement that differ substantially from conditions that would be present after the station is constructed. Therefore, no operational impacts would occur that would 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.

*Conclusion/Determination*

Impacts would be less than significant during operations. Construction impacts would likely be less than significant with Project-specific mitigation measures, therefore, a further detailed evaluation of this sub-topic is required and will be provided in the "Biological Resources" chapter of the EIR.

*(e) Conflict with any local policies or ordinances protecting biological resources, such as a tree preservation policy or ordinance?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction Impacts*

As described below, with mitigation construction of the Project would not conflict with any known local policies or ordinances and would be consistent with provisions of the City of Madera Code of Ordinances (City of Madera, 2024) and Madera County General Plan (Madera County, 2015) for protecting wetland communities and related riparian areas (Goal 5.D), fish and wildlife habitat (Goal 5.E) and vegetation (Goal 5.F). The following policies within these goals are relevant to this Project:

- **Policy 5.C.2** - The County shall minimize sedimentation and erosion through control of grading, cutting of trees, removal of vegetation, placement of roads and bridges, and use of off-road vehicles. The County shall discourage grading activities during the rainy season, unless adequately mitigated, to avoid sedimentation of creeks and damage to riparian habitat.
- **Policy 5.D.2** - The County shall require new development to mitigate wetland loss in both regulated and non-regulated wetlands through any combination of avoidance, minimization, or compensation. The County shall support mitigation banking programs that can provide the opportunity to mitigate impacts to rare, threatened, and endangered species and/or the habitat which supports these species in wetland and riparian areas.
- **Policy 5.E.10** - Prior to approval of discretionary development permits involving parcels within a significant ecological resource area, the County shall require, as part of the environmental review process, a biotic resources evaluation of the sites by a qualified biologist. The evaluation shall be based upon field reconnaissance performed at the appropriate time of year to determine the presence or absence of rare, threatened, or endangered species of plants or animals. Such evaluation will consider the potential for significant impact on these resources and will either identify feasible measures to mitigate such impacts or indicate why mitigation is not feasible.
- **Policy 5.F.2** - The County shall require developers to use native and compatible non-native species, especially drought-resistant species, to the extent possible in fulfilling landscaping requirements imposed as conditions of discretionary permit approval or for Project mitigation.
- **Policy 5.F.4** - The County shall ensure that landmark trees are preserved and protected.
- **Policy 5.F.5** - The County shall establish procedures for identifying and

preserving rare, threatened, and endangered plant species that may be adversely affected by public or private development projects.

- **Ordinance 4-6.01 Approved Trees** - Except as hereinafter provided, from and after July 1, 1965, no tree or trees shall be planted or transplanted on public property or rights-of-way or planted on private property so as to hang over public property except those trees designated upon an approved street tree list as specified by resolution of the Council. In the event any person desires to plant a tree within a public right-of-way, or which may overhang a public right-of-way, which tree is not upon the approved street tree list, such planting may be permitted if authorized by the Director of Parks and Community Services. The Director of Parks and Community Services shall not issue any such permit unless he or she finds and determines that such tree is of a variety having desirable characteristics with regard to surface roots, disease, falling leaves, and other qualities pertinent to the maintenance of preferable street trees in the city.
- **Ordinance 4-6.02 Tree Replacement** - Whenever it becomes necessary to remove a tree to prevent damage to sidewalks or curbs, or to remove a dying, dead, decayed, diseased, or hazardous tree, such tree or trees shall be removed by the owner of the property abutting that portion of the public right-of-way where the tree is located; provided, however, upon removal thereof, the property owner shall replace the tree with a tree of an approved type as designated on the approved street-tree list unless the area from which the tree was removed is no longer suitable for planting. Nothing in this section, however, shall preclude the removal by city forces of any tree without the request of a property owner.
- **Ordinance 4-6.04 Unsafe Trees** - Any trees or shrubs growing in a public parking strip or in any public place or in private property, which trees or shrubs are endangering, or which in any way may endanger, the security or usefulness of any public street, sewer, sidewalk, or the full and safe operation of public utility wires, are declared to be a public nuisance, and the Director of Code Enforcement may require the property owner to remove or trim any such tree on private property or on a parking strip abutting upon such owner's property.

There are project-specific mitigation measures that can be implemented for the Project to ensure consistent with these goals and policies. Therefore, impacts would be less than significant with mitigation.

### *Operational Impacts*

The Project would not conflict with plans and ordinances related to biological resources during operations as it would not disturb natural areas. Therefore, no impacts are anticipated.

### *Conclusion/Determination*

Construction impacts would have potentially significant impacts without mitigation measures. Therefore, a further detailed evaluation of this sub-topic is required and will be provided in the "Biological Resources" chapter of the EIR.

### ***(f) Conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan?***

### **Determination: NO IMPACT**

The Project would not conflict with a draft or adopted habitat conservation plan, natural community conservation plan, or other approved local, regional, or State habitat conservation plan, as none exist for Madera County. Therefore, no construction or operational impacts would occur related to conflict with the provisions of an adopted Habitat Conservation Plan, Natural Community Conservation Plan, or other approved local, regional, or State habitat conservation plan.

### *Conclusion/Determination*

No impacts would occur during construction or operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.5. Cultural Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Cause a substantial adverse change in the significance of a historical resource pursuant to <i>CEQA Guidelines</i> § 15064.5?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to <i>CEQA Guidelines</i> § 15064.5?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(c) Disturb any human remains, including those interred outside of formal cemeteries?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) *Cause a substantial adverse change in the significance of a historical resource pursuant to CEQA Guidelines § 15064.5?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

##### *Construction and Operational Impacts*

Cultural resources include historic buildings and structures, historic districts, historic sites, prehistoric and historic archaeological sites, and other prehistoric and historic objects and artifacts. The term "historical resource" is used in CEQA and includes both archaeological and built environment cultural resources. The term "historic-age built environment cultural resource" refers to buildings, structures, objects, sites, landscapes, and historic districts that are 45 years and older.

Research conducted for this report included a search of the California Historic Resources Information System (CHRIS) database and the California Native American Heritage Commission (NAHC) Sacred Lands File. One previously-evaluated built resource, a segment of the BNSF corridor (formerly, the Atchison, Topeka, and Santa Fe Railway [P-20-002662]), is located adjacent to the larger station site and was found to be historically significant under National Register of Historic Places (NRHP) Criterion A and California Register of Historic Resources (CRHR) Criterion 1 for its importance as the second transcontinental railroad route. However, the evaluations concluded the resource lacked sufficient historic integrity to physically convey its significance. The resource was not eligible for listing in the NRHP or CRHR and is not a historical resource for the purposes of CEQA (SJPA, 2021). The Area of Potential Effect (APE) will be modified to include project elements associated with Phase 3, therefore, additional analysis is required to determine if cultural resources including historic buildings and structures, historic districts, historic sites, prehistoric and historic archaeological sites, and other prehistoric and historic objects and artifacts would be impacted during construction activities. Therefore, there is the potential for cultural resources to be damaged or destroyed during Project construction, and a significant impact could occur. Mitigation measures would reduce potential impacts to a less-than-significant level. During operations, the trains would

remain within the right of way and maintenance would not disturb historic resources. Therefore, no impacts would occur during operations.

*Conclusion/Determination*

No impacts would occur during operations. Construction impacts would be less-than-significant with mitigation measures incorporated, and therefore, further detailed evaluation is required and will be provided in the "Cultural Resources" chapter of the EIR.

**(b) Cause a substantial adverse change in the significance of an archaeological resource pursuant to CEQA Guidelines Section 15064.5?**

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction Impacts*

Due to the history of the site, past disturbances, and lack of resources discovered as part of the past evaluations for cultural resources, it is unlikely that archaeological resources are located within the Project site. Although it is not anticipated that any archaeological resources exist, there is the potential for unknown resources to be present. If unknown resources do exist and they are damaged or destroyed during Project construction or operation, a significant impact could occur. Mitigation measures would reduce potential impacts to a less-than-significant level.

*Operational Impacts*

Subsurface and ground disturbances would not occur during Project operations. Therefore, no impacts would occur that would cause a substantial adverse change in the significance of an archaeological resource pursuant to *CEQA Guidelines* Section 15064.5.

*Conclusion/Determination*

No impacts would occur during operations. Construction impacts would be less-than-significant with mitigation measures incorporated and, therefore, further detailed evaluation is required and will be provided in the "Cultural Resources" chapter of the EIR.

**(c) Disturb any human remains, including those interred outside of formal cemeteries?**

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction Impacts*

There are no known archaeological resources, no known human remains, and no formal cemeteries within the Project site. Although it is not anticipated that any human remains exist, there is the potential for unknown buried remains to be present. If such remains do exist and they are damaged or destroyed during Project construction, a significant impact could occur. Mitigation measures would reduce potential impacts to a less-than-significant level.

*Operational Impacts*

There are no known archaeological resources, no known human remains, and no formal cemeteries within the Project site. Although it is not anticipated that any human remains exist, there is the potential for unknown buried remains to be present. However, if such remains do exist, they would not be damaged or destroyed during Project operation since no additional ground disturbances would occur. Therefore, no impact could occur.

*Conclusion/Determination*

No impacts would occur during operations. Construction impacts would be less-than-significant with mitigation measures incorporated and, therefore, further detailed evaluation is required and will be provided in the "Cultural Resources" chapter of the EIR.

## 2.6. Energy

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Result in 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"/>
(b) 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"/>

### Discussion

- (a) ***Result in potentially-significant environmental impact due to wasteful, inefficient, or unnecessary consumption of energy resources, during project construction or operation?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

Appendix F of the *CEQA Guidelines* requires consideration of the potentially-significant energy implications of a project. CEQA requires mitigation measures to reduce "wasteful, inefficient, and unnecessary" energy usage (*Public Resources Code* § 21100, subdivision [b][3]). According to Appendix F of the *CEQA Guidelines*, the means to achieve the goal of conserving energy include decreasing overall energy consumption, decreasing reliance on natural gas and oil, and increasing reliance on renewable energy sources. In particular, the Project would be considered "wasteful, inefficient, and unnecessary" if it were to violate State and Federal energy standards and/or result in significant adverse impacts related to Project energy requirements, energy inefficiencies, or energy intensiveness of materials; cause significant impacts on local and regional energy supplies or generate requirements for additional capacity; fail to comply with existing energy standards; or otherwise result in significant adverse impacts on energy resources, or conflict or create an inconsistency with an applicable plan, policy, or regulation.

#### *Construction Impacts*

Construction of the Project would require the temporary use of fuels and energy needed to power construction equipment, machinery, tools, trucks, and worker vehicles for commuting to and from the Project site. Use of these fuels and energy would be limited to the duration of the construction period. Diesel fuel would primarily be needed for road-hauling trips and off-road construction diesel equipment (e.g., scrapers, blades, dozers, backhoes, etc.). In addition, materials such as steel, concrete, and asphalt would require energy for the manufacturing process and transport to the Project site. The Project also would use energy for temporary electric power from a generator(s) or tie into existing electrical lines during construction for lighting and electric equipment (such as computers inside temporary construction trailers, and heating, ventilation, and air conditioning).

#### *Operational Impacts*



The CHSRA intends to utilize renewable energy for operations of the trains. If this proposed sustainability goal is not available for the initial operation of the trains, the Project would be connected to the overall power structure and supply for the entire HSR project, which has already been cleared in the HSR environmental documents. Operational energy for other elements of the Project such as safety lighting, building lighting, and other similar uses is anticipated to be negligible.

As a result, the Project is anticipated to result in less than significant impacts related to Project energy requirements or energy use inefficiencies, or result in a wasteful or inefficient use of energy.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

#### ***(b) Conflict with or obstruct a State or local plan for renewable energy or energy efficiency?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction and Operational Impacts*

CARB recently adopted the 2022 CARB Scoping Plan, which sets forth a sector-by-sector roadmap for California to achieve carbon neutrality by 2045 or earlier and outlines a technologically feasible, cost-effective, and equity-focused path to achieve the State's climate target. The 2022 Scoping Plan recognizes three previous scoping plans, including the 2017 Scoping Plan that focused on specific greenhouse gas (GHG) reduction targets for the industrial, energy, and transportation sectors. The 2022 plan expands the focus with additional goals for carbon neutrality through the continued reduction of fossil fuel use and also discusses sustainable options for walking, biking, and public transit to reduce reliance on vehicle use. The 2022 Scoping Plan also recognizes that the targets set forth in the 2017 Scoping Plan for 2030 are now interim but important stepping stones along the critical path to the broader goal of deep decarbonization by 2045 (CARB, 2022).

Accordingly, the 2017 Scoping Plan remains valid, as it defines a path with tools to reach reduction goals that are still in use and will remain in use. The 2017 Scoping Plan identified that the transportation sustainability sector is a key area for strategies to reduce fossil fuel consumption. CARB called for encouraging public transit use and increasing public transportation opportunities in efforts to decrease fossil fuel demand from light-duty combustion vehicles (CARB 2017). The 2017 Scoping Plan also called for supporting local and regional governments to develop and implement HSR station area plans as a means to encourage vibrant communities and reduce vehicle miles traveled (VMT).

The Project supports these efforts, as it supports the uses that have been previously planned and approved as part of the Madera Station Relocation Project, including the Phase 1 elements and previously-approved HSR improvements in Phase 2. These projects were developed with the intent and anticipation to increase ridership and reduce VMT by inducing a mode shift from personal automobiles to public transit. This is consistent with Policy 4 ("To Transform to a Clean and Energy Efficient Transportation System") of the 2018 California State Rail Plan. Accordingly, the Project is consistent with both these plans, as it would reduce VMT in the region (Caltrans 2018). Therefore, the Project would be consistent with the energy conservation measures and strategies identified in the 2017 Scoping Plan and 2018 California State Rail Plan.

Additionally, the Madera County Transportation Commission ("Madera CTC"] 2018 Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS) includes goals and strategies to improve regional transportation system efficiency and optimize public transportation in efforts to encourage public transit use and reduce vehicle-trips and VMT. The Project would be consistent with the energy conservation strategies of the 2018 RTP/SCS, as the Project is a means to increase ridership levels by facilitating expanded HSR service at the station, allowing for greater ridership potential and transit connectivity.

The Project would increase ridership, reduce traditional transportation fuel consumption associated with personal automobile vehicle-trips, and support the use of renewable energy for electric power for HSR train service, and would not conflict with State or local plans for renewable energy or energy efficiency. Therefore, Project construction and operation would have a less-than-significant impact related to conflict with or obstruction of a State or local plan for renewable energy or energy efficiency. The Project would likely have beneficial impacts related to energy conservation.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

## 2.7. Geology, Soils, and Paleontological Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:				
(1) 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 checked="" type="checkbox"/>	<input type="checkbox"/>
(2) Strong seismic ground shaking?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(3) Seismic-related ground failure, including liquefaction?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(4) Landslides?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) Result in substantial soil erosion or the loss of topsoil?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(c) Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(d) Be located on expansive soil, as defined in Table 18-1-B of the <i>Uniform Building Code</i> (1994), creating substantial direct or indirect risks to life or property?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(e) Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(f) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

## Discussion

(a) *Directly or indirectly cause potential substantial adverse effects, including the risk of loss, injury, or death involving:*

(1) *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.*

### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project is located within Madera County. There are no active or potentially active faults of major historic significance within Madera County. According to the Madera County General Plan (Housing Element] and California Department of Conservation (DOC), the Madera County does not lie within an Alquist-Priolo Special Studies Zone for surface faulting or fault creep (Madera County Housing Element 2015 and DOC 2023). The closest potentially active fault is the Clovis Fault approximately 22 miles southeast of the Project site.

Due to the distance of the Project site to the nearest fault and lack of an identified Alquist-Priolo fault zone, construction and operation of the Project would not expose people or structures to adverse effects caused by the rupture of a known fault or exacerbate the potential effects of fault rupture. Implementation of the Project would not result in the placement of any structures that would cross or be located on or adjacent to an Alquist-Priolo fault zone or any other known fault. In addition, no construction activities such as excavation, trenching, boring, or piling would disturb fault areas or exacerbate the potential for fault rupture. Thus, construction and operational impacts related to potential substantial adverse effects (including the risk of loss, injury, or death) involving rupture of a known earthquake fault would be less-than-significant, and no additional analysis is required in the EIR.

### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

(2) *Strong seismic ground shaking?*

### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

Seismicity in Madera County varies greatly between two major geologic provinces. The Central Valley, where the Project is located, is an area of relatively low tectonic activity and is bordered by mountain ranges to the east and west. The nearest faults to the Project site are the Clovis Fault approximately 22 miles to the southeast and two unnamed quaternary faults to the west. Although the Project site could experience ground shaking from activity on these faults, movements on larger regional faults such as the San Andreas Fault approximately 67 miles to the west or other faults within and south of the San Francisco Bay Area also could affect the Project site.

The Project does not include any habitable structures or other development that would substantially increase the on-site population resulting in substantial adverse risks or

exacerbation of the effects of seismic ground shaking. Accordingly, the Project does not include elements that would increase the risk of seismic ground shaking and it would not affect a known fault.

Final design of the Project would be based on and include recommendations and design and engineering standards from the geotechnical report that would evaluate the maximum-level of earthquake vibrations that could be experienced at the Project site. The geotechnical report would identify appropriate building techniques and design parameters to prevent damage to foundations and other structures. Adherence to the requirements contained in the geotechnical report and conformance with appropriate building techniques and design standards would minimize the effects of strong seismic ground shaking.

All Project elements would be constructed in accordance with applicable Federal transportation standards and the *California Building Code*. Furthermore, because the Project is not located near or adjacent to any known fault or seismic shaking hazard, neither construction nor operation of the Project could exacerbate the potential for a seismic event to occur that could affect the Project or Project site.

Therefore, construction and operational impacts related to exposing people or structures to strong seismic ground shaking would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

### **(3) *Seismic-related ground failure, including liquefaction?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

Liquefaction describes the phenomenon where soil loses its supportive strength and becomes incapable of bearing the load of overlaying soils or structures. Liquefaction occurs during earthquake conditions in saturated, relatively loose, sandy soils located near the ground surface. Soil types in Madera County generally are not conducive to liquefaction because they are either too coarse in texture or too high in clay content. These types of soils reduce the potential for liquefaction. The Project also is a substantial distance from known active fault zones, and the intensity of any anticipated ground shaking and the underlying soils and depth to groundwater further reduce the potential for liquefaction.

