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Description:	This section discusses alternatives to the proposed Darden Clean Energy Project. These include the “no project” alternative, a technology alternative, as well as a discussion of the site selection criteria employed. This discussion focuses on alternatives that could feasibly accomplish the basic objectives of the Project and could avoid or substantially lessen one or more of the potential impacts.
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6 Alternatives

This chapter discusses alternatives to the proposed Darden Clean Energy Project (Project). These include the "no project" alternative, a technology alternative, as well as a discussion of the site selection criteria employed by IP Darden I, LLC and Affiliates[1] (Applicant), wholly owned subsidiaries of Intersect Power, LLC. This discussion focuses on alternatives that could feasibly accomplish the basic objectives of the Project and could avoid or substantially lessen one or more of the potential impacts. The Applicant has developed objectives for each of the Project's primary components, which are considered throughout this Chapter; these objectives are detailed in Chapter 2, *Project Description*.

6.1 Project Site Selection

The Project site has been selected based on criteria intended to avoid or substantially lessen potential environmental impacts. This section describes the Applicant's site selection criteria consistent with the requirements of Public Resources Code Section 25540.6(b) and describes consideration given to engineering constraints, site geology, environmental impacts, electrical transmission constraints and other constraints. Given the nature of the Project – a clean energy project – fuel and waste are not constraints. A discussion of water availability is provided in the water supply study prepared for the Project (Appendix S).

The Applicant pursues a disciplined approach to site selection with a careful eye toward development opportunities where environmental and permitting obstacles, as well as complexity of interconnection, are minimized to the greatest extent possible. As part of this diligence exercise, significant development expenses are outlaid early in the process to thoroughly screen projects for potential fatal flaws that would impede viability or result in substantial community or environmental impacts. The Applicant's primary selection criterion for the Project was to locate a site in proximity to the existing Pacific Gas and Electric (PG&E) Los Banos-Midway #2 500 kilovolt (kV) line, other existing transmission lines, adequate roadways, and separation from residences on a site that is relatively flat, with minimized potential to impact sensitive species or habitat, sensitive cultural resources, or important agricultural lands.

The Project location was selected because it meets the Applicant's selection criteria identified above and has been identified as "Smart from the Start" by numerous conservation organizations and State agencies, in addition to being identified as Priority Least Conflict Land for solar energy development in the San Joaquin Valley least conflict solar analysis (Pearce et al. 2016). Furthermore, the California Energy Commission's (CEC's) most recent 2023 land use screens indicate that there are approximately 1.6 million acres of low-conflict solar development areas in the San Joaquin Valley. These areas were identified as having the highest renewable energy resource development potential while avoiding areas with high biodiversity conservation and agricultural resource protection goals. Within Fresno County, there are approximately 70,800 acres of these low-conflict solar development areas, with the understanding that site-specific evaluation for individual projects is needed. Based on the CEC land use screens, most of the generation intertie (gen-tie) line and the

[1] Affiliates means IP Darden II, LLC, IP Darden III, LLC, IP Darden IV, LLC, IP Darden BESS I, LLC, IP Darden BESS II, LLC, IP Darden BESS III, LLC, IP Darden BESS IV, LLC, IP Darden I H2, LLC, IP Darden II H2, LLC, and IP Darden BAAH, LLC. IP Darden I, LLC and Affiliates are wholly owned subsidiaries of Intersect Power, LLC.

Project itself are located in the CEC's draft "least conflict" areas suitable for renewable energy development near a regional transmission line (Figure 6-1).