According to the U.S. Department of Agriculture (USDA) Natural Resources Conservation Service (NRCS) Web Soil Survey, the Project site is underlain by Atwater loamy sand (AwA), Alamo clay (AsA), San Joaquin sandy loam (SaA), and San Joaquin Whitney sandy loam (ScB) (USDA 2023). There is a lesser area underlain by Hanford fine sandy loam (HbA). Except for Alamo clay, these soils are all classified as moderately- to well-drained and consist of loam, sand, and sandy loams. The typical soils profile of Alamo clay is clay layers and compacted soil to approximately 30 inches in depth and sandy loam beyond. According to the California Department of Water Resources, groundwater monitoring service groundwater levels taken in March and October of 2022 and March of 2023 from the two nearest water wells approximately two miles from the Project site had depths to groundwater of 170 and 190 feet

below ground surface (bgs) (DWR, 2023). In general, the groundwater table in the Project area has fluctuated between 150 and 300 feet bgs (DWR 2020).

Because the Project is in a low- to moderately-active seismic region, there is some potential for seismic-related ground failure, but the probability of soil liquefaction in the area is considered a low to moderate hazard.

Prior to final design, a site-specific geotechnical study would be prepared, as required by the *California Building Code* (Title 24 of the *California Code of Regulations*). The geotechnical study will be used to determine the appropriate design features and construction measures that would be necessary to minimize potential adverse effects associated with seismic-related ground failure, including liquefaction. The geotechnical study will include requirements and measures that will be incorporated into the Project design and engineering, and all new structures would be constructed to meet all applicable Title 24 seismic safety regulations.

Thus, considering the existing soils, the depth to groundwater, and the development of design requirements based on the geotechnical study, construction and operational impacts related to seismic-related ground failure would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

#### **(4) Landslides?**

##### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project site is not identified by the United States Geological Survey (USGS 2023) United States Landslide Inventory as an area with potential risk of landslide(s). The Project site and surrounding areas are flat and do not contain slopes that would be susceptible to landslides. The Project site also is not located adjacent to an area with steep terrain, any hillsides, or other areas with substantial slopes that would be susceptible to landslides such that they would affect construction or operation of the Project. The Project site varies in elevation by approximately one foot east to west and approximately 20 feet north to south over a distance of more than two miles. Thus, the Project would not directly or indirectly create or exacerbate the risk of exposure to landslides, nor expose people or structures to a substantial hazard. Therefore, considering the surrounding flat terrain, construction and operational impacts related to landslide-related hazards would be less-than-significant.

*Conclusion/Determination* Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

#### **(b) Result in substantial soil erosion or the loss of topsoil?**

##### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project site is flat, and as discussed in Section 2.7(a)(3) and Section 2.7(a)(4), the elevation changes within the site and surrounding area are minimal. According to the USDA Web Soil Survey, the erodibility of on-site soils both for water- and wind-related erosion ranges from very low to high depending on the soil classifications. Soils with a higher clay content and a reduced capacity for drainage, such as the Alamo series, would be more susceptible to erosion. Approximately seven percent of the overall Project area contains Alamo soil, while the balance of the on-site soils have a low potential for erodibility (USDA 2023).

Removal of vegetative ground cover, excavation, grading, and other activities that expose soils during construction would increase the potential for wind or water erosion. If exposed soils are not protected from wind or water erosion through stockpiling, covering, revegetation, watering, application of soil stabilizers, or other means, the topsoil and other bare soils could erode and result in impacts to nearby properties and water quality and the loss of higher-value surface soil.

The Project would not require major grading or excavation that would substantially change existing topography, create or remove naturally occurring slopes, or create retaining walls, or make other land modifications outside of ordinary construction practices or that would substantially increase exposure to erosive forces. Nevertheless, grading and earthwork, if not properly managed during construction, could expose soils to potential short-term erosion by wind and water.

The Project would comply with the State Water Resources Control Board (SWRCB) National Pollutant Discharge Elimination System (NPDES) General Permit during construction. Under the NPDES, a Storm Water Pollution Prevention Plan (SWPPP) would be prepared and would identify potential sources of erosion or sedimentation, as well as identify and require the implementation of best management practices (BMPs) to minimize the effects of erosion. BMPs would include physical barriers to erosion. BMPs could include, but would not be limited to, using sandbags (to slow runoff and allow sediments to settle) and silt fences (to capture sediment), covering stockpiles to prevent erosion, providing retention basins, conducting street sweeping, etc. All such measures would be detailed in an erosion control plan that would be developed and approved by Madera County prior to issuance of any grading permits and subsequent initiation of construction. Conformance to these requirements and verification by Madera County as part of the development approval process would ensure that potential impacts from construction are less-than-significant. Conformance to these requirements would reduce the potential for materials to wash off the Project site, affect adjacent areas, or affect downstream receiving waters.

Once operational, the Project would include both impermeable surfaces (including concrete and other hardscapes used in parking lots, driveways, roadways, and walkways) and permeable surfaces (such as landscaped areas). The Project would comply with all applicable Federal, State, and local laws, ordinances, and regulations related to post-construction runoff. This would include applicable engineered ground improvements such as detention and retention basins to retain and control stormwater runoff. These features also encourage water infiltration, reduce downstream runoff, and enable settlement of sediments before discharge from the Project site. Installation and maintenance of BMPs would be detailed in an implementation plan and would help ensure that impacts are reduced to less-than-significant levels.

### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

- (c) *Be located on a geologic unit or soil that is unstable, or that would become unstable as a result of the project, and potentially result in on- or off-site landslide, lateral spreading, subsidence, liquefaction, or collapse?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

Project improvements would be constructed in areas that are relatively flat with little to no slope, where groundwater is generally 150 to 300 feet bgs (DWR 2020] and is not in proximity to any active faults or known geologic units that are unstable. The Project is not situated on a geologic unit or soils that are prone to landslides or liquefaction, nor would the Project improvements exacerbate the potential for landslides or liquefaction.

Land subsidence is the gradual settling or sinking of an area with little or no horizontal motion due to changes taking place underground. Although it is a natural process, it can also occur and can be accelerated as a result of human activities such as groundwater pumping; oil and gas extraction from underground reservoirs; dissolution of limestone aquifers (sinkholes); collapse of underground mines; drainage of organic soils; initial wetting of dry soils, etc. The Project does not propose groundwater withdrawals and the Project does not include any elements or uses such as residential, commercial, or industrial uses that would result in a substantial increase in groundwater withdrawal from any aquifers. Similarly, the Project does not propose extraction of oil and/or gas from underground reservoirs that could exacerbate the potential for subsidence. The Project site has not been used for mining and there are no mines near the Project site that could increase the potential for subsidence.

Collapse can occur if near-surface soils vary in composition both vertically and laterally. Strong ground shaking from earthquakes can cause non-uniform compaction of the soil strata, resulting in movement of the near-surface soils and collapse. As discussed above, the Project is not located on a geologic unit or soil that is unstable or that would become unstable as a result of construction or operation of the Project.

A geotechnical report will be prepared for the Project and will identify on-site soils, depth to groundwater, and other conditions that could cause the site to be susceptible to landslide, lateral spreading, subsidence, liquefaction, or collapse. The geotechnical report will include required elements of the *California Building Code* (Title 24 of the *California Code of Regulations*) and will prescribe appropriate design features and construction measures to minimize potential adverse effects related to seismic-related ground failure, including liquefaction. The geotechnical study will include requirements and measures that would be incorporated into the Project design and engineering.

Thus, the Project would not exacerbate the potential for lateral spreading, subsidence, liquefaction, or collapse. In addition, adherence to all applicable regulations and conformance with applicable building codes as part of the Project design and any conditions of approval would ensure that construction and operational impacts would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.



- (d) *Be located on expansive soil, as defined in Table 18-1-B of the Uniform Building Code (1994), creating substantial direct or indirect risks to life or property?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

Expansive soils are generally associated with silt and clay soils which are subject to shrinking and swelling due to the large pore volume and the fact large changes in moisture content during dry and wet periods can affect their ability to support overlying structures. Expansive soils need not be located throughout a site, as variations in subsurface soils beneath different parts of a structure resulting in shrinking and swelling of soils can cause damage or failure of portions of foundations, utilities, and pavements in localized areas. More specifically, during periods of high moisture content, expansive soils under foundations can heave and result in structures lifting. In dry periods, the same soil can lose strength, collapse, and result in settlement of structures. According to the USDA Web Soil Survey, a portion of the Project site is located within an area mapped as Alamo clay, which is poorly drained. The balance of the soil within the Project site is well- to very-well-drained (USDA 2023).

To meet Madera County's design standards for grading and to comply with the *California Building Code*, a site-specific evaluation in the geotechnical report for soil conditions would be prepared prior to construction, as discussed above. This evaluation would identify recommendations for ground preparation and earthwork specific to the Project site and would become an integral part of the Project design. The geotechnical report would be prepared to identify site-specific areas and magnitudes where expansive soils could occur, and appropriate building techniques (such as treating soil with lime to reduce expansive characteristics or excavating expansive soil and replacing with clean fill dirt) would be proposed to prevent damage to foundations related to this hazard. Thus, the construction and operational impacts related to expansive soils-hazards, creating substantial direct or indirect risks to life or property would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

- (e) *Have soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems where sewers are not available for the disposal of wastewater?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

Sanitary waste would be generated by the restroom and storage room facilities that would be constructed as part of the previously-approved Madera Station Relocation Project. The Madera HSR Station Full-Build Project consists of additional platform, track, parking/access, and related improvements and does not include uses that would increase the demand for the planned on-site wastewater treatment system (OWTS) that was included in the 2021 IS/MND for the Madera Station Relocation Project. As part of those earlier phase of the station, the OWTS would be constructed in accordance with the Local Agency Management Program (LAMP) for Madera County and would likely use a septic tank connected to either seepage pits or leach lines, depending on the site location. The OWTS would be designed and constructed based on soil testing and located within the Project site to facilitate proper infiltration and treatment of waste. This would ensure proper percolation of wastewater and provide appropriate groundwater protection.

With the implementation of BMPs, as well as compliance with building regulations and site-specific recommendations to address on-site soil conditions, the severity of construction and operational impacts on soils incapable of supporting the use of septic tanks would be reduced substantially. Therefore, construction and operational impacts on soils incapable of adequately supporting the use of septic tanks or alternative wastewater disposal systems would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

*(j) Directly or indirectly destroy a unique paleontological resource or site or unique geologic feature?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

The Project is in an area that has moderate to high paleontological sensitivity and is underlain by mid- to late-Pleistocene deposits. These areas consist of three stratigraphic units from top to bottom: the Modesto Formation, the Riverbank Formation, and the Turlock Lake Formation, the last of which is highly sensitive for paleontological resources. Fossils have been recovered from the Turlock Lake Formation elsewhere in Madera County at depths of 40 feet below ground surface.

Construction activities associated with the Project would result in excavation for foundations, footings, retaining walls, and borings for structure support. According to the 2021 IS/MND prepared and approved for the Madera Station Relocation Project, the area in the vicinity of the Project site is known to have yielded paleontological resources in the past at a depth of 40 feet below the surface. The excavation depths anticipated for this part of the Project would not likely affect those resources, but because the Project is in an area with high paleontological sensitivity, construction may encounter unknown paleontological resources.

To minimize construction impacts, it is anticipated that the Project would include measures requiring training for construction crews to better recognize paleontological resources; periodic monitoring during construction; stopping work if paleontological resources are discovered; evaluation of resources by a qualified paleontologist; and, as appropriate, implementation of a recovery plan. These measures would reduce the Project's potentially-significant construction impacts on unique paleontological resources to less-than-significant levels.

Operations of the Project would not directly or indirectly result in the destruction of a unique paleontological resource. Operational activities of the Project generally include standard maintenance and cleaning of the facilities and track. These activities do not have the potential to destroy any paleontological resources since they do not involve excavation of the earth. Therefore, operational impacts related to paleontological resources would be less-than-significant.

*Conclusion/Determination*

Operational impacts would be less-than-significant. Impacts would be potentially less-than-significant with mitigation incorporated during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Geology, Soils, and Paleontological Resources" chapter of the EIR.

## 2.8. Greenhouse Gas Emissions

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Generate greenhouse gas 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"/>
(b) Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) *Generate greenhouse gas emissions, either directly or indirectly, that may have a significant impact on the environment?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

Project construction would result in greenhouse gas (GHG) emissions that are thought to play a critical role in determining the Earth's surface temperature. A portion of the solar radiation that enters Earth's atmosphere is absorbed by the Earth's surface, and a smaller portion of this radiation is reflected back toward space and ends up "trapped," resulting in a warming of the atmosphere. This phenomenon, known as the "greenhouse effect," is responsible for maintaining a habitable climate on Earth. GHGs are present in the atmosphere naturally, are released by natural sources, and are formed from secondary reactions taking place in the atmosphere.

Construction of the Project would release GHGs, but operation of the project will substantially reduce GHGs through diversion of automobile trips and plane flights to rail trips and the HSR system will operate on renewable electricity and the operational GHG reductions would be much larger than the construction GHG emissions, resulting in a substantial reduction of GHG emissions. The Project would therefore have a beneficial effect related to GHG emissions.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

- (b) *Conflict with an applicable plan, policy, or regulation adopted for the purpose of reducing the emissions of greenhouse gases?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

In 2006, California passed the California Global Warming Solutions Act of 2006 (Assembly Bill [AB] 32; *California Health and Safety Code*, Division 25.5, § 38500 et seq.). AB 32 requires that statewide GHG emissions be reduced to 1990 levels by 2020. In December 2008, CARB adopted its Climate

Change Scoping Plan, which contains the main strategies California will implement to achieve the required GHG reductions required by AB 32 (CARB 2008).

In 2016, the State Legislature passed Senate Bill (SB) 32, which established a 2030 GHG emissions reduction target of 40 percent below 1990 levels. In response to SB 32 and the companion legislation of AB 197, CARB approved its 2017 Scoping Plan Update, which draws from the previous scoping plans to present strategies to reach California's 2030 GHG reduction target.

It should be noted that, based on AB 32 and SB 32, future laws and policies are anticipated to be introduced that would inform requirements of future development related to emissions standards, as well as inform the development of future scoping plans. Thus, it is assumed that any future requirements or policies formulated under the mandate of AB 32 and SB 32 that would be applicable to the Project, either directly or indirectly, would also be implemented.

The currently applicable CARB scoping plan is the 2022 Scoping Plan, which was recently adopted. The 2022 Scoping Plan sets forth a sector-by-sector roadmap for California to achieve carbon neutrality by 2045 or earlier, and outlines a technologically feasible, cost-effective, and equity-focused path to achieve the State's climate target. The 2022 Scoping Plan recognizes three previous scoping plans, including the 2017 Scoping Plan that focused on specific GHG reduction targets for our industrial, energy, and transportation sectors. The 2022 plan expands the focus with additional goals for carbon neutrality through the continued reduction of fossil fuel use and also discusses sustainable options for walking, biking, and public transit to reduce reliance on vehicle use. The 2022 Scoping Plan also recognizes that the targets set forth in the 2017 Scoping Plan for 2030 are now interim but important stepping stones along the critical path to the broader goal of deep decarbonization by 2045 (CARB, 2022).

The Project would comply with goals and implementation strategies set forth in the 2017 Scoping Plan as well as the longer-term 2022 Scoping Plan. It should be noted that while both these plans include some measures that would address GHG emissions levels associated with construction activity—including phasing in cleaner technology for diesel engine fleets (including construction equipment), the development of a Low Carbon Fuel Standard, and encouragement and implementation of opportunities to expand rail—successful implementation of these measures would predominantly depend on the development of future laws and policies at the State level.

Thus, while the 2022 Scoping Plan did not include as many elements directly relatable to the Project itself, the 2017 Scoping Plan, to which the Project is responsive, identifies GHG reduction strategies and actions in six key sectors: low carbon energy, industry, transportation sustainability, natural and working lands, waste management, and water (CARB 2017). Within the transportation sustainability sector, CARB called for encouraging public transit use and increasing public transportation opportunities in efforts to reduce GHG emissions from light-duty combustion vehicles (CARB 2017). The 2017 Scoping Plan also called for supporting local and regional governments to develop and implement HSR station area plans as a means to encourage vibrant communities and reduce vehicle miles traveled (VMT). The Project is anticipated to have substantial potential to increase ridership and reduce VMT by inducing a mode shift from personal automobiles to public transit. Thus, the Project is expected to reduce VMT from personal vehicles in the region and the associated GHG emissions. Furthermore, as an effort to meet the goals of AB 32 to reduce statewide GHG emissions, the *California Building Standards Code* established the *California Green Building Standards Code* ("CALGreen"). CALGreen encourages sustainable construction practices and building design in the categories of planning and design, including energy efficiency.

In addition, the Madera County Transportation Commission ("Madera CTC"] 2018 Regional Transportation Plan/Sustainable Communities Strategy (RTP/SCS) includes goals and strategies to improve regional transportation system efficiency and optimize public transportation in efforts to encourage public transportation and reduce vehicle trips and VMT. The Project would be consistent with the 2018 RTP/SCS and would facilitate expanded HSR service and increased ridership by adding another station platform.

The Project would implement improvements to the Madera HSR Station and would facilitate goals and objectives of both the 2018 RTP/SCS and the 2018 California State Rail Plan, including reducing GHG emissions by integrating local, regional, and intercity transit services. Therefore, Project construction and operation would have a less-than-significant impact related to conflicts with applicable plans, policies, or regulations adopted for the purpose of reducing GHG emissions.

*Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

## 2.9. Hazards and Hazardous Materials

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) 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"/>	[X]	<input type="checkbox"/>
(b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(c) 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 type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(d) Be located on a site which is included on a list of hazardous materials sites compiled pursuant to <i>Government Code</i> § 65962.5 and, as a result, would create a significant hazard to the public or the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(e) For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public-use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(f) Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	[X]	<input type="checkbox"/>
(g) 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"/>

### Discussion

- (a) *Create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials?*

#### Determination: LESS-THAN-SIGNIFICANT IMPACT

Hazardous materials are listed by Federal, State, or local agencies based on the materials' characteristics and their potential to cause harm or damage. A hazardous material is defined by the

*California Code of Regulations* (CCR) as a substance that, because of physical or chemical properties, quantity, concentration, or other characteristics, may either [1] cause an increase in mortality or an increase in serious, irreversible, or incapacitating, illness, or (2) pose a substantial present or potential hazard to human health or environment when improperly treated, stored, transported, or disposed of, or otherwise managed (CCR, Title 22, Division 4.5, Chapter 10, Article 2, § 66260.10). Hazardous materials are commonly used in commercial and industrial applications and, to a limited extent, in residential areas.

Both the U.S. Environmental Protection Agency (USEPA) and the U.S. Department of Transportation (USDOT) regulate the transport of hazardous waste and material, including transport via roadways and highways. The USEPA administers permitting, tracking, reporting, and operational requirements established by the Resource Conservation and Recovery Act (RCRA). The USDOT regulates the transportation of hazardous materials through implementation of the Hazardous Materials Transportation Act (HMTA). The HMTA administers container design and labeling, and driver training requirements. These established regulations are intended to track and manage the safe interstate transportation of hazardous materials and waste. Additionally, State and local agencies enforce the application of these acts and provide coordination of safety and mitigation responses in the case of accidents involving hazardous materials.

### *Construction Impacts*

Construction activities associated with the Project would involve the routine transport, use, and disposal of hazardous materials (e.g., fuels, greases, solvents, paints, and lubricants). If improperly handled, used, or spilled, these materials could pose a significant threat to human health and safety or the environment.

The transport, use, and disposal of hazardous materials during construction is regulated and enforced by Federal and State agencies. Workers who handle hazardous materials are required to adhere to Occupational Safety and Health Administration (OSHA) and the California Division of Occupation Safety and Health ("Cal/OSHA") health and safety requirements. During construction, hazardous materials must be transported in accordance with the RCRA and USDOT regulations, stored in accordance with the Unified Program enforced by local Certified Unified Program Agencies (CUPAs), and disposed of in accordance with the RCRA and the CCR at a facility permitted to accept the waste.

The Project would comply with the State Water Resources Control Board (SWRCB) requirements for construction sites greater than 1 acre to prepare and implement a stormwater pollution prevention plan (SWPPP) during construction for coverage under the Construction General Permit. As detailed further in Section 2.10 (*Hydrology and Water Quality*), the SWPPP would require implementation of BMPs to minimize erosion but also would include measures to minimize potential effects of hazardous materials. The SWPPP would detail requirements for hazardous materials storage and soil stockpiles, inspections, maintenance, training of employees, and containment of releases to prevent runoff into existing stormwater collection systems or waterways.

Compliance with existing regulations is mandatory and conformance to these requirements during construction of the Project would minimize hazards to construction workers, the public, and the environment that could occur during routine transport, use, disposal, or accidental release of hazardous material(s). Accordingly, adherence to Federal and State regulations would reduce the risk of exposure to hazardous materials that would be used, transported, or disposed of during construction. As a result, construction would not create a significant hazard to the public or the

environment through the routine transport, use, or disposal of hazardous materials. Impacts would be less-than-significant, and mitigation is not required.

#### *Operational Impacts*

Operations of the Project would not result in a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials. Operational activities would include maintenance work, including the typical storage and periodic application of pesticides and herbicides for pest and vegetation management, as well as the storage and use of fuels, greases, lubricants, and solvents for use in machinery and equipment to ensure continued functionality of the proposed structures and facilities. The routine transport, use, and disposal of these materials could result in the exposure of workers, the public, and/or the environment to hazardous materials if the materials are not properly managed.

The transport, use, and disposal of hazardous materials, including those that would be needed during operation, are regulated and enforced by Federal and State agencies. Workers who handle hazardous materials are required to adhere to OSHA and Cal/OSHA health and safety requirements, which limit potential exposure of workers to hazardous materials by requiring appropriate administrative or engineering controls. Pesticide use for vegetation removal near the tracks would be required to comply with California Department of Pesticide Regulations laws and regulations, which are intended to protect human health and the environment. Hazardous materials must be transported in accordance with RCRA and USDOT regulations; managed, stored, and used in accordance with the Unified Program enforced by local CUPAs; and disposed of in accordance with the RCRA and the CCR at a facility permitted to accept the waste.

Thus, adherence to Federal and State regulations and the Unified Program reduces the risk of exposure to hazardous materials. Compliance with existing regulations and the Unified Program is mandatory; therefore, operations of the Project is not expected to create a hazard to the public or the environment through the routine transport, use, disposal, or accidental release of hazardous materials. Therefore, operational impacts that would create a significant hazard to the public or the environment through the routine transport, use, or disposal of hazardous materials would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less than significant during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) Create a significant hazard to the public or the environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction Impacts*

The Project has the potential to result in releases of hazardous materials from accidental disturbance and release of hazardous materials from contaminated soils. Although the Project site does not contain any known hazardous materials sites and would not disturb any locations with known spills, past application of pesticides and herbicides and aerially-deposited lead from vehicle travel along Avenue 12 may have resulted in the presence of contaminated soils. Ground



disturbance and other construction activities could result in the release of contaminants in these areas.

The Project site and vicinity also may contain perched groundwater lenses. Perched groundwater lenses occur as separate water-bearing layers that are not in hydraulic communication with each other (TRC, 2015) but may contain contaminants from previous use and application of agricultural chemicals such as pesticides and herbicides.

The southern limits of the Project site would be within the Avenue 12 right-of-way (ROW) which could contain aerially-deposited lead from vehicle operations along the roadway. Aerially-deposited lead is typically found within 30 feet of the roadway and within the first six inches of soil but may be found at greater depth (up to two to three feet) as well as areas under existing roadways (DTSC, 2016). Because these areas would be disturbed as part of the Project, workers could be exposed due to soil disturbance or removal of the roadways or roadway surfaces. If not properly managed, the disturbance of contaminated soils, including areas with perched groundwater, could result in exposure of construction workers or nearby members of the public via direct contact (dermal exposure or ingestion) with contaminated materials or via inhalation of fugitive dust. Additionally, potentially-contaminated soil, if exposed to wind or rain events, could be transmitted and affect off-site areas.

Thus, the Project could result in potential exposure of workers and the public to unknown hazardous materials and impacts would be significant. Although the discovery and disposal of these materials is well regulated, additional mitigation measures maybe required to reduce impacts to less than significant.

#### *Operational Impacts*

As discussed in Section 2.9(a) above, Project operation would include maintenance and repairs that would require use of common hazardous materials such as greases, fuels, lubricants, solvents, etc., for upkeep and cleaning of machinery, hardscape, landscaping, and other on-site features. However, none of the materials that would be used are considered acutely hazardous, and all use would be in compliance with State and Federal handling requirements. The Project also is focused on implementation of passenger rail (in this case, HSR) service, and not freight rail operations involving the transport of material goods or freight that frequently contain potentially hazardous substances.

The Project also would comply with the existing framework of Federal, State, and local regulations that are applicable to the storage, use, and disposal of hazardous materials. Compliance with these regulations would reduce the likelihood of accidental spill or releases due to mishandling or poor storage practices during Project operations. Thus, adherence to Federal and State regulations and the Unified Program enforced by the Madera County CUPA. The CUPA works to ensure that all businesses in Madera County handle, store, and dispose of hazardous materials and hazardous wastes in compliance with applicable laws and regulations in order to protect the health and environment of the citizens of Madera County (Madera County, 2023).

Compliance with existing regulations and the Unified Program is mandatory; therefore, operations of the Project would be managed to ensure it does not create a hazard to the public or the environment through the accidental release of hazardous materials. As a result, operational impacts that could create a significant hazard to the public or environment through reasonably foreseeable upset and accident conditions involving the release of hazardous materials into the environment are considered less-than-significant.

*Conclusion/Determination*

Impacts would be less than significant during operations. However, impacts during construction may require mitigation measures. Therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Hazards and Hazardous Materials" chapter of the EIR.

- (c) ***Emit hazardous emissions or handle hazardous or acutely hazardous materials, substances, or waste within one-quarter mile of an existing or proposed school?***

**Determination: NO IMPACT**

There are no schools within a quarter mile of the Project footprint. The nearest school is Madera Community College, approximately 0.75 miles to the west (Madera Community College, 2023), and the nearest public school is Cesar Chavez Elementary School, approximately 1.5 miles to the west (Madera Unified School District, 2023). Thus, the Project would not emit hazardous emissions or handle hazardous materials within a quarter mile of an existing school.

*Conclusion/Determination*

No construction or operational impacts related to emitting hazardous materials within a quarter-mile of an existing or proposed school would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (d) ***Be located on a site which is included on a list of hazardous materials sites compiled pursuant to Government Code § 65962.5 and, as a result, would create a significant hazard to the public or the environment?***

**Determination: NO IMPACT**

The Project is not located in an area that is on a list of hazardous materials sites compiled pursuant to *Government Code* § 65962.5 (DTSC, 2023). A search of the Hazardous Waste and Substances Sites (Cortese) List on the California Department of Toxic Substances Control (DTSC) website did find a Cortese site at 11272 Road 32, approximately 0.6 miles to the east of the southernmost portion of the Project alignment. This is the former MacGillis and Gibbs site that was used as a wood pole treatment facility and used solutions containing arsenic, chromium, copper, and pentachlorophenol (PCP) to treat wood. The site is under a DTSC cleanup program. Due to the distance from the Project site, the flat site gradient, the depth to groundwater, and the nature of the Project improvements, neither the proposed improvements nor operation of the Project would affect the MacGillis and Gibbs site, and there are no construction or operational impacts from the Project.

An online search of the SWRCB GeoTracker website (SWRCB, 2023) and the DTSC Hazardous Waste and Substances Site List on the EnviroStor website (DTSC, 2023) were also conducted. The searches revealed that there are no other listed hazardous materials sites within or adjacent to the Project site; thus, the risk of upset is minimal.

*Conclusion/Determination*

No construction or operational impacts related to being located on a site on a list of hazardous materials sites would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (e) *For a project located within an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public-use airport, would the project result in a safety hazard or excessive noise for people residing or working in the project area?*

**Determination: NO IMPACT**

The Project footprint is not within an airport land use plan and there are no public or public-use airports within two miles of the Project site. The nearest public-use airports are Madera Municipal Airport, approximately 5.5 miles to the northwest, and Sierra Sky Park Airport, approximately 7.5 miles to the southeast (AirNav, 2023a,b). Thus, the Project would not create an airport-related safety hazard or result in excessive noise from any airport operations that would affect people working on or using the Project.

*Conclusion/Determination*

No construction or operational impacts related to being located within an airport land use plan would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR

- (jj) *Impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Madera County Operational Area Emergency Operations Plan (MCOAEO) establishes emergency management organization, identifies policies and responsibilities, and establishes operational concepts and procedures required to mitigate an emergency or disaster affecting Madera County. The plan does not identify specific emergency evacuation routes (Madera County, 2010).

*Construction Impacts*

Construction and staging areas would predominantly occur within existing agricultural areas, within existing right-of way, and on adjacent properties that would be developed as part of other station development that was previously evaluated in the 2021 IS/MND prepared for the Madera Station Relocation Project. The Project includes some roadway-related improvements, and temporary interruptions in traffic flow and capacity would potentially occur, but the Project would include a traffic management plan during construction to ensure traffic flows are maintained, resulting in only minimal disruptions to traffic flows.

If emergency response is needed, access to the Project site during construction would use existing roadways (Avenue 12) and construction road(s) within the site. Project construction could result in limited and temporary road closures and potentially cause increased traffic congestion in areas where emergency vehicles may need to operate. Emergency vehicles traveling on streets that cross the railroad right-of-way could experience delays due to gate-down events at grade crossings. However, the duration of individual gate-down events would be unchanged from existing conditions.

Traffic control plans would address impacts related to access and emergency response, as described in Section 2.17 (*Transportation*). A traffic control plan would be prepared to help ensure Avenue 12

remains open during construction, would include flag men to control traffic, and would ensure bi-directional travel is available. If emergency response is needed, the traffic control plan would include measures to ensure that traffic flows remain open and accommodate emergency response needs.

Thus, the increase in traffic congestion is not anticipated to cause significant disruptions to emergency services or response and would be temporary in nature. Thus, while these improvements could potentially disrupt traffic during construction activities and interfere with emergency response or evacuation, the Project includes measures to minimize these effects. Therefore, Project construction impacts related to impedance of or interference with adopted emergency response plans or emergency evacuation plans would be less-than-significant.

### *Operational Impacts*

While operation of the Project would result in localized increases in vehicle traffic to access the train service, the roadway and access improvements included as part of the approved Madera Station Relocation Project would be sufficient to accommodate increased traffic associated with the Project. As discussed in Section 2.17 (*Transportation*), congestion from passengers using the roadways is not anticipated to cause delays to emergency response times. Additionally, emergency vehicles often identify and use multiple routes dependent on time of day and traffic conditions, and they could avoid peak-period traffic congestion in the vicinity of the Project. Due to the use of alternate routes when needed, the Project is not anticipated to result in substantial delays for emergency vehicles.

Overall, Project operation would not impair implementation of or physically interfere with an adopted emergency response plan or emergency evacuation plan. Therefore, impacts would be less-than-significant, and mitigation is not required.

### *Conclusion/Determination*

Impacts would be less than significant during construction and operation, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

**(g) *Expose people or structures, either directly or indirectly, to a significant risk of loss, injury, or death involving wildland fires?***

### **Determination: NO IMPACT**

The Project site is located within an area that has primarily been used for agricultural production, is surrounded by agricultural uses, is flat and level, and does not contain thick brush and vegetation, or have other characteristics that make it prone to substantial hazards from wildfire. The California Department of Forestry and Fire Protection ("CAL FIRE") provides fire hazard severity maps that rate areas as having a "very high", "high", or "moderate" fire hazard. Areas are designated as either State Responsibility Area (SRA) or Local Responsibility Area (LRA) (CAL FIRE, 2022). Based on review of the most recent maps from 2007, the entire Project site is within an LRA. All of the Project site north of Avenue 12 is "unzoned" in regard to wildfire hazard. The majority of the Project site south of Avenue 12 also is within an "unzoned" area, with a very small percentage falling within areas designated as a "moderate" fire hazard severity zone (CAL FIRE, 2007). At the time the 2007 maps were prepared, the land use conditions within the Project site and surrounding areas were similar to what they are now. Due to the nature of the existing land uses (agricultural production)

and minimal native vegetative growth, the Project site and surrounding areas are not particularly susceptible to wildfire.

All construction activities would be conducted in accordance with all requirements established by the County Fire Marshal's office, local jurisdictions, and other applicable fire code regulations to minimize risk of and exposure to wildfire. The Project does not include any habitable structures that, once constructed, would house people or visitors and expose them to an increased risk from fire hazards. Furthermore, all new facilities would be constructed and operated in compliance with applicable building code and fire code regulations as applicable. This would include installation of needed fire suppression systems (including sprinkler systems) and fire alarm systems, installation and maintenance of fire extinguishers, and use of fire-retardant building materials, as required by applicable codes. In addition, the Project would facilitate the installation of overhead HSR electrification equipment that would be constructed in compliance with the California Public Utilities Commission (CPUC) General Order No. 176, "Rules for Overhead 25kV AC Railroad Electrification Systems for High-Speed Rail System" (CPUC, 2015).

Overall, construction and operations of the Project would not occur within areas of high or very high wildland fire risk areas, and the Project would include design features to reduce the risk of fires. Therefore, no impacts related to wildland fires during both construction and operations of the Project would be less-than-significant.

#### *Conclusion/Determination*

No construction or operational impacts related to wildland fires would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.10. Hydrology and Water Quality

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) 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 type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:				
(1) Result in substantial erosion or siltation on- or off-site;	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(2) 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 checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(3) 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"/>
(4) Impede or redirect flood flows?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

## Discussion

- (a) *Violate any water quality standards or waste discharge requirements or otherwise substantially degrade surface or groundwater quality?*

### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction Impacts*

The Project would comply with State Water Resources Control Board (SWRCB) and regional requirements related to water quality. Construction activities including clearing, grubbing, excavation, and grading would disturb over one acre of soil and the Project would be required to obtain a National Pollutant Discharge Elimination System (NPDES) construction permit. The NPDES permit would be obtained through the SWRCB for Discharges of Storm Water Associated with Construction Activity (Construction General Permit Order 2009-0009-DWQ). Approvals would be granted by the Central Valley Regional Water Quality Control Board (CVRWQCB).

During Project construction, indirect impacts may result from grading and stockpiling soils upslope of the seasonal wetlands and vernal pool identified in the Project footprint (see Section 2.4 (*Biological Resources*)), leading to sediment transfer into the water column. To minimize the potential for water quality impacts, and in conformance with the General Permit, the Project would implement a Storm Water Pollution Prevention Plan (SWPPP). The SWPPP would identify the aforementioned sources of sediment and pollutants that could affect the quality of stormwater discharges. To minimize the effects, the SWPPP would include BMPs to reduce or eliminate sediment and other pollutants in stormwater discharges. More specifically, BMPs would address source control, pollutant control, and treatment control that would conform with standard Madera County construction BMPs. BMPs would include but not be limited to the following:

- Cover loose stockpiled construction materials (soils, spoils, aggregate, etc.).
- Store chemicals in watertight containers.
- Ensure that sediments on-site follow the California Stormwater Quality Association (CASQA) Construction BMP Guidance Handbook. This may include watering for dust control, placement of straw bales, and sediment basins.
- Schedule grading activities to occur between May 1<sup>st</sup> through Nov 30th, as much as possible.
- Control runoff through sediment basins, silt traps, or similar measures.
- Avoid slope construction steeper than 1:1 (1.5:1 for fills).
- Use mulching for temporary erosion control.

Since the Project would be required to comply with existing regulations and BMPs related to water quality standards, construction impacts related to a violation of any water quality standards or waste discharge requirements would not substantially degrade surface water quality.

Considerations related to water quality also include excavation for the placement of station structures, structural elements for the rail bridge at Cottonwood Creek, and the OCS pole foundations. Although the bridge footings would use cast-in-drilled-hole (CIDH) piles that are not expected to exceed 40 to 50 feet in depth (TRC, 2015), water quality impacts could occur if

groundwater, including within perched lenses, is encountered during excavation. However, the BMPs listed above would be sufficient to ensure impacts are less than significant.

Thus, construction impacts would not substantially degrade surface water quality, impact downstream receiving waters, or otherwise affect groundwater such that a violation of any water quality standards or waste discharge requirements would occur. With the implementation of the listed BMPs, as well as the site-specific grading/drainage plan and SWPPP, impacts would be less than significant.

#### *Operational Impacts*

The Project would introduce new impervious surfaces that could increase the volumes of water runoff that, if not properly controlled, could increase stormwater and/or dry weather runoff, resulting in impacts to water quality. Impermeable surfaces would be created from the concrete HSR station platforms, the bridge over Cottonwood Creek, the expanded parking lot, the station siding track, the pedestrian bridge, and any potential expansion of the station building. If pollutants are released from these areas and are allowed to move off-site, downstream water quality could be affected.

Thus, given the potential for water quality impacts, the Project includes drainage-related design features such as drainage swales, retention/detention basins, and landscaped areas that would facilitate capture and/or infiltration of water runoff that are consistent with Best Management Practices. Use of these design features would minimize operational impacts related to water quality standards or waste discharge requirements. Thus, operation of the Project would not otherwise substantially degrade surface water quality. In addition, groundwater would not be encountered during operations of the Project. Therefore, less-than-significant operational impacts would occur related to a violation of any water quality standards or waste discharge requirements, or other substantial degradation in groundwater quality.

#### *Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) Substantially decrease groundwater supplies or interfere substantially with groundwater recharge such that the project may impede sustainable groundwater management of the basin?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction Impacts*

The Project is within the Madera Groundwater Subbasin which is a part of the larger San Joaquin Valley Groundwater Basin. The Sustainable Groundwater Management Act (SGMA) is a landmark law that empowers local agencies to sustainably manage groundwater within their jurisdiction and authorizes SWRCB intervention if local agencies are unable to do so. The Madera Subbasin Coordination Committee has created the Madera Subbasin Joint Groundwater Sustainability Plan that has generated a water budget to ensure the sustainable recharge of the groundwater aquifer.