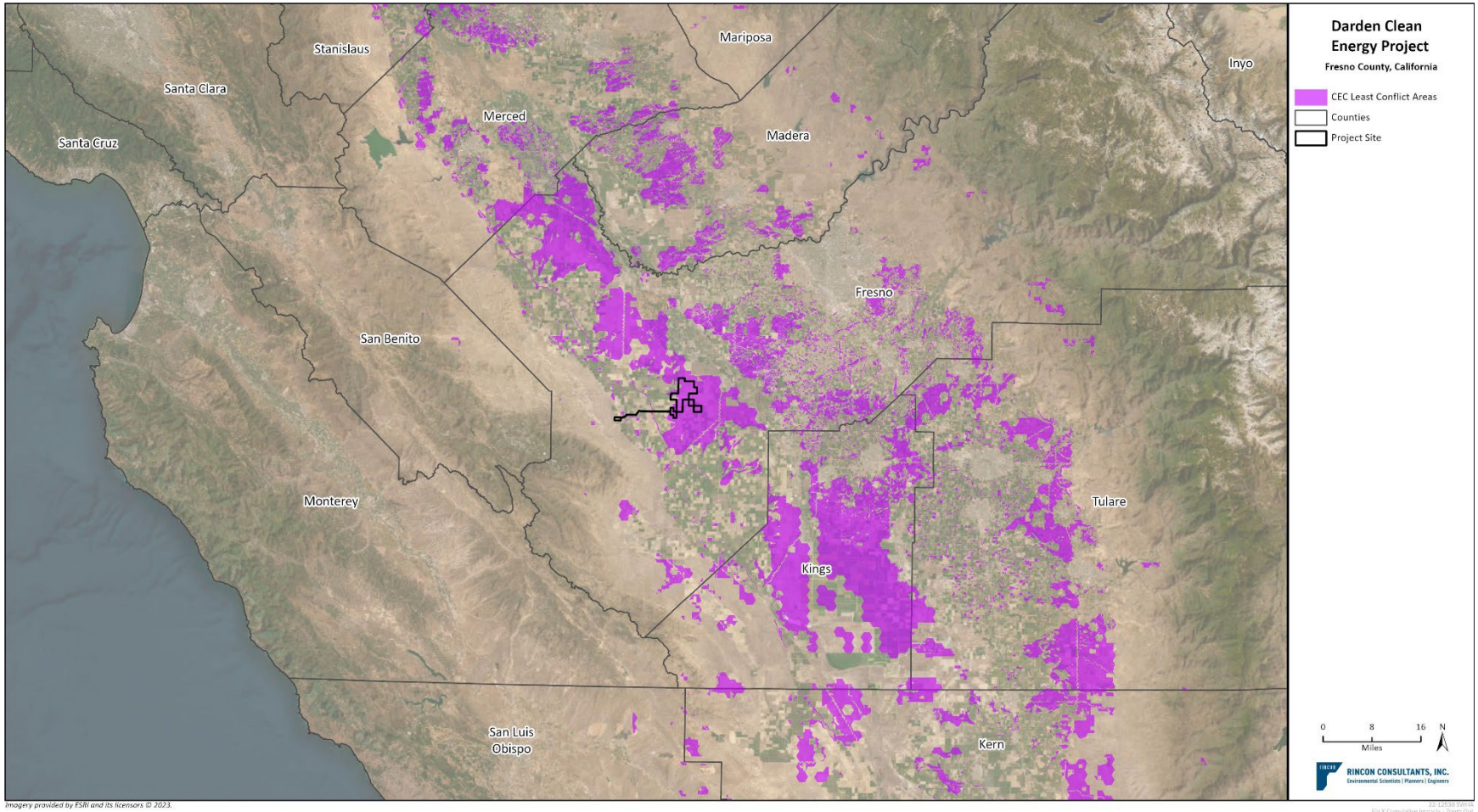
The Fresno County General Plan land use designation for the Project site is Agriculture. The Project site is within the AE-40 (Exclusive Agricultural, 40-acre minimum parcel size) and AE-20 (Exclusive Agricultural, 20-acre minimum parcel size) Zone Districts. Within these zoning districts, Fresno County permits utility-scale renewable energy uses with an Unclassified Conditional Use Permit based on the provisions set forth in Section 853.B.14 of the Zoning Ordinance of the County of Fresno. Further, the Project site is primarily sited on retired agricultural lands that have contaminated soils due to high levels of salt and selenium buildup.