Project construction would introduce temporary impervious surfaces including equipment and materials that would be stored on-site. Construction and storage of materials, however, would have minimal effects on the percolation of precipitation and overall recharge of the aquifer. In addition, construction activities would not require the use of or extraction of substantial volumes of groundwater. Some groundwater may be needed during construction for dust control and mixing of soils, but such activities would not require large volumes of water. Furthermore, the groundwater table traditionally fluctuates between approximately 150 and 300 feet from the ground surface and the maximum depth of excavation for footings would be 40 to 50 feet. Within the vicinity of the Project, there are some occurrences of perched water lenses, wherein reported groundwater is witnessed at levels between 3 and 27 feet below the ground surface.

In the event that construction encounters groundwater (if any), dewatering may be necessary. The Madera Subbasin Ground Surface Management plan water budget allows for an overall extraction of 697,697 acre-feet per year (Davids Engineering and Luhdorff and Scalmanni 2018). Given the scale of the Project, which would have a marginal impact on the overall annual water budget for the Madera Subbasin, there would be a comparatively less-than-significant impact related to groundwater withdrawal from or recharge of the Madera Subbasin.

Therefore, construction impacts related to a substantial decrease in groundwater supplies or substantial interference with groundwater recharge would be less-than-significant and the Project would not impede sustainable groundwater management of the basin.

#### *Operational Impacts*

The Project consists of station and station access improvements to facilitate expanded operation of HSR service. The Project does not include uses such as residential, commercial, or industrial uses that would result in a substantial increase in demand for water, including groundwater. While the Project would introduce impermeable surfaces including station platforms and canopies, a pedestrian bridge, expanded parking, the Cottonwood Creek bridge, a new station siding track, and a potential expansion of the station building, the Project would result in minimal alterations to the overall permeability of the Project site and area. In addition, as discussed above, the Project would include retention/detention basins, landscaping, and other design features to facilitate capture of water and infiltration. Other elements such as landscaping and drainage features that would conduct runoff to permeable areas would be included as part of the Project design, further reducing impacts to recharge.

Thus, the increase in impervious surfaces due to the Project would have a minimal impact on the percolation of natural precipitation and the overall recharge of the Madera Subbasin. Furthermore, operations of the Project would not require the extraction of groundwater supplies, and no additional excavation requiring dewatering would be required post-construction. Therefore, operational impacts related to a substantial decrease in groundwater supplies or substantial interference with groundwater recharge would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

*(c) Substantially alter the existing drainage pattern of the site or area, including through the alteration of the course of a stream or river or through the addition of impervious surfaces, in a manner which would:*

*(1) Result in substantial erosion or siltation on- or off-site?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction and Operational Impacts*

Project construction would result in the removal of vegetation that acts as an erosion barrier. Grading and earthwork would result in minor modifications to the existing drainage patterns and, if not properly managed, could increase the likelihood of erosion or siltation. As discussed, in Section 2.10(c)(2), however, design elements for the new HSR rail bridge at Cottonwood Creek would be designed to ensure hydraulic capacity is able to prevent channel erosion or siltation. As such, while construction may alter drainage patterns, mitigation measures will be developed to ensure that there will be no substantial erosion or siltation on- or off-site.

*Conclusion/Determination*

Construction and operational impacts would potentially be less-than-significant with mitigation incorporated, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Hydrology and Water Quality" chapter of the EIR.

*(2) Substantially increase the rate or amount of surface runoff in a manner which would result in flooding on- or off-site?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

*Construction and Operational Impacts*

Like in Section 2.10(c)(1), construction processes may change the drainage patterns, which could potentially increase the rate or amount of surface runoff, possibly increasing the chance of on- or off-site flooding. However, BMPs described in Section 2.10(a), such as sediment basins, silt traps, and similar measures, would support the control of runoff, enabling mitigation of possible surface runoff. According to the California High-Speed Train Project EIR/EIS Merced to Fresno Section, Chapter 2.10 (Hydrology and Water Quality), placing at-grade sections on embankments with culverts adequately sized and placed would avoid intensifying flood or drainage problems. The new HSR rail bridge at Cottonwood Creek would be designed similar to the existing rail bridge constructed as part of the CHSRA Project, though it would be narrower as the new rail bridge would be only for a single track. The design of the bridge would maintain existing hydraulic capacity to prevent operational impacts on hydrology and prevent channel erosion and flooding. So long as the drainage patterns are being conducted to the same location, mitigation such as sediment basins, retention basins (identified in Section 2.7(b)), and similar measures will ensure that there is no significant modification to drainage patterns. Thus, even though the Project would change the complexion of the site, construction and operational impacts would not cause substantial impact to drainage patterns. In turn, the Project would have a less-than-significant impact in terms of increasing the rate or amount of surface runoff that could initiate flooding on- or off-site.

*Conclusion/Determination*

Construction and operational impacts would potentially be less-than-significant with mitigation incorporated, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Hydrology and Water Quality" chapter of the EIR.

- (3) ***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?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

As discussed in Section 2.10(a), the potential for polluted runoff may increase due to the combination of altered drainage patterns, increased impervious surfaces, and adjacent historical agricultural soils that may contain elevated concentrations of fertilizer, pesticides, and herbicides. However, it is unlikely that runoff water would exceed the capacity of existing or planned stormwater drainage systems, given the Madera Storm Water Resource Plan's efforts to reduce runoff volumes and pollutants in receiving waters (detailed in Section 2.10(e)). Furthermore, as detailed in Section 2.10(e), new stormwater drainage facilities, such as a full-capture system, within the Project footprint will ensure that construction and operations have a less-than-significant impact related to runoff water in excess of stormwater drainage system capacity or substantial additional sources of polluted runoff.

*Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (4) ***Impede or redirect flood flows?***

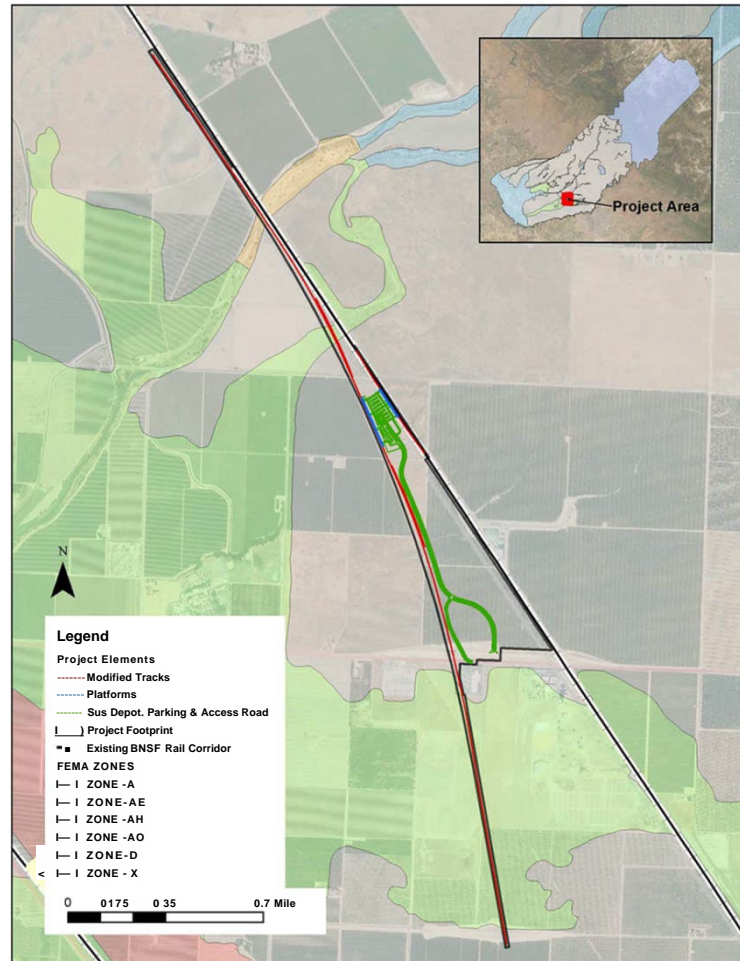
**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction Impacts*

Construction of the Project would partially occur in Federal Emergency Management Agency (FEMA)-designated Flood Zones X, AO, and AE (Figure 2.10-1). Flood Zone X is an area of minimal flood hazard, and the Project would therefore have no impact related to impeding or redirecting flood flows. Flood Zone AO is identified as an area subject to inundation by 1-percent-annual-chance of shallow flooding where average depths are between one to three feet. FEMA identifies Flood Zone AE as areas subject to inundation by the 1-percent-annual-chance flood event. Approximately 475 feet of at-grade guideway would be built on Flood Zone AO and 250 feet of the guideway, with both aerial and at-grade components, would be built on Flood Zone AE.

Construction elements that would potentially impede or redirect flood flows are related to the removal of vegetation that acts as an erosion barrier and the movement of earthwork that would potentially alter the drainage patterns. The Project would not alter any streams or rivers. As discussed in Section 2.10(a), construction would be regulated according to the requirements of the NPDES General Construction Permit through the Regional State Water Quality Board. SWPPP and BMPs would be utilized to prevent the impediment or redirection of flood flows. Therefore, construction impacts related to impeding or redirecting flood flows would be less-than-significant.

**Figure 2.10-1. FEMA Flood Zones**



Source: FEMA, 2017

### *Operational Impacts*

Operations of the Project would partially occur in FEMA-designated Flood Zones AO and AE (Figure 2.10-1). Approximately 475 feet of at-grade guideway would be built on Flood Zone AO and 250 feet of the guideway, with both at-grade and aerial components, would be operating on Flood Zone AE adjacent to Cottonwood Creek.

According to the California High-Speed Train Project EIR/EIS Merced to Fresno Section, Chapter 3.8 (Hydrology and Water Resources), placing at-grade sections on embankments with culverts adequately sized and placed would avoid intensifying flood or drainage problems. The first bridge at Cottonwood Creek associated with Phase 2 was environmentally cleared in the 2021 IS/MND, and will be designed similar to the existing rail bridge constructed as part of the CHSRA Project, although the Phase 2 bridge would only accommodate a single track and would therefore be narrower. This Project proposes an additional bridge over Cottonwood Creek and would be similar to the structure over Cottonwood Creek evaluated in the Madera Station Relocation IS/MND (SJPA 2021). The bridge design would maintain existing hydraulic capacity to prevent operational impacts on hydrology and prevent channel erosion and flooding.

The Central Valley Flood Protection Board (CVFPB) requires that stream crossings meet the provisions of Title 23 of the California Code of Regulations, wherein crossings must maintain stream channel flow capacity. In Zone AE areas, the County of Madera also requires certification by a registered civil engineer to demonstrate that the proposed development shall not result in any increase in flood levels during the occurrence of the base flood discharge. The design of the Cottonwood Creek Bridge would account for storm drain features so that they are adequately sized to prevent flooding or issues in drainage.

According to the Madera County Local Hazard Mitigation Plan (County of Madera 2017), conditions imposed on the development would protect the property at a 100-year level of protection consistent with the current Central Valley Flood Protection Plan or the FEMA standard of flood protection. Through State regulations on design standards, impacts on flood flows would be minimized. Therefore, operational impacts related to impeding or redirecting flood flows would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

#### ***(d) In flood hazard, tsunami, or seiche zones, risk release of pollutants due to project inundation?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction Impacts*

There are no impacts for the risk of release of pollutants due to Project inundation. The nearest tsunami zone to the Project is approximately 100 miles away in Monterey County. The Madera County General Plan has noted that seiches are not a great concern in Madera County and the closest known seiche hazard is approximately 140 miles away at Lake Tahoe (Madera County 2015). According to the Madera County General Plan, the Project is within the inundation zone of Hidden Dam, which is approximately 12 miles from the Project site. However, the County notes that dam failure is an unlikely occurrence due to routine monitoring and maintenance of the dam's structural integrity. As noted in Section 2.10(c)(4), the Madera HSR Station does not fall within a FEMA flood hazard zone.

However, portions of the Project's track improvements would fall within FEMA-designated Flood Zones AO and AE. Earthwork and grading activities would disturb existing soils that are potentially contaminated from previous uses in agriculture. The NPDES General Construction Permit would require implementation of BMPs including the management of soil stockpiles. Therefore, construction impacts related to the risk of release of pollutants due to inundation would be less-than-significant.

#### *Operational Impacts*

Portions of the Project's track improvements would fall within FEMA-designated Flood Zones AO and AE. Accidental release of hydrocarbons onto the guideway, related to the routine maintenance of the HSR locomotive, may result in additional pollutants released in an inundation. As discussed in Section 2.9(b), a robust Federal and State regulatory framework would make this impact less-than-

significant. Therefore, operational impacts related to the risk of release of pollutants due to inundation would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

**(e) Conflict with or obstruct implementation of a water quality control plan or sustainable groundwater management plan?**

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

Project construction and operation would not conflict or obstruct with implementation of water quality control plans or sustainable groundwater management plans set forth by State and regional authorities. The Project falls within the authority of the CVRWQCB. At a minimum, local water management plans comply with applicable thresholds to meet water quality standards. The Madera Storm Water Resource Plan coordinates stormwater management strategies for the entire county to reduce runoff volumes and pollutants in receiving waters. The Madera County General Plan also presents policies for water quality that are codified into law (County of Madera 2015). The Project would abide by water quality regulations promulgated by State and regional authorities, chiefly through compliance with the NPDES General Construction Permitting Process as discussed in Section 2.10(a), Section 2.10(c), and Section 2.10(d).

In March 2023, the Madera Subbasin Coordination Committee revised its January 2020 Joint Groundwater Sustainability Plan, under the Sustainable Groundwater Management Act of 2014. While Project construction may encounter groundwater and Project operations would introduce some impervious surface features that affect percolation, the Project would not significantly impact the water budget set forth by the Madera Subbasin Joint Groundwater Sustainability Plan. As discussed in Section 2.10(b), the Project's impacts are considered less-than-significant. Therefore, construction and operational impacts related to conflicting with or obstructing implementation of a water quality control plan or sustainable groundwater management plan would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during operations and construction and as such, further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.11. Land Use and Planning

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Physically divide an established community?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

### Discussion

#### (a) *Physically divide an established community?*

#### **Determination: NO IMPACT**

##### *Construction Impacts*

The majority of the Project would be constructed on undeveloped land north of Avenue 12. Most of the Project trackwork would be located immediately west of the CHSRA Project (i.e., the HSR mainline] currently under construction, with a portion of new track constructed adjacent to an existing industrial area south of Avenue 12. The nearest residential unit is approximately 750 feet east of the northernmost portion of the Project, and there are no established communities within or adjacent to the Project site. The Madera Community College Center is approximately 1.0 miles west of the Madera HSR Station site and is located on the north side of Avenue 12. The industrial uses are along the south side of Avenue 12 adjacent to proposed track locations and include two chemical plants and an electrical substation.

Physical divisions of established communities typically occur when a new use is developed between two areas and severs or reduces a connection between them. Projects that make travel between the residential areas more difficult can be considered to physically divide a community. The closest established communities are Parksdale (approximately 1.5 miles northwest of the Project site) and Trigo (approximately 2 miles to the southeast of the Project site), and the Project would not prevent or impede travel between or through these areas.

The Project would result in the acquisition of privately-owned land. Most of the Project area consists of existing agricultural land in a linear strip adjacent to an existing dirt road used to access the fields to the west. To the south of Avenue 12, the Project would be located on undeveloped privately-owned parcels zoned for industrial uses.

While the Project would result in disturbance within these areas, neither construction nor operation of the Project elements would affect any existing residential uses or disallow continued use of any businesses or private structures within the footprint or adjacent areas. The Project would include modifications to the Avenue 12 grade separation to allow the new west-side station siding track to pass beneath the roadway. Construction of this modification would result in temporary disruptions

or slowing of multimodal traffic flows along Avenue 12 but would not result in a physical division, and upon completion, unhindered flow along Avenue 12 would be restored.

All improvements within these areas and the Project's design features are sensitive to the existing surrounding uses, and the improvements would not decrease the viability of the uses. As discussed above, the Project would not result in a taking of any existing habitable structures, and although traffic flows would be modified as part of the overall Project, improvements would be made to ensure that ingress and egress from all existing adjacent uses are maintained. Thus, while the Project would result in acquisition of and change to the property, continued use and operation of the surrounding uses would not be substantially affected.

Given these factors, construction of the Project would not divide any established communities.

#### *Operational Impacts*

Operation of the expanded HSR service would include trains on the two mainline passing tracks, as well as the station siding tracks and storage tracks included as part of the Project or the already-approved Phase 2 improvements under the Madera Station Relocation Project. Given that Project operation would run adjacent to the BNSF corridor, and given the fact there are no established communities within or adjacent to the alignment, no communities would be divided. Rather, the Project would have a beneficial impact by providing greater ridership potential, increasing transit connectivity both locally and regionally, enhancing the potential for transit-oriented development [TOD] in the vicinity of the station, and improving access to/from SR 99 and the City and County of Madera.

#### *Conclusion/Determination*

No construction or operational impacts related to physically dividing existing communities would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) Cause a significant environmental impact due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

#### *Construction and Operational Impacts*

The Project is located approximately 0.75 miles east of Madera Community College, which is located southeast of the City of Madera within unincorporated Madera County. Development of the Project site and surrounding area is guided by the Madera County General Plan and Madera County Zoning Ordinance. In July 1995, the County adopted the Madera State Center Community College [SCCC] Specific Plan, and in 1998, the City adopted the SCCC Specific Plan. Both the County and City incorporated the SCCC Specific Plan into their General Plans, including their respective General Plan land use maps. As noted in the 2009 Madera County General Plan EIR, the SCCC Specific Plan was intended to guide development of the associated properties and was incorporated, unchanged, into the proposed Madera Land Use Policy Map.



**Figure 2.11-1. Project Environmental Footprint**



The SCCC Specific Plan applies to approximately 1,867 acres located immediately south of Avenue 13, north of Avenue 12, east of SR 99, and west of the BNSF railroad corridor, and includes the Project area. More specifically, the 1,867-acre SCCC Specific Plan envisioned that the Project area and immediate surroundings would be developed with residential, commercial, light industrial/business park, and professional office space uses.

It is important to note that the SCCC Specific Plan area immediately adjacent to the BNSF corridor near Avenue 12 was identified as a potential site for TOD. Since completion of the 2021 IS/MND, the Phase 2 site plans have been updated to reflect use of this area and support for TOD. Implementation of the Project, including the pedestrian bridge, is also directly supportive of this element. Overall, the SCCC Specific Plan provides considerable opportunity for future TOD in the vicinity of the Project and the Project supports this opportunity.