The Project site was selected to largely avoid areas where Project implementation would impact Williamson Act-contracted land. The majority of parcels spanned by the gen-tie line, as well as the proposed point of intersection/utility switchyard site are under Williamson Act contract. However, cancellation of these contracts would not be required because ongoing operation of the gen-tie line would permit existing agricultural activities to continue and the Project components would be a compatible use, per Government Code Section 51238(a)(1). Approximately 9,115 acres of the 9,500-acre Project site, which would be utilized for the Project's solar facility, BESS, and green hydrogen generation components, are not Williamson Act-contracted land.

The Project utility switchyard location is adjacent to the existing PG&E Los Banos-Midway #2 500 kV line and other existing transmission lines, which the Project, as well as future projects, would tie into. Additionally, the parcels are highly disturbed due to their former agricultural use, thereby making them poor habitat for sensitive species.

As a result of these attributes, the Project site is uniquely well-suited for solar, BESS, and green hydrogen generation facilities, and no equivalent alternative Project location satisfies the siting constraints analysis. Consequently, no alternative sites are under further consideration for the Project at this time.

Figure 6-1 Least Conflict Areas



6.2 "No Project" Alternative

The California Environmental Quality Act (CEQA) requires an evaluation of a "No Project" alternative so that decision-makers can compare the impacts of approving the Project with the impacts of not approving the Project (CEQA Guidelines, section 15126.6[e]). Under the No Project alternative, the Project components—including the proposed solar facility, BESS, green hydrogen facility, step-up substation, gen-tie line, and utility switchyard—would not be constructed. Construction and operation of these facilities, as described in Chapter 2, *Project Description*, would not occur. It is assumed that the approximately 9,500-acre Project site would remain in its current condition, consisting largely of retired agricultural land. If future development were to occur on the Project site under this alternative, it would presumably occur incrementally and in accordance with the underlying covenants, zoning, and land use regulations governing development of the site.

If the Project were not constructed, none of the Project objectives would be met, and the associated environmental, economic, and policy benefits would not be realized. A significant carbon-free contribution to the State's ambitious renewable energy and storage needs through the construction and operation of solar and green hydrogen facilities would go unmet. The California Air Resources Board's (CARB's) 2022 Scoping Plan for Achieving Carbon Neutrality projects that an additional approximately 29,000 megawatts (MW) of customer solar and nearly 37,000 MW-hours (MWh) of battery storage will be required by 2045 to meet the State's goal of carbon neutrality under its Scoping Plan Scenario (CARB 2022). The Project's 1,150 MW solar facility and 4,600 MWh BESS would contribute approximately 4 percent and 12 percent toward the State's cumulative resource needs for solar and battery storage, respectively. Under the No Project alternative, this significant contribution would not occur. Furthermore, the No Project alternative would have compounding deleterious effects on the ability to meet the State's carbon-free energy goals, as the utility switchyard, a vital new point of interconnection in the Central Valley, proposed under the Project would not be constructed for future generators to use.

The No Project alternative could result in greater fossil fuel consumption, greenhouse gas emissions, air pollution, climate change, and other environmental impacts in the State because the Project would not be constructed to augment the State's energy supply with carbon-free and renewable energy and energy storage. For these reasons, the No Project alternative would not meet the Project objectives and would fail to deliver environmental benefits related to energy, air quality, and greenhouse gas emissions. However, because the No Project alternative is a CEQA-required alternative, a more detailed discussion of potential environmental impacts of the No Project alternative relative to the Project, as well as a discussion of whether the alternative avoids or reduces any significant impacts of the Project are provided in the sections that follow. Because CEQA requires the discussion of alternatives to focus on alternatives that could reduce or eliminate the significant impacts of a proposed project, the discussion below includes only those resource areas and impact evaluation criteria where a potentially significant impact has been identified for the Project.