The boundaries of the adopted SCCC Specific Plan are also contiguous to the Madera State Center New Growth Area, which has a unique set of land use policies contained within the General Plan and is described later in this section (Madera County 1995, 2015). Finally, the SCCC Specific Plan established a set of land use designations which have been fully incorporated into the Madera County General Plan.

Land use designations contained in the Madera County General Plan that are within the Project footprint, including the subset of land use designations contained in the SCCCSpecific Plan, are shown in Figure 1.1.1-2 below, and include the following:

- Very Low Density Residential (VLDR);
- Low Density Residential (LDR);
- Open Space (OS);
- Public Institution (PI);
- Community Commercial (CC);
- Transit Station (TS);
- Agriculture Residential (AR), for areas of the Project Footprint north of Avenue 13 where trackwork will take place (outside of the SCCCSpecific Plan area);
- Heavy Industrial (HI), for areas of the Project Footprint north of Avenue 13 where trackwork will take place (outside of the SCCCSpecific Plan area);
- Agriculture (A), for areas of the Project Footprint in the vicinity of Avenue 11 where trackwork will take place (outside of the SCCCSpecific Plan area).

The Very Low Density Residential and Low Density Residential land use designations provide for single-family detached and attached homes, secondary residential units, bed-and-breakfast establishments, limited agricultural uses, and public and quasi-public uses (Madera County 2015).

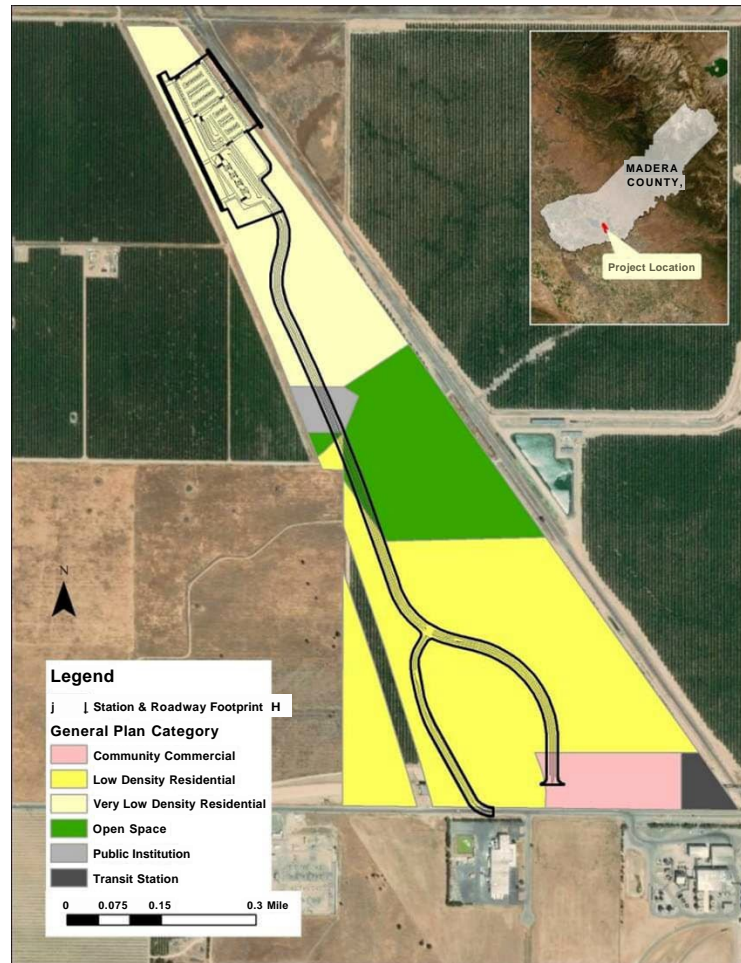
The Open Space land use designation provides for agricultural uses, agriculturally-oriented services, timber production, mineral extraction, airstrips, public and commercial refuse disposal sites, recreational uses, public and quasi-public uses, and similar and compatible uses and identifies areas typically unsuitable for human occupation due to public health and safety hazards or areas containing wildlife habitat and other environmentally-sensitive features (Madera County 2015).

The Public Institution land use designation provides for institutional uses such as colleges, schools, and hospitals, and the Community Commercial Institution land use designation provides for retail, wholesale, professional and administrative offices, and public and quasi-public uses (Madera County 2015).

The Agriculture Residential land use designation provides for single-family detached homes, secondary residential units, limited agricultural uses, public and quasi-public uses, and similar and compatible uses.

The Heavy Industrial land use designation provides for industrial parks, warehouses, manufacturing, airports and airstrips, outdoor theaters, public and quasi-public uses, and similar and compatible uses.

**Figure 2.11-2. General Plan Land Use Designations**



Source: County of Madera 2019

The majority of the Project area is zoned by the County as ARE-40 (Agricultural Rural Exclusive, 40-acre minimum) (Madera County 2020). The ARE-40 zoning district is intended to preserve agricultural lands (Chapter 18.53 of Title 18 in the *Madera County Municipal Code*) (Madera County 2020). This zoning designation was adopted for the purpose of avoiding a physical environmental effect on agricultural land (see Section 2.11 (*Land Use and Planning*) for further discussion of consistency with land use policies). The new station platform and additional parking areas would be on undeveloped land (Assessor's parcel numbers 047-070-022, 047-070-027, 047-070-026, and 047-070,023). Trackwork zoned as IH would not impact agricultural land.

The Madera County General Plan was adopted on October 24, 1995 by the Madera County Board of Supervisors. The primary purpose of the General Plan is to analyze local and regional conditions and needs to respond effectively to the problems and opportunities facing the community; define the community's environmental, social, and economic goals; record the local government's policies and standards for the maintenance and improvement of existing development and the location and characteristics of future development; and foster the coordination of community development and environmental protection activities among local, regional, State, and Federal agencies in Madera County.

In addition to the land use designations that apply to the Project footprint, the following Madera County General Plan goals and policies are applicable to the Project (Madera County 2015):

- **Goal 2.A:** To maintain a comprehensive and coordinated multimodal transportation system that enhances the mobility of people, improves the environment, and is safe, efficient, and cost effective.
  - **Policy 2.A.1.** The County shall encourage, where appropriate, development of an integrated, multi-modal transportation system that offers attractive choices among modes including pedestrian ways, public transportation, roadways, bikeways, rail, and aviation.
  - **Policy 2.A.2.** The County shall develop the transportation system to reduce vehicle miles traveled, conserve energy resources, minimize air pollution, and reduce greenhouse gas emissions.
  - **Policy 2.A.5.** The County shall require that land use form and transportation systems in designated new growth areas be designed to provide residents and employees with the opportunity to accomplish many of their trips within the new growth area by walking, bicycling, and using transit.
  - **Policy 2.A.6.** The County shall require that transportation systems and improvements planned and constructed in designated new growth areas provide links to transportation systems outside the new growth area and address impacts on transportation facilities outside the new growth area.
- **Goal 2.D:** To promote a safe and efficient mass transit system, including both rail and bus, to reduce congestion, improve the environment, and provide viable non-automotive means of transportation in and through Madera County.
  - **Policy 2.D.6.** The County shall encourage the development of facilities for convenient transfers between different transportation systems, (e.g., train-to-bus, bus-to-bus).
- **Goal 5.A:** To designate adequate agricultural land and promote development of agricultural uses to support the continued viability of Madera County's agricultural economy.
  - **Policy 5.A.5.** The County shall allow the conversion of existing agricultural land to urban uses only within designated urban and rural residential areas, new growth areas, and within city spheres of influence where designated for urban development on the General Plan Land Use Diagram.

The Project is consistent with all of these policies.

Building off of the SCCCSpecific Plan, Madera County is now in the midst of developing the Madera Transit Station Specific Plan (MTSP), encompassing over 2,000 acres around Madera Community College and the station. This new specific plan would create a framework for transforming this area into a vibrant, mixed-use neighborhood through TOD centered around the future station. The plan would include residential uses at various densities, as well as public, commercial, and employment-generating uses, and would help to ensure that potential development catalyzed by the new station is human-scaled and environmentally sustainable.

In 2018, the Madera County Transportation Commission approved the 2018 Regional Transportation Plan/Sustainable Communities Strategy (2018 RTP/SCS). The 2018 RTP/SCS ensures that the region's transportation system and implementation policies and programs safely and efficiently accommodate growth envisioned in the General Plan Land Use Elements of Madera County and the Cities of Chowchilla and Madera over a 20-year planning horizon (Madera County Transportation Commission 2018). The 2018 RTP/SCS includes goals, objectives, and strategies to improve mobility and to reduce travel demand, the growth in VMT, and associated GHG emissions. The 2018 RTP/SCS also includes projections for the location of growth in the region and estimates of changes in population, housing, and employment.

The Project, which is included in the 2018 RTP/SCS, would support the goal to promote intermodal transportation systems that are fully accessible, encourage quality and sustainable growth and development, support the region's environmental resource management strategies, and are responsive to the needs of current and future travelers. As discussed further below, the Project would also provide opportunities for transit services aligned with the existing and expected future growth of the City of Madera and Madera County.

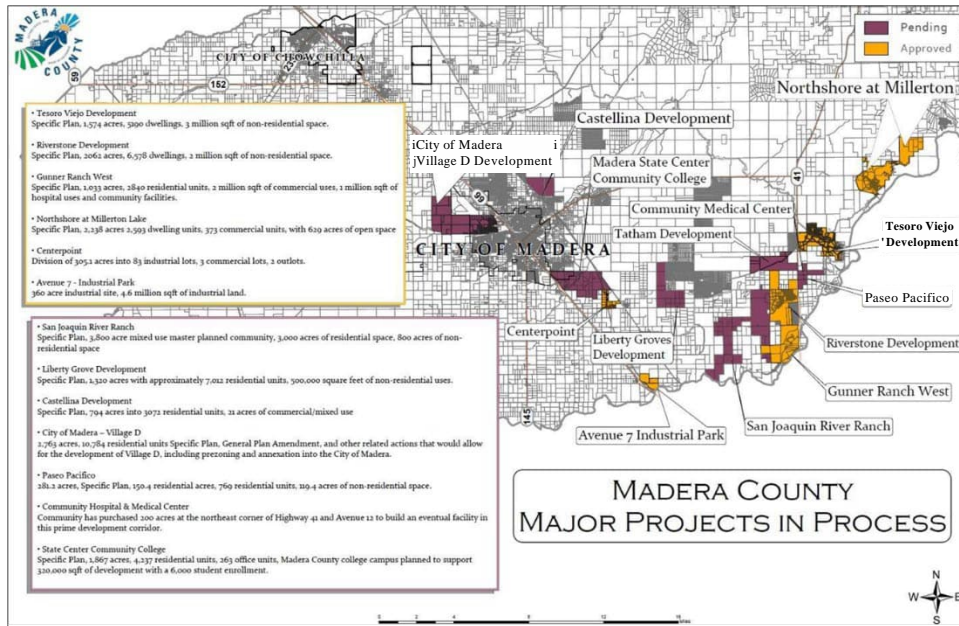
It should also be noted that any land use inconsistencies are not physical effects on the environment under CEQA unless they relate to potentially-significant physical impacts on other environmental resources. Impacts on other environmental resources are addressed in other environmental topic sections of this Initial Study. Therefore, construction or operational impacts due to a conflict with any land use plan, policy, or regulation adopted for the purpose of avoiding or mitigating an environmental effect would be less-than-significant.

In addition to the policies and land uses contained in the Madera County General Plan, the SCCC Specific Plan, and the 2018 RTP/SCS described above, there are numerous major development projects that are either approved or in the approval process within Madera County, with a majority of these located in the southern and eastern portions of the county (see Figure 1.1.1-3). Given this development pattern, a large percentage of the new growth in the county will be in close proximity to the Madera HSR Station. Major development projects that are located in the southeastern area of the county include Tesoro Viejo (5,190 residential units), Riverstone (6,578 residential units), Gunner Ranch West (2,840 residential units), Northshore at Millerton Lake (2,598 residential units), Liberty Grove (7,012 residential units), and Paseo Pacifico (769 residential units). Several of these developments also have significant commercial components. In addition, the aforementioned Madera State Center New Growth Area envisions 4,237 residential units (Madera County 1995, 2015b).

Accordingly, the location of the Project is consistent with the anticipated growth pattern and supports the future transportation needs of Madera County's growth areas by introducing an alternative mass transit use that would encourage reduced reliance on personal automobiles and provide another option for regional and long-distance travel needs.

Given this, expanded HSR service facilitated by the Project will increase the potential for HSR ridership growth on intercity and regional trips. Therefore, the Madera HSR Station Full-Build Project builds upon the previously-approved Phases 1 and 2 of the station to better serve Madera County and the surrounding region both on a local and regional scale.

**Figure 2.11-3. Development Projects in Process in Madera County**



Source: Madera County

In summary, the Project would not conflict with applicable land use plans, policies, or regulations adopted for the purpose of avoiding or mitigating an environmental effect, and the Project would support the goals and policies of the City of Madera General Plan, the Madera County General Plan, the SCCC Specific Plan, and the 2018 RTP/SCS.

*Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.12. Mineral Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) *Result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

In 1988, the State Mining and Geology Board (SMGB) designated sand and gravel resources in areas of regional significance throughout the state of California. The Project site is in the Fresno Production-Consumption ("P-C") Region, which encompasses Madera County. Within this area, all designated sand and gravel resources are within the floodplains of the San Joaquin and Kings rivers. Instream resources within the two rivers generally contain very small amounts of aggregate with far less than one percent of the reserves. In addition, no resources underlying designated lands within the Fresno P-C Region have been lost due to urbanization and other irreversible land uses since designation in 1988.

The California Department of Conservation (DOC) provides additional detail related to the locations and description of potential areas containing mineral resources. Lands are divided into one of four Mineral Resource Zones (MRZ-1 through MRZ-4). MRZ-1 for areas with little or no likelihood for presence of significant mineral resources; MRZ-2 for areas where significant mineral resources are present or have a high likelihood of presence; MRZ-3 for areas with an undetermined mineral resource significance; and MRZ-4 for areas with no known mineral occurrences but where geologic information cannot rule out the presence or absence of significant mineral resources.

The Project site is located in an MRZ-3 which is defined as an area in which the significance of resources cannot be evaluated from available data (DOC, 1998).

Because of the existing use of the Project site primarily for agricultural production, the long and linear shape of the site, and the existing and planned land uses surrounding the site, it would not be feasible to use the Project site for production of mineral resources. Furthermore, Project construction and operation would not result in the loss of availability of a known mineral resource that would be of value to the region and the residents of the state. Impacts would be less-than-significant.

*Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) Result in the loss of availability of a locally-important mineral resource recovery site delineated on a local general plan, specific plan, or other land use plan?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

The Project site is not on or within the vicinity of valuable mineral resources. The Madera County General Plan notes that the mineral resources in the county include aggregate (sand, gravel, and crushed stone), asbestos, copper, gold, iron, and silver. The General Plan also discusses the listed MRZs discussed in Section 2.12(a) above. Mapping of the MRZs in the General Plan is identical to the DOC mapping and places the Project site within an MRZ-3. The General Plan does not place any land use restrictions for areas designated as MRZ-3 (Merced County, 2013).

Therefore, Project construction and operation 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. Impacts would be less-than-significant, and mitigation is not required.

*Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.



## 2.13. Noise

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project result in:				
(a) Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
(b) Generation of excessive groundborne vibration or groundborne noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(c) For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public-use airport, would the project expose people residing or working in the project area to excessive noise levels?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

### Discussion

- (a) *Generation of a substantial temporary or permanent increase in ambient noise levels in the vicinity of the project in excess of standards established in the local general plan or noise ordinance, or applicable standards of other agencies?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

#### *Construction Impacts*

Project construction would result in a temporary increase in noise levels. Most construction equipment and activities would generate some level of noise, such as the installation of piles utilizing pile-driving equipment needed to build the new Cottonwood Creek Bridge.

Local noise ordinances that would be applicable to the Project include those adopted by the City of Madera and Madera County. Ordinances generally limit construction noise to particular times during weekday, weekend, and holiday daytime hours. Sunday and nighttime construction work are prohibited. Given the lack of significant sources of noise in the Project site, there is a potential for proposed construction activities to produce noise levels in excess of local standards. These potential significant impacts may be reduced to significant level with implementation of project-specific mitigation measures.

### *Operational Impacts*

Phase 2 operations at the Madera HSR Station as envisioned in the previously-approved Madera Station Relocation Project involve the removal of the eight daily roundtrips on the *San Joaquins* service (with these trains truncated at a new intermodal hub in Downtown Merced] and introduction of the HSR EOS service with 18 daily roundtrips. The Madera HSR Station Full-Build Project would allow for expanded HSR service, potentially including both trains serving the station and trains passing through the station. The amount of noise generated would typically vary depending on the type of train, with stopping trains typically generating less noise as part of decelerating, idling, and accelerating compared to non-stopping trains that pass through the station, typically at full speed.

The assessment of railroad operation noise considered noise from train, track, and stationary noise sources at the intersection with Avenue 12 and found that noise impacts would be less-than-significant. In that analysis, noise calculations were conservative, using the higher noise levels anticipated from the operation of diesel trains in Phase 1 than the quieter electric trains in Phase 2. As such, further operational noise analysis of the Project is required in the EIR, since there will be no use of diesel trains as part of the Madera HSR Station Full-Build Project. Existing noise-sensitive uses would be approximately one mile from the Project site, and the future noise-sensitive uses closest to the Project site would be at Madera Community College, located less than one mile to the west of the Project site.

Therefore, given the conservative noise estimates, operational impacts related to 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, would likely be less-than-significant.

### *Conclusion/Determination*

Operational noise impacts would be less than significant. Construction noise impacts would be potentially significant but could be reduced to a less than significant level with implementation of mitigation measures. Therefore, this subtopic will be analyzed further in the "Noise" chapter of the EIR.

#### ***(b) Generation of excessive groundborne vibration or groundborne noise levels?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

### *Construction Impacts*

Construction activities under the already-approved Madera Station Relocation Project could generate vibration levels (at 25 feet) of as high as 0.2 inches per second (in/s) peak particle velocity (PPV) (94 VdB) from compactors during site work and 0.09 in/s PPV (87 VdB) from bulldozers during rail and platform work. The nearest vibration-sensitive structure (a typical rural masonry building) is approximately one mile from these construction activities, which would generate groundborne vibration of approximately 0.0001 in/s PPV (24 VdB) at a distance of one mile. This level of vibration would be below the FTA impact threshold of 0.3 in/s PPV (Table 7-4 of the 2021 IS/MND noise technical study) for structural damage resulting from vibration, and excessive groundborne noise levels, therefore construction impacts would be less than significant.

It is anticipated that Project construction would have a less-than-significant impact related to groundborne vibration and groundborne noise levels.