6.2.1 Cultural Resources and Tribal Cultural Resources

As described in Section 5.1, *Cultural Resources and Tribal Cultural Resources*, impacts to cultural resources associated with Project construction would be less than significant with incorporation of Mitigation Measures CUL-1 through CUL-7 due to the depth of proposed ground-disturbing activities and location within high-sensitivity sediments, as well as impacts to an identified archaeological resource (Darden-ISO-CJ-68) determined to be eligible for the National Register of Historic Places

(NRHP) and California Register of Historical Resources (CRHR). Under the No Project alternative, construction of the Project's proposed solar facility, BESS, and green hydrogen facility would not occur. Nevertheless, ground-disturbing activities, such as agricultural or residential development, could still occur over time consistent with the underlying zoning, regulations, and covenants governing land use on the site. While such development may occur within archaeologically sensitive sediments that underlie portions of the Project site, is unlikely to reach the intensity or depth of ground-disturbance associated with construction of the Project's proposed infrastructure components. It is also assumed that avoidance of Darden-ISO-CJ-68 may be achieved under the No Project alternative, as any future development of the site would presumably occur in a more fragmented manner and future projects would undergo the appropriate level of project-specific environmental review. For this reason, impacts to cultural resources under the No Project alternative would be less than significant and reduced relative to the Project.

Operation of the Project would result in no impact to cultural resources, and impacts to tribal cultural resources associated with the Project have not been determined at this time. Because the No Project alternative would not avoid or substantially lessen any potential significant effects of Project operation on cultural resources and because no impacts to tribal cultural resources associated with the Project have been identified, no further analysis of these issue areas is warranted.

6.2.2 Noise

As described in Section 5.3, *Noise*, the Project would result in a potentially significant noise impact due to operation of the proposed green hydrogen facility at the Option 1 or Option 2 sites, which could increase operational noise at nearby sensitive receptors above Fresno County's exterior noise standards. This impact would be reduced to a less-than-significant level with implementation of Mitigation Measure NOI-1, which requires quantitative analysis and implementation of measures such as operation hours restrictions, setbacks, barriers, and other shielding techniques to reduce operational noise. Under the No Project alternative, none of the proposed noise-generating facilities, including the green hydrogen facility, would be constructed. Future development on the Project site may result in noise-generating activities, such as construction activities, operation of agricultural equipment, or vehicular traffic. Noise associated with these activities would be likely be similar in nature and magnitude to noise generating activities occurring throughout the site presently. If they were to occur, future development projects would undergo the appropriate level of project-specific environmental review and would mitigate potential noise impacts to the degree feasible. Because the No Project alternative would not involve construction of new noise sources on the Project site, no impact with respect to noise would occur. This impact would be reduced relative to the Project.

The Project would not result in any other potentially significant noise impacts that may be avoided or substantially lessened by this alternative.

6.2.3 Traffic and Transportation

As discussed in Section 5.4, *Traffic and Transportation*, the Project would result in one potentially significant impact due to generation of construction-related vehicle miles travelled (VMT). This impact would be reduced to a less-than-significant level with incorporation of Mitigation Measure TRA-1, which would require preparation of a Construction Traffic Carpool and Trip Reduction Plan for review by affected jurisdictions. Under the No Project alternative, construction activities associated with the Project would not occur. While individual development projects may occur

consistent with the underlying zoning, regulations, and covenants governing land use on the approximately 9,500-acre Project site, such projects would generally draw a smaller and more localized construction workforce and, therefore, would be unlikely to generate construction-related trips and VMT at the scale considered by the Project. This impact under the No Project alternative would be less than significant and Mitigation Measure TRA-1 would not be necessary. Impacts would be reduced relative to the Project.

The Project would not result in any other potentially significant transportation impacts that may be avoided or substantially lessened by this alternative.

6.2.4 Visual Resources

As described in Section 5.5, *Visual Resources*, the Project would result in a potentially significant impact due to a reduction of the existing visual character and quality of public views of the site and its surroundings. Impacts from the solar facility, step-up substation, gen-tie, BESS, and hydrogen facility components would be reduced to a less-than-significant level with implementation of Mitigation Measure VIS-1, which would require preparation of a Surface Treatment Plan for these Project components to reduce visual contrast with the surrounding environment. Impacts from the utility switchyard would be reduced to a less-than-significant level with implementation of Mitigation Measure VIS-2, which would require preparation of a Utility Switchyard Surface Treatment Plan for this Project component to reduce visual contrast with the surrounding environment consistent with PG&E's surface treatment standards. Under the No Project alternative, none of the infrastructure components considered under the Project would be constructed and the rural character of western Fresno County would persist. As agricultural lands in the Westlands Water District are retired (an action occurring independent of the Project and related to water policy decisions), shifts in land use may affect visual character and quality in the local area. These shifts could result in similar visual changes as the Project would generate if other solar facilities become a dominant use of retired agricultural lands. As particulars about such land use shifts are unknown, it is assumed that the existing visual character and quality of public views of the Project site and its surroundings would generally remain unchanged. As such, no impact to visual resources would occur under this alternative, and impacts would be reduced relative to the Project.