#### *Operational Impacts*

Vibration caused by trains is caused by the wheels rolling on the rails. This energy is then transmitted through the track support system into the ballast, through the ground, to the foundations of nearby buildings, and finally throughout the remainder of the building structure. The level of vibration received at the building is a function of the train type and speed; the track system, structure, support, and condition; the distance from the tracks; the geological condition; and the receiving structure. Groundborne vibration typically does not annoy people who are outdoors.

The 2021 IS/MND for the Madera Station Relocation Project found that construction and operational impacts related to excessive vibration were less-than-significant. Impacts were assessed based on a comparison of the predicted Phase 2 vibration level with the FTA impact thresholds of 75 VdB for Category 2 land uses and 78 VdB for Category 3 land uses. Based on the vibration significance criterion, vibration-sensitive receptors along the Phase 2 track would not be exposed to perceptible vibration, and buildings would not be exposed to vibration levels causing possible structural effects.

It is anticipated that Project operation would have a less-than-significant impact related to groundborne vibration and groundborne noise levels.

#### *Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (c) *For a project located within the vicinity of a private airstrip or an airport land use plan or, where such a plan has not been adopted, within two miles of a public airport or public-use airport, would the project expose people residing or working in the project area to excessive noise levels?*

#### **Determination: NO IMPACT**

#### *Construction and Operational Impacts*

The Project footprint is not located within an airport land use plan. The closest airport, the Madera Municipal Airport, is located about 5.5 miles northwest of the Project footprint. Sierra Sky Park Airport, another public-use airport, sits approximately 7.5 miles southeast of the Project footprint (AirNav 2023a,b). Therefore, the Project footprint is not located within two miles of a public airport or public-use airport.

Because there are no airports nearby, the Project would not expose people residing or working in the Project area to excessive noise levels due to proximity to airport-related noise. Therefore, construction and operational impacts would be less-than-significant.

#### *Conclusion/Determination*

No construction or operational impacts related to noise from airports would occur, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented

in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.14. Population and Housing

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) 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"/>

### Discussion

- (a) *Induce substantial unplanned population growth in an area, either directly (for example, by proposing new homes and businesses) or indirectly (for example, through extension of roads or other infrastructure)?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction Impacts*

Construction of the Project is anticipated to last approximately 2 to 3 years and could have the potential to temporarily induce local population growth through the employment of workers during the construction period. The source of the construction labor force is unknown at this time, but the Project would be expected to draw from the existing local workforce in nearby urban centers including the cities of Madera and Fresno. Therefore, it is not anticipated that construction of the Project would cause substantial population growth or a substantial increase in housing demand in the vicinity of the Project or region as a whole.

Furthermore, if construction workers from outside the region were employed during the construction period, the temporary nature of the work suggests that it would be unlikely that non-local workers would permanently relocate to the area to work on the Project. This is typical for employees in the various construction trades.

Therefore, construction impacts related to inducing substantial unplanned population growth would be less-than-significant.

##### *Operational Impacts*

The Project site is southeast of the City of Madera in unincorporated Madera County, approximately one mile east of Madera Community College. The central portion of the Project footprint (where the station and supporting facilities are located) is within the adopted Madera SCCC Specific Plan boundary (see Figure 1.1.1-1). The land use designations in the SCCC Specific Plan have been

incorporated into the Madera County General Plan and allow for residential development in the planning area. To the east of the SCCCSpecific Plan area, the Project footprint is primarily bordered by land designated for agricultural uses (Madera County 2015a).

The Project could increase the attractiveness of developing the surrounding area, but current County land use policies have already identified where growth will occur in the immediate vicinity of the Madera HSR Station. While construction of a new transit station could potentially make surrounding land more attractive to development, expansion of transit service alone would not induce growth. Madera County regulates the levels of building intensity and population density according to the land use designations identified in the County General Plan and Zoning Ordinance (Title 18 of the *Madera County Municipal Code*).

The parcels immediately east of the Project footprint (excluding areas south of Avenue 12) are designated by the Madera County General Plan as Agriculture Exclusive (AE) and zoned by Madera County as ARE-40 (Agriculture Rural Exclusive, 40-acre minimum). The AE land use designation and the ARE-40 zoning district are intended to preserve agricultural lands. South of Avenue 12, the Project footprint is generally surrounded by land designated as Heavy Industrial, while in the vicinity of Avenue 11, it is surrounded by land designated as Agriculture (A) and zoned ARE-20 (Agriculture Rural Exclusive, 20-acre minimum). North of Avenue 13 the Project Footprint and the surrounding area to the west are designated as Agriculture Residential, which specifies a mix of farming and residential on minimum 10-acre lots (Madera County 2015a, 2020). Given these established land use policies in the vicinity of the Project footprint, the Project would not induce land use changes that would result in new or unplanned growth.

Madera County data indicate that a significant number of large developments already underway, as well as a significant amount of approved development as part of specific and area plans, are focused in the southeastern portion Madera County. Given this, much of the envisioned growth associated with these development projects is in the vicinity of the Project, which is also located in the southeastern portion of the county. Therefore, the positioning of the Project will enable it to support the transit needs of existing and planned development patterns rather than inducing unplanned growth. Refer to Section 2.11 (*Land Use and Planning*) for a more detailed analysis of the pending and approved development projects, including a map of these projects shown in Figure 1.1.1-3.

In summary, the Project is a regional transportation improvement that would facilitate expanded passenger rail service within and through the Central Valley and reduce reliance on personal automobiles. The Project would achieve this by serving both the expected and future planned growth of Madera County, including the higher levels of growth approved in the southeastern portion of Madera County (as compared to other areas of the county). Thus, the Project would not result in changes to existing land use policy or cause a redistribution of planned land uses that would induce unplanned population growth resulting in environmental impacts. Therefore, operational impacts related to inducing substantial unplanned population growth would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

*(b) Displace substantial numbers of existing people or housing, necessitating the construction of replacement housing elsewhere?*

**Determination: NO IMPACT**

*Construction and Operational Impacts*

The Project would be located on vacant, disturbed, and agricultural land where no housing exists. Therefore, the Madera HSR Station Full-Build Project would not displace housing or people. As such, construction and operations would have no impacts related to displacing substantial numbers of housing or people, necessitating the construction of replacement housing elsewhere.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.15. Public Services

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) 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, 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 checked="" type="checkbox"/>	<input type="checkbox"/>
(2) Police protection?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input 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"/>

### Discussion

The Project is located within unincorporated Madera County and would be primarily served through County services. In some emergency situations such as large-scale critical events or staffing shortages, however, some inter-agency coordination (e.g., with the City of Madera) could be employed in accordance with mutual aid agreements. Therefore, this section primarily evaluates the impacts to County of Madera public services, but in some instances, City services are considered. Table 2-2 below lists the nearest public service facilities within proximity to the Project site.

**Table 2-2. Public Services in Proximity to the Project Site**

Public service	Distance and direction from the Project footprint	
<b>Fire and emergency</b>		
Madera County Fire Station #1	3.0 miles	northwest
Madera County Fire Station #19	4.7 miles	northeast
City of Madera Fire Station #56	4.4 miles	northwest
<b>Police protection</b>		
City of Madera Police Department	4.1 miles	northwest
Madera County Sheriff's Department	7.2 miles	northwest
<b>Schools</b>		
Madera Community College	1.0 miles	west
Cesar Chavez Elementary School	1.8 miles	west
<b>Parks</b>		
Knox Park	3.4 miles	northwest
<b>Other services</b>		



<b>Publicservice</b>	<b>Distance and direction from the Project footprint</b>	
Madera Main Library	4.5 miles	northwest
Madera Community Hospital	3.3 miles	west
Westgate Manor Convalescent Hospital	5.1 miles	northwest

- (a) *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, 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:*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

**(1) Fire protection?**

The Madera County Fire Department provides fire protection services to the unincorporated areas of the county (including the Project site], operating out of 14 fire stations with a fleet of 56 apparatus and support vehicles (Madera County Fire Department, 2023a). Of these, the department has eight full-time fire stations staffed 24 hours per day with a minimum of 12 career firefighters on duty at one time. There also are 6 unstaffed fire stations supported by paid-call firefighters. Countywide, the department consists of 32 full-time career firefighters, 7 County support personnel, and 75 paid-call firefighters (Madera County Fire Department, 2023b)

The closest fire station to the Project site is Station #1, which is staffed full-time and is located at 14225 Road 28, approximately 3.5 miles northwest of the Project site. The station is staffed by one captain and one engineer per day, and equipment includes one water tender and one engine. If the primary service provider is not available, coordination is facilitated across up to four fire stations affiliated with the City of Madera and Madera County within 5.5 miles (five to six minutes driving distance in rural areas).

*Construction and Operational Impacts*

Construction of the Project would involve hiring a temporary workforce, but given proximity, most of these workers are anticipated to be hired locally from existing residents in the cities of Madera and Fresno, in surrounding communities, and in other unincorporated areas of Madera County, as discussed in Section 2.14 [Population and Housing]. These workers would be served by existing fire services in the communities in which they reside, and the Project would not cause a substantial permanent increase in the residential or working population or otherwise result in a substantial increase in demand for fire services.

Operation of the Project would result in new passengers using the new facilities who would be temporarily located within the Project site and transiting via the Project for access to/from HSR and other connecting transportation. It is anticipated that many users of the Project would be from the local area and already using existing fire protection services and facilities. Therefore, the Project would not result in a substantial increase in permanent residents that would increase demand for fire services or create the need for new facilities, the construction or operation of which could result in impacts to the environment.

Thus, the Madera County Fire Department could sufficiently meet potential increases in fire service demand. The Project would not result in the need for new or expanded fire protection services or facilities, the construction or expansion of which could result in environmental effects. As a result, the impacts from increased demand for fire protection services would be less-than-significant, and mitigation is not required.

#### *Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

#### **(2) Police protection?**

The Madera County Sheriff's Office would provide primary law enforcement services for the Project. The Sheriff's Office has four divisions (Patrol, Investigations, Special Operations, and Professional Standards) and, through the Sheriff's Office of Emergency Services (OES), also acts as the Director of Emergency Services. The Sheriff's OES is the lead agency during any disaster or emergency and is tasked with public safety and property protection during evacuations due to catastrophic events. The Madera County Sheriff's Office operates out of the main headquarters at 2725 Falcon Drive in the City of Madera, and serves county residents by providing public protection and investigating crimes occurring within unincorporated areas of the County, operating the county jail, and performing other law enforcement duties.

The Project is not within the City of Madera but falls within the City's Sphere of Influence (SOI), and City police could respond to the Project site if mutual aid is requested, although such a request would be rare. According to the most recently published City of Madera Police Department annual report from 2019, response times to emergency calls averaged 5 minutes and 21 seconds. Response times to Priority 1, 2 and 3 calls were on average 8 minutes and 2 seconds, 19 minutes and 50 seconds, and 44 minutes and 58 seconds, respectively (City of Madera, 2019). The City's General Plan EIR found that impacts associated with expansion of police facilities would be less-than-significant (City of Madera 2009).

#### *Construction and Operational Impacts*

Construction of the Project would involve hiring a temporary workforce, but given proximity, most of these workers are anticipated to be hired locally from existing residents in the cities of Madera or Fresno, in surrounding communities, and in other unincorporated areas of Madera County, as discussed in Section 2.14 (*Population and Housing*). These workers would be served by existing law enforcement services in the communities in which they reside, and would not cause a substantial permanent increase in the residential or working population or otherwise result in a substantial increase in demand for law enforcement services.

Operation of the Project would result in new passengers using the new facilities who would be temporarily located within the Project site and transiting via the Project for access to/from HSR and other connecting transportation. It is anticipated that many users of the Project would be from the local area and already using existing law enforcement services and facilities. Therefore, the Project would not result in a substantial increase in permanent residents that would increase demand for law enforcement services or create the need for new facilities, the construction or operation of which could result in impacts to the environment.

Thus, the Madera County Sheriff's Department is anticipated to have sufficient resources to meet potential increases in demand for law enforcement services. The Project would not result in the need for new or expanded law enforcement services or facilities, the construction or expansion of which could result in environmental effects. As a result, the impacts from increased demand for law enforcement services would be less-than-significant, and mitigation is not required.

#### *Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

### **(3) Schools?**

The nearest school to the Project site is Madera Community College, approximately 0.75 miles to the west of the Project site. For elementary through high school, the nearest schools are Cesar Chavez Elementary School (approximately 1.5 miles to the west of the Project site), Martin Luther King Jr. Middle School (approximately 4.0 miles to the northwest of the Project site), and Madera South High School (approximately 4.5 miles to the west of the Project site) (Madera Unified School District, 2023b).

#### *Construction and Operational Impacts*

Construction and operation of the Project would involve hiring a temporary workforce to construct the Project and a small number of permanent employees to operate the Project. Given proximity, most of the temporary and permanent employees are anticipated to be hired locally from existing residents in the cities of Madera and Fresno, in surrounding communities, and in other unincorporated areas of Madera County, as discussed in Section 2.14 (*Population and Housing*). These workers and their children would be served by existing schools. Therefore, the Project would not result in a substantial increase in permanent residents and their children that would create the need for new school facilities, the construction or operation of which could result in impacts to the environment.

Furthermore, as discussed in Section 2.14 (*Population and Housing*), the Project would not result in new land uses or cause a redistribution of planned land uses that could induce unplanned population growth and result in the demand for new schools. Therefore, there are no impacts in regard to an increased demand for school facilities.

#### *Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

### **(4) Parks?**

#### *Construction and Operational Impacts*

Construction and operation of the Project would involve hiring a temporary workforce to construct the Project and a small number of permanent employees to operate the Project. Given proximity, most of the temporary and permanent employees are anticipated to be hired locally from existing residents in the cities of Madera and Fresno, in surrounding communities, and in other

unincorporated areas of Madera County, as discussed in Section 2.14 (*Population and Housing*). These workers would be served by existing parks. Given these considerations, the Project would not result in a substantial increase in permanent residents that would create the need for new park facilities, the construction or operation of which could result in impacts to the environment. In addition, the Project would not increase the use of existing parks such that a substantial physical deterioration of the facilities would occur or be accelerated.

Furthermore, as discussed in Section 2.14 (*Population and Housing*), the Project would not result in new land uses or cause a redistribution of planned land uses that could induce unplanned population growth and result in the demand for new parks. Therefore, there will be no impact in regard to an increased demand for parks.

#### *Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

#### **(5) Other public facilities?**

##### *Construction and Operational Impacts*

Construction and operation of the Project would involve hiring a temporary workforce to construct the Project and a small number of permanent employees to operate the Project. Given proximity, most of the temporary and permanent employees are anticipated to be hired locally from existing residents in the cities of Madera and Fresno, in surrounding communities, and in other unincorporated areas of Madera County, as discussed in Section 2.14 (*Population and Housing*). These workers would be served by existing public facilities, and would not cause a substantial permanent increase in the residential or working population or otherwise result in a substantial increase in demand for other public facilities.

Furthermore, as discussed in Section 2.14 (*Population and Housing*), the Project would not result in new land uses or cause a redistribution of planned land uses that could induce unplanned population growth and result in the demand for other new public facilities. Therefore, there are no impacts in regard to an increased demand for other public.

#### *Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.16. Recreation

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
(a) Would the project 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?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(b) 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"/>

### Discussion

The Madera County's General Plan establishes a standard of three acres of improved parkland for every 1,000 persons. The General Plan also encourages private recreation facilities to offset the heavy demand of other public recreation facilities. Table 2-3 below lists the nearest County recreational facilities within proximity to the Project site.

**Table 2-3. Recreational Facilities in Proximity to the Project Site**

Public Service	Distance and direction from the Project footprint
Knox Park	3.4 miles northwest
Parkwood Park	3.7 miles west

- (a) *Would the project 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?*

### Determination: NO IMPACT

The Project consists of station and station access improvements to facilitate expanded operation of HSR service. The Project does not include any residential, commercial, or other uses that would result in a substantial increase in residential or working population such that there would be increased demand or use of parks or recreational facilities. Additionally, the Project would not result in an intensification or development of specific land uses that would directly increase population and are associated with increasing demand for or use of parks or other recreational facilities.

### *Construction and Operational Impacts*

Construction and operation of the Project would involve hiring a temporary workforce to construct the Project and a small number of permanent employees to operate the Project. Given proximity, most of the temporary and permanent employees are anticipated to be hired locally from existing residents in the cities of Madera and Fresno, in surrounding communities, and in other unincorporated areas of Madera County, as discussed in Section 2.14 (*Population and Housing*). These workers would be served by existing parks or other recreation facilities.

Operation of the Project would also result in new passengers using the new facilities who would be temporarily located within the Project site and transiting via the Project for access to/from HSR and other connecting transportation. It is anticipated that many users of the Project would be from the local area and already using existing parks or other recreational facilities.

Given these considerations, the Project would not result in a substantial increase in permanent residents that would create the need for new parks or other recreational facilities, the construction or operation of which could result in impacts to the environment. In addition, the Project would not increase the use of existing parks or other recreational facilities such that a substantial physical deterioration of the facilities would occur or be accelerated. Therefore, there would be no impacts in regard to increases use of existing neighborhood and regional parks or other recreational facilities.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

***(b) 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?***

**Determination: NO IMPACT**

*Construction and Operational Impacts*

The Project consists of station and station access improvements to facilitate expanded operation of HSR service, and does not include any recreational facilities or require the construction or expansion of recreational facilities that could result in impacts to the environment beyond those already evaluated as part of this document. Therefore, there would be no impacts in regard to recreational facilities expansion or creation that may have adverse effects on the environment.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.17. Transportation

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

### Discussion

The Project consists of station and station access improvements to facilitate expanded operation of HSR service, including new and expanded HSR platforms, a new station siding track, a new rail bridge over Cottonwood Creek, an expanded parking lot, a pedestrian bridge spanning the two sides of the HSR station, and a potential expansion of the station building. Primary access for the Madera HSR Station would be provided via Avenue 12.

*(a) Conflict with a program, plan, ordinance, or policy addressing the circulation system, including transit, roadway, bicycle, and pedestrian facilities?*

#### **Determination: LESS-THAN-SIGNIFICANT WITH MITIGATION INCORPORATED**

Transportation-related programs, plans, ordinances, and policies relevant to the Project at both the local/regional and State levels include the following:

- Madera County General Plan [1995]
- Madera State Center Community College Specific Plan [1995]
- City of Madera General Plan (2009)
- City of Madera Climate Action Plan (2015)
- 2022 Regional Transportation Improvement Program (Madera CTC)
- 2022 Regional Transportation Plan/Sustainable Communities Strategy (Madera CTC)
- Madera County Short-Range Transit Development Plan (FY 2017/18-2021/22)
- Madera County Coordinated Public Transit Human Services Transportation Plan (2015)
- Madera Active Transportation Plan (2018)
- San Joaquin Valley Blueprint (San Joaquin Valley Regional Policy Council)
- Draft California State Rail Plan (2023)

- California High-Speed Rail Authority 2018 and 2020 Business Plans
- San Joaquin Joint Powers Authority 2020 Business Plan Update
- Madera Transit Plan (2022)
- City of Madera Capital Improvement Plan, Fiscal Years 2023-2028
- Madera County Transportation Commission Active Transportation Plan (2018)

Many of the aforementioned documents include goals and objectives to decrease vehicle miles travelled (VMT), reduce single-occupant vehicle-trips and automobile dependence, alleviate traffic congestion on local and regional roadways (e.g., SR 99), encourage transit use and active transportation, and reduce greenhouse gas (GHG) emissions from the large number of internal combustion engines used for regional and intercity trips.

The Project consists of station and station access improvements to facilitate expanded HSR service for regional and intercity trips within, through, and to/from the Central Valley and is specifically intended to help achieve many of the goals and objectives from the aforementioned programs, plans, ordinances, and policies. By completing full build-out of the Madera HSR Station to accommodate expanded HSR operations beyond the 18 daily roundtrips envisioned as part of the Early Operating Segment (EOS) service between Merced and Bakersfield, the Project expressly facilitates implementation of the statewide HSR network as described in the CHSRA's Business Plans.

In conjunction with improvements to be implemented as part of the already-approved Madera Station Relocation Project, the station would serve as a hub for local/regional and intercity transit in Madera County and surrounding communities, including nearby portions of Fresno County, creating an integrated transit network as envisioned in the California State Rail Plan. By facilitating a high-quality public transit option for travel in the Central Valley, the Project is anticipated to reduce personal automobile use and associated VMT and GHG emissions and encourage transit use and active transportation.

The area around the planned Madera HSR Station was served by two bus transit systems prior to the COVID-19 crisis: Madera Area Express (now Madera Metro) operated by the City of Madera, and Madera County Connection operated by the Madera County Department of Public Works. Madera Area Express Route 3 provided service along the Avenue 12 corridor throughout the day. Additionally, Madera County Connection's "College" route runs six weekday roundtrips serving Madera Community College (approximately a mile away from the Project station area) and the central area of the City of Madera.

These bus services are anticipated to be resumed and connect to the Madera HSR Station when EOS service commences. Ridership at the existing *San Joaquins* train station in Madera Acres has historically been among the lowest in the entire *San Joaquins* system, partially due to the lack of public transit connections. Robust bus service at the Madera HSR Station would improve local/regional connectivity and access and encourage use of the new station by both existing and new riders. The already-approved Phase 1 and Phase 2 of the station include a dedicated bus plaza, and given expected ridership levels, it is unlikely that new or additional transit infrastructure would be required at the station.

On-demand transit service also is available in the Project area and is provided through Madera Dial-A-Ride. This service covers the City of Madera and surrounding urbanized areas, stretching to the intersection of Avenue 12 with Road 3072 at its southeasternmost corner.



Aside from public transit, other transportation options in the vicinity of the Project area are generally lacking due to the rural nature of the area. Dedicated facilities for active transportation (walking and biking) are limited, and pedestrians and cyclists are generally forced to share right-of-way with automobiles on Avenue 12 or use adjacent shoulders or unpaved areas (e.g., dirt roads) in the area.

### *Construction Impacts*

#### **Roadway Network**

The design and construction of Project elements would also comply with applicable standards from Caltrans and local agencies (for any changes to the roadway network or roadway facilities) and from the Federal Railroad Administration (FRA) and/or CPUC (for the Project's rail elements). Design approval for specific Project components would be sought from the appropriate agencies as part of detailed design and subsequent stages of the Project. During construction, temporary traffic conditions are likely to result in limited access to existing properties. In order to minimize the impacts, mitigation measures including a Transportation Management Plan to reduce impacts to less than significant impacts.

**Transit, Bicycle, and Pedestrian Networks**The SJJPA has been coordinating with CHSRA throughout the early planning and design process and would continue to do so during subsequent stages of the Project to ensure that the construction and operation of relevant Project elements within or adjacent to the CHSRA Project alignment satisfy appropriate design guidelines and specifications. The SJJPA would also coordinate with Madera County and Madera CTC to ensure that adequate connecting transit service is provided for the new station.

Analysis of a project's transportation impacts would consider effects on transit access or operations, but the addition of new transit users is generally not considered an adverse impact, as significance criteria for evaluating a project's transportation impacts must promote GHG emissions reductions and the "development of multimodal transportation networks", as referenced from *Public Resources Code* § 21099(b)(1). The Project would result in an increase in ridership at other stations throughout the HSR system, but the magnitude of this increase would be much smaller than the other ridership at those stations and is unlikely to result in the need for additional infrastructure or cause other secondary impacts at those locations.

#### **Roadway Network**

The Project would likely result in increased traffic levels in the vicinity of the station site, but this is anticipated to be balanced by a reduction in traffic levels along SR 99 and other regional and intercity roadway corridors through the Central Valley as travelers transition to HSR. The Project would reduce overall VMT by inducing a mode shift from automobiles to passenger rail and would decrease traffic congestion along parallel roadways, which would be considered a benefit to traffic operations and goods movement along these corridors.

Although not part of the Project, a series of improvements are being implemented or are in the planning stages for the Avenue 12 Corridor, which would expand the roadway profile from 2 lanes to 4 lanes for approximately 10 miles between SR 99 and SR 41 (except for a short 2-lane section which would be augmented by a bypass road). With this additional capacity, it is anticipated that the Avenue 12 corridor would be able to accommodate the additional traffic generated by the Project.

## **Freight Rail**

Substantial disruptions to freight rail operations are unlikely, given that the Project is focused on improvements to support HSR service and Project components are primarily concentrated along or near the CHSRA Project corridor, not along the BNSF corridor. No construction impacts would result.

### *Operational Impacts*

Operational impacts related to conflicting with transportation plans and goals would be less than significant as this is a transit project that would help reduce regional VMT and provide transit access to various populations.

## **Transit, Bicycle, and Pedestrian Networks**

No operational impacts to transit, bicycle, and pedestrian networks would occur as the elements of the Project are separated from circulation of these systems.

## **Freight Rail**

Substantial disruptions to freight rail operations are unlikely, given that the Project is focused on improvements to support HSR service and Project components are primarily concentrated along or near the CHSRA Project corridor, not along the BNSF corridor. No operational impacts would result.

### *Conclusion/Determination*

Operational impacts would be less-than-significant for roadway, transit, bicycle, pedestrian and freight rail systems. No construction impacts would result with transit, bicycle, pedestrian and freight rail systems. However, construction activities, particularly around Avenue 12, a key route in the area, would require project-specific mitigation measures to reduce impacts to less than significant. Consequently, this subtopic will be evaluated further in the EIR..

*(b) Conflict or be inconsistent with CEQA Guidelines § 15064.3, subdivision (b)?*

## **Determination: LESS-THAN-SIGNIFICANT IMPACT**

### *Construction and Operational Impacts*

In accordance with Senate Bill (SB) 743, the California Natural Resources Agency has adopted changes to the *CEQA Guidelines* that "promote the reduction of greenhouse gas emissions, the development of multimodal transportation networks, and a diversity of land uses," as described under *Public Resources Code* § 21099(b)(1). With these changes, VMT has been identified as the most appropriate metric for evaluating a project's transportation impact, and automobile delay—as measured by "level of service" (LOS) or similar metrics—generally no longer constitutes a significant environmental effect under CEQA (Governor's Office of Planning and Research, 2018). Therefore, components of the regulatory setting referring to automobile delay (e.g., level of service) are not applicable to the analysis of the Project's transportation impacts and are not discussed further in this section.

*CEQA Guidelines* § 15064.3, subdivision (b) specifies applicable criteria for analyzing transportation impacts. Specifically, it states the following:

*Transportation projects that reduce, or have no impact on, vehicle miles traveled should be presumed to cause a less-than-significant transportation impact. For roadway capacity projects,*

*agencies have discretion to determine the appropriate measure of transportation impact consistent with CEQA and other applicable requirements.*

The Project is a transportation project (specifically, a transit project), and would reduce VMT by inducing a mode shift from personal (household) automobiles to public transit, including for long-distance commute and intercity trips.

More specifically, the Project is anticipated to result in a localized increase in VMT from riders traveling to and from the proposed station, but this localized increase would be outweighed by a reduction in overall VMT within Madera County and the Central Valley, as well as to more distant areas of the state, particularly as HSR service expands beyond the EOS into Northern and Southern California.

Overall, the Project would not conflict with or be inconsistent with *CEQA Guidelines* § 15064.3, subdivision (b), and this impact would be less-than-significant; no mitigation is required.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

**(c) *Substantially increase hazards due to a geometric design feature (e.g., sharp curves or dangerous intersections) or incompatible uses (e.g., farm equipment)?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

The design, construction, and operation of the Project would comply with applicable standards from the FRA and/or CPUC. Similarly, design, construction, and operation of site access improvements, including new roadways or modifications to existing roadways, would adhere to applicable standards such as the California Manual on Uniform Traffic Control Devices (MUTCD) and local design guidelines and specifications. Design approval for specific Project components would be sought from the appropriate agencies as part of detailed design and subsequent stages of the Project.

Given these considerations, construction and operational impacts related to hazards from geometric design features or incompatible uses would be less-than-significant.

#### *Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

**(d) *Result in inadequate emergency access?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

Emergency vehicle access for the area is currently provided primarily by Avenue 12, which is a major east-west arterial roadway providing direct access to and from SR 99. Initial construction of

the four-lane station access road will commence with the already-approved Phase 2 improvements, providing a complete access road to connect into the Avenue 12 grade separation completed by the CHSRA. The access road would provide emergency access for the entire station site.

As discussed under Section 2.17(c), design, construction, and operation of Project elements would comply with applicable standards from Caltrans and local agencies (for changes to the roadway network or roadway facilities) and from the FRA and/or CPUC (for the Project's rail elements), including provisions for emergency access. As discussed under Section 2.17(a), any temporary roadway closures would be coordinated with local agencies to minimize any disruptions to the circulation system, including to emergency vehicle response.

Given these considerations, the construction and operational impacts related to emergency access would be less-than-significant.

*Conclusion/Determination*

Impacts would be less-than-significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated into the "Other CEQA Considerations" chapter of the EIR.

## 2.18. Tribal Cultural Resources

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
(a) Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in <i>Public Resources Code</i> § 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 <i>Public Resources Code</i> § 5020.1(k), or	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input 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 <i>Public Resources Code</i> § 5024.1. In applying the criteria set forth in subdivision (c) of <i>Public Resources Code</i> § 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

### Discussion

(a) *Would the project cause a substantial adverse change in the significance of a tribal cultural resource, defined in Public Resources Code § 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 § 5020.1(k)?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

#### *Construction Impacts*

Under CEQA (*Public Resources Code* § 21074), tribal cultural resources are defined as sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe that are either included or determined to be eligible for inclusion in the California Register of Historical Resources (CRHR) or included in a local register of historical resources, or a resource determined by the lead agency, in its discretion and supported by substantial evidence, to be significant.

Assembly Bill (AB) 52 defines tribal cultural resources as "sites, features, places, cultural landscapes, sacred places, and objects with cultural value to a California Native American tribe" that are included in or determined to be eligible for inclusion in the CRHR or the local register of historical resources.

As part of the environmental review process and to help ensure the protection of tribal cultural resources, the requirements set forth in AB 52 will be followed. AB 52 creates a distinct category for tribal cultural resources, requiring a lead agency to not only consider the resource's scientific and historical value, but also whether it is culturally important to a California Native American tribe. Staff at the Native American Heritage Commission will be contacted to review the Sacred Lands File (SLF) and a list of individuals who may have information regarding or interest in the Project also will be contacted to obtain their input regarding the Project. More specifically, information will be obtained from the notification process in accordance with *Public Resources Code* § 5020.1(k) and as required under CEQA, specifically *Public Resources Code* § 21080.3.1 and Chapter 532, Statutes of 2014 (AB 52) (Office of Planning and Research, 2023). There is potential for tribal cultural resources to be located within the Project footprint, which will be determined during tribal consultation. Mitigation measures are typically included in the EIR to reduce the potential impacts. Therefore, impacts to historical resources would likely be less than significant with mitigation incorporated.

#### *Operational Impacts*

Operation of the Project would not require disturbance of additional areas outside or within the Project footprint. As such, no impacts would occur related to changes in the significance of historical resources.

#### *Conclusion/Determination*

No impacts would occur during operations. Impacts would be potentially-significant during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Tribal Cultural Resources" chapter of the EIR.

- (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 § 5024.1? In applying the criteria set forth in subdivision (c) of Public Resources Code § 5024.1, the lead agency shall consider the significance of the resource to a California Native American tribe.*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

#### *Construction and Operational Impacts*

As discussed above, the environmental review process will comply with all required outreach and notifications to determine if the Project could result in impacts to a resource such as 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 defined in Public Resources Code § 21074. At this time, it is unknown if the Project site would represent such a resource or if the Project could or would cause a substantial adverse change in the significance of a tribal cultural resource. However, as an area known to have Native American historical presence, further analysis is required, particularly by AB52.

*Conclusion/Determination*

No impacts would occur during operations. Impacts would be potentially-significant during construction, therefore, further detailed evaluation of this sub-topic is required and will be provided in the "Tribal Cultural Resources" chapter of the EIR.

## 2.19. Utilities and Service Systems

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
Would the project:				
(a) 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 checked="" type="checkbox"/>	<input type="checkbox"/>
(b) Have sufficient 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 checked="" type="checkbox"/>	<input type="checkbox"/>
(c) Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(e) Comply with Federal, State, and local management and reduction statutes and regulations related to solid waste?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) ***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?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

The Project would not result in the construction or operation of any uses that would result in the relocation or construction of new or expanded water, wastewater treatment or stormwater drainage, electric power, natural gas, or telecommunications facilities outside of any area already proposed to be disturbed as part of construction. Typical uses that result in such increases include residential, commercial, or industrial uses. As the Project consists of transportation improvements,



the need for these utility services is minimal and would not result in substantial effects on the environment.

Construction and introduction of new hardscape (e.g., expanded parking lot, new Cottonwood Creek Bridge, new station platform, etc.) could change existing runoff characteristics and increase the flow and volume of stormwater. Stormwater runoff improvements would be implemented as needed within the Project footprint and areas of disturbance already considered in this Initial Study. The Madera County Department of Public Works states, "New and future developments are not permitted to divert any storm runoff into existing facilities." Therefore, future developments must contain, retain, and mitigate stormwater through catch basins. The County, unlike the cities, does not have a master plan; therefore, every new development must retain its runoff, and all designs must meet and withstand the 100-year storms.

The already-approved Madera Station Relocation Project, included a stormwater drainage system leading to a retention pond located immediately south of the Phase 1 parking structure. The retention pond would be designed to accommodate additional stormwater anticipated from the Madera HSR Station Full-Build Project.

Conformance to other requirements would further reduce impacts related to stormwater runoff within the Project footprint. Madera County Ordinance 680, for example, outlines control measures related to stormwater and storm sewer systems, illicit discharge and connections, and construction site stormwater runoff and landscaping. Implementing standard construction practices such as Best Available Technology Economically Feasible ("BATs"), Best Conventional Pollutant Control Technology ("BCTs"), and Best Management Practices (BMPs) would also help reduce potential impacts related to stormwater drainage systems. Therefore, construction or operational impacts related to new stormwater drainage systems would be less-than-significant.

Some new electrical utility lines would be installed to electrify lighting within the expanded parking lot area and pedestrian bridge. Services for electrical needs would be extended from existing lines into the Project site as needed. These improvements would be made in areas that are already proposed to be disturbed as part of construction and are therefore considered in the Project footprint and impact discussion as provided throughout this document. No new off-site electrical facilities such as a new substation or expansion of the existing substation adjacent to the southerly side of Avenue 12 would be required. Additionally, new west-side HSR trackwork would include approximately 20-foot-tall electrical poles at specified intervals to be part of the overhead contact system powering the HSR trains. A TPSS may also be provided within the area between the two HSR platforms in order to supply power for the electrification of trains (if necessary).

Overall, the Project would not require or result in the relocation or construction of new or expanded utilities, the construction or operation of which could result in impacts to the environment. Therefore, impacts would be less-than-significant.

#### *Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (b) *Have sufficient water supplies available to serve the project and reasonably foreseeable future development during normal, dry, and multiple dry years?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

The overall Project site and surrounding area is served by the Madera Irrigation Water District, which provides water supply for areas within the Project footprint. The Project includes station and station access improvements but does not include any uses that are typically associated with increasing water demand (i.e., residential, commercial, industrial).

The Project site is currently used for agricultural production and has a relatively high water demand to support production of crops, which would be anticipated to continue should the Project not be approved. The Project consists of transportation improvements and would therefore use a substantially reduced volume of water compared to existing conditions. Thus, it is anticipated that sufficient water supplies would be available to serve the Project and future developments during normal, dry, and multiple dry years. As such, construction and operational impacts related to sufficient water supplies available to serve the Project and future developments would be less-than-significant.

*Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (c) *Result in a determination by the wastewater treatment provider which serves or may serve the project that it has adequate capacity to serve the project's projected demand in addition to the provider's existing commitments?***

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

There are no wastewater drainage facilities within the Project footprint, but there are existing utilities east of the Project footprint located on Avenue 13 and Road 30 within the eastern edge of the City of Madera's Urban Growth Boundary. Wastewater flows from service areas are conveyed to the Madera Wastewater Treatment Plant (WWTP), which has an average daily capacity rating of 10.1 million gallons per day (MGD). Improvements to expand wastewater treatment facilities would occur within the Project footprint and surrounding areas in the intermediate to long-term timeframe (fiscal years 2016-2050) as new developments arise and require service, but the Project is not proposed to be served at this time and extension of wastewater services are not part of the Project.

Overall, construction and operational impacts of the Project would not exceed the capacity of the wastewater treatment provider and impacts would be less-than-significant.

*Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis

presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (d) Generate solid waste in excess of State or local standards, or in excess of the capacity of local infrastructure, or otherwise impair the attainment of solid waste reduction goals?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

During Project construction and operations, waste would be generated and disposed of by using bins for both recycling and waste material in compliance with district, local, State, and Federal criteria, standards, regulations, or laws, and would be disposed of through a commercial collector. Solid waste collected within the Project footprint would be sent to Fairmead Landfill, which is approximately 17 miles northwest of the Project site in the City of Chowchilla within Madera County. The landfill is owned by Madera County and operated by the Redrock Environmental Group. As of March 2017, the estimated closure date of the landfill was extended from 2028 to 2048 and the total permitted acreage was increased from 121.7 total acres (97.0 acres permitted for disposal) to 146.9 total acres (122.3 acres permitted for disposal), which increased the volumetric capacity from 13,186,000 cubic yards to 23,007,696 cubic yards. As such, there is adequate capacity at the landfill to dispose of solid waste from Project construction.