The Project would not result in any other potentially significant visual resources impacts that may be avoided or substantially lessened by this alternative.

6.2.5 Socioeconomics

The following sections provide a comparative economic merit analysis for the No Project alternative, including discussions of population and housing, economy and employment, County fiscal resources, community character, public services and facilities, and utilities.

Population and Housing

Under the No Project alternative, population trends in the region would continue as described in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*. The population in western Fresno County would continue to fluctuate throughout the year as the migratory agricultural workforce increases during the harvest season from approximately February to June. Housing trends would continue as described in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*. Housing supply would continue to be particularly constrained in western Fresno County, especially during times of peak demand associated with the agricultural season and migratory workforce. If

the Project is not constructed it would not contribute to additional demand or potential displacement of any other temporary residents in western Fresno County. It also would not lead to additional demand for available hotel/motel capacity in the Fresno metropolitan area. Affordable housing would remain a critical need and priority for local governments in the study region defined in Section 5.6, *Socioeconomics*.

Economy and Employment

Under the No Project alternative, economic and employment trends would continue as described in in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*, with considerable near-term uncertainty given recent economic conditions related to the COVID-19 pandemic and related economic recession and government stimulus.

As it would not be built or operated, the Project would not contribute to spending and associated employment and income in the study region, temporarily for construction or over the long-term operational period. Local labor resources the Project would have consumed would be available for other economic investments, should they arise. Other economic investments would continue to generate spending, employment opportunities, and income in the study area. The distribution of spending and economic effects across industries in the study region from other potential economic investments may differ from those estimated for the Project. It is unknown whether any projects would arise that would generate similar levels of spending during construction or operation in the absence of the Project.

Agricultural Production

Gen-Tie Line

Agricultural land permanently converted for the gen-tie line footings, outside of the properties currently owned by Westlands Water District, would continue to be available for agricultural production if the Project is not built. This agricultural production would continue to support employment and income. This amount of agricultural land and production is very small relative to agricultural production in the study region; therefore, the change in direct and indirect employment impacts that would not occur under the No Project alternative would also be very small, as Table 6-1 shows. This continued production, employment, and income represents substantially less than one percent of current levels.

Alternate Green Hydrogen

Agricultural land permanently converted for the alternate green hydrogen facility would continue to be available for agricultural production. This agricultural production would continue to support employment and income. This amount of agricultural land and production is very small relative to agricultural production in the regional study area, so the change in direct and indirect employment impacts that would not occur under the “No Project” alternative would also be very small, as Table 6-1 shows. This continued production, employment, and income represents significantly less than one percent of current levels.

Utility Switchyard

Agricultural land permanently converted for the utility switchyard would continue to be available for agricultural production, if the Project is not built. This agricultural production would continue to support employment and income. This amount of agricultural land and production is very small

relative to agricultural production in the study region, so the change in direct and indirect employment impacts that would not occur under the No Project alternative would also be very small, as Table 6-1 shows. This continued production, employment, and income represents substantially less than one percent of current levels.

Solar Facility with Option 1 and Option 2 Project Components

Agricultural land permanently converted for the Project Option 1 or Option 2 components with or without the green hydrogen facility would continue to be available for agricultural production, if the Project is not built. This agricultural production would continue to support employment and income. This amount of agricultural land and production is very small relative to agricultural production in the regional study area, so the change in direct and indirect employment impacts that would not occur under the No Project alternative would also be very small, as Table 6-1 shows. This continued production, employment, and income represents less than one percent of current levels.