The Project would also be required to divert (recycle) 50 percent of the solid waste generated by both construction and operation to comply with the 50-percent solid waste diversion rate mandated by the California Integrated Waste Management Act of 1989 (AB 939).

As such, Project construction and operation 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, and impacts would be less-than-significant.

*Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

- (e) Comply with Federal, State, and local management and reduction statutes and regulations related to solid waste?*

**Determination: LESS-THAN-SIGNIFICANT IMPACT**

*Construction and Operational Impacts*

As described in Section 2.19(a) through Section 2.19(d) above, construction and operation of the Project would meet the requirements of applicable Federal, State, and local management and reduction statutes and regulations related to solid waste, and this would be accomplished by implementing BATs, BCTs, and BMPs, as well as applying for all the required water and disposal permits from the City and County for construction and operation permits. Therefore, construction or operational impacts involving compliance with Federal, State, and local management and reduction statutes and regulations related to solid waste would be less-than-significant.

*Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

## 2.20. Wildfire

	Potentially-Significant Impact	Less-than-Significant Impact 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:				
(a) Substantially impair an adopted emergency response plan or emergency evacuation plan?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
(b) Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(c) Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>
(d) Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>

### Discussion

- (a) *Substantially impair an adopted emergency response plan or emergency evacuation plan?*

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

The Madera County Operational Area Emergency Operations Plan (MCOAEO) addresses the planned response to extraordinary emergency situations, including wildfire. The plan establishes the emergency management organization; identifies the policies, responsibilities, and procedures required to protect the health and safety of Madera County; and establishes the operational concepts and procedures associated with initial response operations ("field response") to emergencies. The plan also establishes the framework for implementation of the National Incident Management System (NIMS) and is intended to facilitate multi-agency and multi-jurisdictional coordination in emergency operations, particularly between Madera County and local governments, including special districts, tribes, and State agencies.

According to the MCOAEOP, wildfires in Madera County generally occur each year from May to October, which is considered the fire season. Most of the fire-susceptible areas are in the eastern portion of the county that consists of steeper terrain and landforms with thick vegetation and heavy brush. These areas are largely undeveloped and have rugged terrain and highly-flammable vegetation that is prone to wildfire. Especially during the late spring, early summer, and early fall, high temperatures, low humidity, and strong winds can exacerbate the potential for wild land fires (Madera County, 2010).

The MCOAEOP does not identify emergency evacuation routes but includes numerous discussions of interagency coordination related to evaluations in emergency situations. Regarding wildfire, the plan includes coordinating with law enforcement to isolate and deny entry to the wildfire area and providing status reports to the Emergency Command Center and the County Emergency Operations Center.

The Madera County Community Wildfire Protection Plan (CWPP) discusses evacuation routes for wildfire protection. As mentioned in the Madera County CWPP, roads identified as probable evacuation routes are intended to be well-maintained (including removal of hazardous roadside brush and trees) and have adequate site clearance. There are no evacuation routes listed near the Project site, but the Project site does not contain heavy brush or trees that would need clearance and does not have any site access issues. Evacuation routes identified in the Madera County CWPP are limited to the eastern portion of the county, including those near the communities and areas of Oakhurst, North Fork, Bass Lake, Ahwahnee, Coarsegold, Raymond, and O'Neals (Madera County, 2008). None of these locations occur within, adjacent to, or near the Project site.

The Madera County CWPP also references the 2007 California Department of Forestry and Fire Protection (CAL FIRE) Fire and Resource Assessment Program (FRAP) State Responsibility Area (SRA) Fire Hazard Severity Zone (FHSZ) maps. The FHSZ maps show areas with very high, high, and medium risk for wildfire, all of which are approximately 25 miles to the east. The Project site is listed in a Local Responsibility Area (LRA) and is not designated as being within a very high, high, or medium FHSZ (Madera County 2008; CAL FIRE 2007).

The Project site is not in an area that would be at substantial risk from wildfire. The Project site is in an agricultural area of Madera County, is not adjacent to wildlands, and does not contain dense brush or other vegetation that would be prone to wildfire. As such, the risk of wildfire and threat to structures and facilities that would be built as part of the Project is minimal. Furthermore, the Project consists of station and station access improvements to facilitate expanded HSR service and does not include features that would substantially impair an adopted emergency response plan or emergency evacuation plan.

For example, the Project does not include habitable structures that would substantially increase the population, nor would the Project substantially increase traffic volumes on the roadway network such that emergency response or evacuation is impeded. Access to and from the Project site for fire and other emergency access would be maintained and provided by existing roadways and already-approved roadway improvements included under the Madera Station Relocation Project. As discussed under Section 2.17(c), design, construction, and operation of Project elements would comply with applicable standards from Caltrans and local agencies (for changes to the roadway network or roadway facilities) and from the FRA and/or CPUC (for the Project's rail elements), including provisions for emergency access.

Therefore, Project construction and operations would not substantially impair an adopted emergency response plan or emergency evacuation plan, and the associated impacts would be less-than-significant.

*Conclusion/Determination*

Impacts would be less than significant during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. No additional disclosures due to the significance of impacts are anticipated unless new information is presented during the scoping process that indicates that a significant impact could occur.

**(b) *Due to slope, prevailing winds, and other factors, exacerbate wildfire risks, and thereby expose project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire?***

**Determination: NO IMPACT**

*Construction and Operational Impacts*

The Project site and surrounding areas consist primarily of agricultural uses, industrial uses south of Avenue 12, and the BNSF corridor. Weather conditions such as temperature, relative humidity, wind, and lightning can affect wildfire potential. Winds in Madera County can be significant at times, such as the Santa Ana winds that are especially conducive to hot, dry conditions, which can lead to "red flag" days indicating extreme fire danger. In addition to wind speed, wind shifts can occur suddenly due to temperature changes or the interaction of wind with topographical features such as slopes or steep hillsides. These conditions that can exacerbate wildfire severity are more pertinent to areas in the eastern parts of Madera County that are characterized by steep and rugged terrain, thick and heavy vegetation, and high winds.

The Project site and surrounding areas are dominated by flat agricultural lands and do not contain landscapes such as those within the mountainous, thickly-vegetated eastern portions of the County that are at substantial risk of wildfire. While the Project site may contain and be surrounded by noxious weeds that are more drought-tolerant and could increase fire risk compared to irrigated crop lands, the Project site is located in a relatively flat area with irrigated vegetation that is harvested and cleared yearly, and is not exposed to exacerbated wildfire risk.

Therefore, Project construction and operations would not exacerbate wildfire risks (due to slope, prevailing winds, and other factors), such that it could expose Project occupants to pollutant concentrations from a wildfire or the uncontrolled spread of a wildfire. Therefore, there are no impacts in regard to pollutant concentrations from wildfires or their uncontrolled spread being exposed to the Project's occupants.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. No additional disclosures due to the significance of impacts are anticipated unless new information is presented during the scoping process that indicates that a potentially-significant impact could occur.

- (c) ***Require the installation or maintenance of associated infrastructure (such as roads, fuel breaks, emergency water sources, power lines or other utilities) that may exacerbate fire risk or that may result in temporary or ongoing impacts to the environment?***

**Determination: NO IMPACT**

*Construction and Operational Impacts*

Areas of Madera County in which the Project is located are not normally susceptible to wildland fires, but there is still potential for smaller fires in and around the less developed areas, such as the Project site. Most wildfires within the county originate in populated areas along roads and around homes. These fires can be the result of arson or careless acts such as the disposal of cigarettes, use of equipment, or discarding of burning debris. Other factors that contribute to wildfire risk and the susceptibility of an area to wildfire include excessive vegetation along roadsides, lack of proper fire engine and emergency service access, and lack of adequate evacuation routes. Evacuation routes can become congested if they are too narrow, such as one-lane dead-end roads or developments with limited alternative ingress and egress. Roadways such as these can complicate evacuation and emergency response.

The County is increasing the number of defensible space inspections, which has been effective in reducing the amount of ground fuels that contribute to large, uncontrolled wildfires. The Madera County CWPP encompasses the areas of Madera County north and east of the Madera Canal, and is multi-jurisdictional in that it addresses wildfire risk and mitigation measures that include privately-owned property, tribal lands, and Federal lands administered by the United States Forest Service, Bureau of Land Management, and Army Corps of Engineers. The Project would meet the building standards and operation requirements outlined in *California Building Code* (Title 24 of the *California Code of Regulations*) and be in accordance with countywide ordinances outlined in the CWPP, which would reduce the potential for smaller fires in and around less developed areas.

Access to and within the Project site would be provided by existing and planned roadways and infrastructure, and no additional maintenance of such access roads or corridors would be needed. As discussed above, all other infrastructure improvements (emergency water resources, power lines or other utilities) would be constructed in conformance with all applicable codes, and none would be located within high or very high FHSZs or in areas susceptible to wildfire. Lastly, due to the location of the Project in an area with low volumes of combustible fuel and vegetation, no fire breaks are needed or proposed.

Thus, the Project would not require the installation or maintenance of associated infrastructure that may exacerbate fire risk. therefore, there are no impacts.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. No additional disclosures due to the significance of impacts are anticipated unless new information is presented during the scoping process that indicates that a potentially-significant impact could occur.

- (d) ***Expose people or structures to significant risks, including downslope or downstream flooding or landslides, as a result of runoff, post-fire slope instability, or drainage changes?***

**Determination: NO IMPACT**



The Project site is not in a high or very high FHSZ and is not located near steep slopes that would exacerbate either on-site or downstream flooding hazards because of a fire. The Project site and surrounding areas are flat and consist primarily of agricultural lands, with a smaller portion occupied by existing roadways. While the Project would introduce new hardscape that could increase runoff, the Project would include drainage facilities such as retention and detention basins designed to time the release of stormwater runoff, further reducing the potential for on-site or downstream flood channels to be exceeded. The Project would not expose people to downslope or downstream flooding or landslides as a result of runoff, post-fire slope instability, or drainage changes; therefore, there are no impacts.

*Conclusion/Determination*

No impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. No additional disclosures due to the significance of impacts are anticipated unless new information is presented during the scoping process that indicates that a potentially-significant impact could occur.

## 2.21. Mandatory Findings of Significance

	Potentially-Significant Impact	Less-than-Significant Impact with Mitigation Incorporated	Less-than-Significant Impact	No Impact
(a) 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"/>	<b>IXI</b>	<input type="checkbox"/>	<input type="checkbox"/>
(b) 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"/>
(c) Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>

### Discussion

- (a) *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?*

#### **Determination: LESSTHAN SIGNIFICANT WITH MITIGATION INCORPORATED**

##### *Construction and Operational Impacts*

Refer to Section 2.4 (Biological Resources) and Section 2.5 (Cultural Resources).

Given the range of potential impacts and the scope of the potentially affected biological and cultural resources, the Project's impacts are considered potentially-significant and will be evaluated further in the EIR in the "Biological Resources" and "Cultural Resources" sections.

No operational impacts are anticipated for these resources.

- (b) *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.)*

**Determination: LESS-THAN-SIGNIFICANT IMPACT WITH MITIGATION INCORPORATED**

The known projects that would be in construction or be developed during the construction and operations of the Project include:

1. Merced-Bakersfield EOS (part of the approved CHSRA Project) - The CHSRA is currently constructing the Merced-Bakersfield EOS track and associated infrastructure in the vicinity of and directly adjacent to the Project. Construction of the CHSRA Project is expected to continue during the construction and operations of the Project. CHSRA Project construction activities in the vicinity of the Project site would include track construction, OCS infrastructure construction, fencing, and completion of a bridge over Cottonwood Creek. EOS service (equivalent to Phase 2 of the Madera Station Relocation Project as analyzed in the 2021 IS/MND) is currently expected to commence sometime between 2030 and 2033.
2. HSR Expanded Service (part of the approved CHSRA Project) - Following Merced-Bakersfield EOS operations, the CHSRA plans to first implement "Valley-to-Valley" (i.e., San Joaquin Valley to Silicon Valley) service, which will increase HSR operations along the proposed HSR route, including the segment containing the Madera HSR Station. Following Valley-to-Valley service, CHSRA plans to then implement HSR Phase 1 service (between Los Angeles and San Francisco), which would further increase HSR operations.
3. Avenue 12 Widening - Madera County proposes to widen Avenue 12 from two to four lanes between SR 99 and SR 41, although a portion of this widening has already been completed as part of the CHSRA's grade separation of Avenue 12 over the BNSF and CHSRA Project tracks. Construction of the County's Avenue 12 widening project is expected to be complete by October 2026 (Caltrans, 2023).
4. Various private residential and mixed-use development in southeast Madera County - As discussed in Section 2.11(b), there are several private developments that are either under construction or planned along Avenue 12 and to the southeast of the Project site. These projects are shown in Figure 1.1.1-3. Some of these private developments may be built by the time construction begins to relocate Madera's existing station on the *San Joaquins* service (i.e., the "San Joaquins Relocated Station", constituting Phase 1 of the approved Madera Station Relocation Project, as analyzed in the 2021 IS/MND). Full build-out of these projects may extend beyond 2030-2033, when the approved Phase 2 of the Madera Station Relocation Project is completed and the Madera HSR Station opens for interim service in conjunction with the Merced-Bakersfield EOS.
5. Madera State Center Community College Specific Plan - The Madera SCCC Specific Plan covers an area of 1,867 acres and is currently only partially built-out, with substantial portions of the plan area still awaiting future development, including TOD. The Madera SCCC Specific Plan identifies a transit station that could include rail service within its planning boundaries adjacent to the BNSF corridor, which would be realized as the *San Joaquins* Relocated Station (Phase 1 of the Madera Station Relocation Project). Other elements of the Madera SCCC Specific Plan may be developed during operations of Phase 1 of the station, as well as during construction and

operations of Phase 2 of the station (i.e., the Madera HSR Station's interim phase in conjunction with the HSR EOS].

All of these reasonably-foreseeable projects in the vicinity of the Project site have prepared, or will be required to prepare, their own environmental documentation, which would disclose any potential environmental impacts and mitigation needed.

#### *Construction and Operational Impacts*

Agricultural resources and biological resources are the primary environmental resources that may be significantly affected one or more of the cumulative projects in combination with the Project. As with the Project, extensive mitigation would need to be implemented by each related project to reduce impacts, regardless of the type of environmental assessment being prepared.

The Project will include mitigation measures to address both construction and operational impacts for environmental topics that would result in potentially significant impacts, and will be outlined in the EIR

Cumulatively, the development of potential habitat and agricultural land due to cumulative projects would be considered a significant impact because conservation easements do not result in net loss of important farmland (California Courts of Appeals, 2020]. Cumulative impacts to agricultural land cannot be reduced to a less than significant level through the implementation of future mitigation identified through environmental review of projects yet to complete environmental compliance.

Given the extent and comprehensive character of mitigation that has been identified in this Initial Study to reduce the Project's impacts to less-than-significant levels and the additional, more detailed analysis of these impacts and mitigation measures that will be conducted in the EIR, the Project would not have substantive residual or significant impacts to biological resources, and it is therefore not anticipated that the Project would contribute considerably to any significant cumulative impacts to biological resources. The impacts to agricultural and farmland resources would be potentially significant.

For environmental resources evaluated in this Initial Study that would have significant impacts before mitigation—namely, impacts related to geology, soils, and paleontological resources; hazards and hazardous materials; and hydrology and water quality—those impacts can be readily reduced to a less-than-significant level with mitigation that consists of industry-standard mitigations, regulatory compliance, and best management practices that all related projects would also be required to adopt and comply with. The environmental clearances for the CHSRA's Merced to Fresno Project Section and the Madera Station Relocation Project include similar mitigation as identified for the Project in this Initial Study. As all of these industry-standard mitigations, regulatory compliance, and best management practices are meant to minimize impacts, the Project would not contribute considerably to significant cumulative impacts for any of these specific environmental resources.

Other environmental resources—namely, air quality, cultural resources, energy, greenhouse gas emissions, noise, transportation, and tribal cultural resources—either require further environmental analysis in the EIR or are expected to have a less-than-significant impact before mitigation but will be evaluated further in the EIR for confirmation.

For all other environmental resources evaluated in this Initial Study—namely, aesthetics, land use and planning, mineral resources, population and housing, public services, recreation, utilities and service systems, and wildfire—the Project would have limited impacts that would be less-than-

significant as discussed in the respective sections of this Initial Study. Although some of the cumulative projects may result in significant impacts related to some of these resources (due to their specific location or scale or other unique factors of those projects] and there may be a potential for certain cumulatively significant impacts, the Project's contribution to any such cumulative impacts would be limited in scale and duration. Therefore, the Project would not contribute considerably to significant cumulative impacts for any of these specific environmental resources.

#### *Conclusion/Determination*

The Project would not contribute considerably to significant cumulative impacts for environmental resources including geology, soils, and paleontological resources; hazards and hazardous materials; and hydrology and water quality with the implementation of mitigation measures. The Project would have limited impacts that would be less-than-significant for environmental resources including aesthetics, land use and planning, mineral resources, population and housing, public services, recreation, utilities and service systems, and wildfire. Therefore, further detailed evaluation of the sub-topics is not required in the EIR. Construction or operational impacts on agricultural resources, air quality, cultural resources, energy, greenhouse gas emissions, noise, transportation, and tribal cultural resources would be significant impacts before mitigation, therefore further detailed evaluation of these sub-topics are required in the EIR. Furthermore, the analysis presented in this IS for these sub-topics will be incorporated in the "Cumulative Impacts" chapter of the EIR.

**(c) *Does the project have environmental effects which will cause substantial adverse effects on human beings, either directly or indirectly?***

#### **Determination: LESS-THAN-SIGNIFICANT IMPACT**

##### *Construction and Operational Impacts*

This Initial Study includes a comprehensive evaluation of the potential impacts to human beings, directly or indirectly, during construction and operations. Based on this evaluation, impacts related to causing a substantial adverse effect on human beings, either directly or indirectly, would be less-than-significant.

Full build-out of the Madera HSR Station will accommodate anticipated growth in Madera County and north Fresno County and facilitate CHSRA's current plans for expanded HSR service beyond the Merced-Bakersfield EOS, bringing substantial benefits in terms of improved regional and intercity connectivity. Without the Project's additional HSR station track and platform, HSR service for Madera would be constrained and would not be able to grow as HSR is extended beyond the Merced-Bakersfield EOS into Northern and Southern California. In addition, the Project supports transportation equity by inducing mode shifts that will reduce air pollution generated by automobiles and the associated health impacts and by connecting low-income and transit-dependent populations in Madera County with opportunities for employment, education (e.g., Madera Community College), housing, health care, social services, and leisure/recreation.

#### *Conclusion/Determination*

Less than significant impacts would occur during construction and operations, and further detailed evaluation of this sub-topic is not required in the EIR. Furthermore, the analysis presented in this IS for this sub-topic will be incorporated in the "Other CEQA Considerations" chapter of the EIR.

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