Table 6-1 Agricultural Production Gen-Tie Footings: Output, Income, and Employment

Impact	Direct	Indirect	Induced	Total
Total Option 1				
Jobs	2	2	1	5
Income	$100,000	$135,000	$47,000	$282,000
Output	$676,000	$238,000	$143,000	$1,057,000
Total Option 2				
Jobs	2	2	1	5
Income	$100,000	$135,000	$47,000	$282,000
Output	$676,000	$238,000	$143,000	$1,057,000
Total Alternate Green Hydrogen				
Jobs	3	4	1	8
Income	$182,000	$245,000	$85,000	$513,000
Output	$1,225,000	$434,000	$259,000	$1,919,000

Source: IMPLAN 2021, ECONorthwest analysis
Notes: Dollar year 2022

County Fiscal Resources

Under the No Project alternative, government revenue associated with developing and operating the Project would not occur. This revenue includes the sales tax revenue associated with local Project spending during construction and operation, the one-time school impact fee revenue associated with new construction of enclosed space, and any property tax revenue over the life of the Project that would have come from increased assessed value of property from Project improvements and changes in status from exclusive agricultural use. Other economic investments would continue to generate government revenue from spending, development, and property improvements in the study area. It is unknown whether any of these improvements would generate additional tax revenue impacts at the scale that the Project would have.

The very minor amount of agricultural production that the Project would displace would continue to generate government revenue from purchases on inputs under the No Project alternative. Because this land would remain in production it would continue to be eligible for tax exemption under the

Williamson Act, resulting in lower property tax collections than would likely occur with the Project on those displaced acres.

Community Character

Under the No Project alternative the rural character of western Fresno County would persist. The concentration of workers would not arise from Project-related construction workforce demand. As agricultural lands in the Westlands Water District are retired (an action occurring independent of the Project and related to water policy decisions), shifts in land use may affect community character in the local area. Compared to the Project alternative, these shifts could result in similar changes in community character as the Project would generate if other solar facilities become a dominant use of retired agricultural lands. These changes may be viewed positively or negatively by residents and visitors, depending on individual preferences. The Project would provide investments in the community through the Community Benefits Agreement in development (in addition to the increases in local spending and tax revenues that would benefit local businesses and residents). These investments and the benefits they generate for residents would not occur under the No Project alternative.

Public Services and Facilities

Under the No Project alternative, potential impacts associated with project-related demands on public services including law enforcement, fire protection, and emergency medical services would not occur. These impacts include potential increased demand during Project construction related to the concentrated workforce and construction activities, and long-term increased demand during Project operation related to potential increased potential for theft and vandalism and demand for fire services. If the Project is not constructed, public service agencies would not need to dedicate resources to coordination and planning for increased demand that the Project could generate. These public services would continue operating as described in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*, with relatively dispersed resources and longer response times in western Fresno County arising from the lower population concentrations over a wide area. Demand for these services would continue to increase somewhat with fluctuations in the temporary population associated with the agricultural production cycle. Impacts to law enforcement, fire protection and emergency services under the No Project alternative would be less than significant and Mitigation Measure SOC-1 would not be necessary. Impacts would be reduced relative to the Project.

The Project would not result in any other potentially significant public services and facilities impacts that may be avoided or substantially lessened by this alternative.

Utilities

The Project would not result in any potentially significant utilities-related impacts that may be avoided or substantially lessened by this alternative.

6.2.6 Air Quality

As described in Section 5.7, *Air Quality*, the Project would result in potentially significant impacts related to generation of a cumulatively considerable net increase of criteria pollutants and potential to conflict with or obstruct implementation of an applicable air quality plan. Specifically, Project construction could result in exceedances of San Joaquin Valley Air Pollution Control District (SJVAPCD) annual and daily emissions thresholds for nitrous oxides (NO_X), carbon monoxide (CO),

and particulate matter with a diameter of 10 microns or less (PM_{10}), as well as daily emissions thresholds for particulate matter with a diameter of 2.5 microns or less ($PM_{2.5}$). Impacts would be reduced to a less-than-significant level with implementation of Mitigation Measures AQ-1, requiring a voluntary emissions reduction agreement, and AQ-2, requiring a fugitive dust control plan. Under the No Project alternative, development of the Project site as envisioned under the Project and associated construction air quality emissions would not occur. Activities on the Project site associated with existing agricultural land uses may continue. Such activities may result in emissions of criteria pollutants, but these emissions would be consistent with those already occurring on the site. Individual projects may occur on the Project site on a case-by-case basis in the future, but such projects would be of a lesser scale and would result in substantially reduced emissions of criteria pollutants, including NO_X, CO, PM_{10}, and $PM_{2.5}$, relative to the Project. Furthermore, future projects on the Project site would be subject to all applicable SJVAPCD regulations intended to be protective of air quality in the region. As such, air quality impacts under the No Project alternative would be less than significant and reduced relative to the Project.

The Project would not result in any other potentially significant air quality impacts that may be avoided or substantially lessened by this alternative.

6.2.7 Public Health

As described in Section 5.8, *Public Health*, the Project would result in one potentially significant impact related to generation of fugitive dust and Valley Fever-causing *Coccidioides* fungal spores. This impact would be reduced to a less-than-significant level with incorporation of Mitigation Measure PH-1, which requires preparation of a fugitive dust control plan with specific measures intended to reduce exposure of Project personnel and the public to Valley Fever. Under the No Project alternative, ground disturbance at the scale envisioned under the Project would not occur on the Project site. However, individual projects and ground-disturbing activities may continue to occur on the site consistent with the underlying zoning, regulations, and covenants. Such activities include agricultural tilling and plowing, and construction of agricultural or residential structures. These projects have potential to generate fugitive dust and make airborne Valley Fever-causing fungal spores. All activities on the Project site would remain subject to applicable SJVAPCD regulations, including SJVAPCD Rule 8021 pertaining to fugitive dust control for future construction, demolition, and earthmoving activities, and SJVAPCD Rule 8081 for control of agricultural sources of fugitive dust. Because ground-disturbing activities would be substantially reduced under the No Project alternative and fugitive dust control practices would be implemented consistent with applicable SJVAPCD regulations, impacts related to Valley Fever would be less than significant and reduced relative to the Project.

The Project would not result in any other potentially significant public health impacts that may be avoided or substantially lessened by this alternative.

6.2.8 Biological Resources

As described in Section 5.12, *Biological Resources*, the Project would result in a potentially significant impact due to the potential for construction and operation of Project components to substantially adversely affect species identified as candidates, 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. Specifically, Project components could directly or indirectly impact the following special-status species: tricolored blackbird (*Agelaius tricolor*), burrowing owl (*Athene cunicularia*), ferruginous hawk (*Buteo regalis*), Swainson's hawk (*Buteo swainsoni*), California condor

(*Gymnogyps californianus*), mountain plover (*Choradrius montanus*), northern harrier (*Circus hudsonius*), white-tailed kite (*Elanus luecurus*), California horned lark (*Eremophila alpestris actia*), prairie falcon (*Falco mexicanus*), yellow-headed blackbird (*Xanthocephalus xanthocephalus*), loggerhead shrike (*Lanius ludovicianus*), Oregon vesper sparrow (*Pooecetes framineus affinus*), yellow warbler (*Setophaga petechia*), San Joaquin kit fox (*Vulpes macrotis mutica*), American badger (*Taxidea taxus*), and San Joaquin coachwhip (*Masticophis flagellum ruddocki*). Project components may also impact common bird species protected under the Migratory Bird Treaty Act (MBTA) and California Fish and Game Code (CFGC). All impacts would be reduced to a less-than-significant level with implementation of Applicant Proposed Measure BIO-1 and Mitigation Measures BIO-1 through BIO-8, which include completion of Worker Environmental Awareness Training, construction best management practices (BMPs), nest buffers, and various species-specific avoidance measures.

Under the No Project alternative, large-scale development of the site as envisioned under the Project would not occur. Limited agricultural land uses on the approximately 9,500-acre Project site would continue and impacts to special-status species would remain consistent with those occurring under baseline conditions. Impacts from the No Project alternative would be less than significant and impacts to biological resources would be reduced relative to the Project.

The Project would not result in any other potentially significant biological resources impacts that may be avoided or substantially lessened by this alternative.

6.2.9 Water Resources

As described in Section 5.13, *Water Resources*, to ensure that sufficient water supply would be available to the Project and reliable for the green hydrogen facilities during Project operations, the Project would be required to implement Mitigation Measure WAT-1, *Water Supply Contingency Plan*. With implementation of Mitigation Measure WAT-1, the Project would minimize or avoid potential to substantially decrease supplies in the Westside Subbasin or contribute to ongoing Critical Overdraft conditions. In addition, the Project would not conflict with or obstruct implementation of a sustainable groundwater management plan, the Westside Subbasin Groundwater Sustainability Plan, as implementation of Mitigation Measure WAT-1 would demonstrate water supply reliability for the Project's long-term demands associated with cleaning solar panels and providing water for the green hydrogen component. Under the No Project alternative, development of the site may still occur consistent with the underlying zoning, regulations, and covenants governing land use on the site. The majority of the Project site is retired from irrigated agriculture. However, some portions of the Project site, including areas west of Interstate 5, are actively farmed and irrigated. It is assumed such areas would continue to be irrigated under the No Project alternative, which would contribute to existing groundwater depletion issues and sustainable groundwater management challenges in the region. Under the No Project alternative, these existing issues would persist, but would be anticipated to improve through implementation of the Westside Subbasin Groundwater Sustainability Plan. Additionally, continued irrigation would provide limited opportunity for recharge of the underlying groundwater, which would not occur with water extracted and used in support of the proposed green hydrogen facility. Therefore, impacts with respect to groundwater supplies and sustainable groundwater management under the No Project alternative would be less than significant and reduced relative to the Project.

The Project would not result in any other potentially significant water resources impacts that may be avoided or substantially lessened by this alternative.

6.2.10 Paleontological Resources

As described in Section 5.15, *Paleontological Resources*, impacts to paleontological resources associated with Project construction would be less than significant with incorporation of Mitigation Measures PAL-1 through PAL-5 due to the depth of proposed ground-disturbing activities and location within high-sensitivity sediments. Under the No Project alternative, construction of the Project's proposed solar facility, BESS, and green hydrogen facility would not occur. Nevertheless, ground-disturbing activities, such as agricultural or residential development, could still occur over time consistent with the underlying zoning, regulations, and covenants governing land use on the site. While such development may occur within paleontologically sensitive sediments that underlie portions of the Project site, is unlikely to reach the intensity or depth of ground-disturbance associated with construction of the Project's proposed infrastructure components. For this reason, impacts to paleontological resources under the No Project alternative would be less than significant and reduced relative to the Project.

The Project would not result in any other potentially significant paleontological resources impacts that may be avoided or substantially lessened by this alternative.

6.3 No Hydrogen Alternative

Under the No Hydrogen alternative, the green hydrogen facility (Option 1 and Option 2 and alternate sites) proposed as part of the Project would not be constructed. Specifically, construction and operation of an approximately 100- to 225-acre green hydrogen facility consisting of an electrolyzer and water treatment plant (WTP) would not occur either near/within the solar facility (Option 1 or Option 2 sites) or west of Interstate 5 (alternate site). Furthermore, the approximately 20-acre green hydrogen switchyard and green hydrogen substation would not be constructed at the alternate green hydrogen facility site. Under this alternative, solar panels would be constructed on the Option 1 and Option 2 green hydrogen facility sites as part of the Project's proposed solar facility, decreasing the density of solar panels across the solar site. While the construction and operation of solar panels at this site would not increase the energy generating capacity of the proposed solar facility, use of the green hydrogen facility Option 1 and 2 sites for solar generation would potentially result in engineering benefits associated with improved efficiency due to increased spacing between panels. The alternate green hydrogen facility site located west of Interstate 5 would remain in its existing condition and would not be developed as part of the Project, aside from the easement for the gen-tie line. The No Hydrogen alternative would represent no reduction to Project footprint if the Project were constructed using the Options 1 of 2 sites for the green hydrogen facility, and an approximately 120-acre reduction to Project footprint if the Project were constructed using the alternate site for the green hydrogen facility. Figure 6-2 shows the configuration of components under the No Hydrogen alternative.

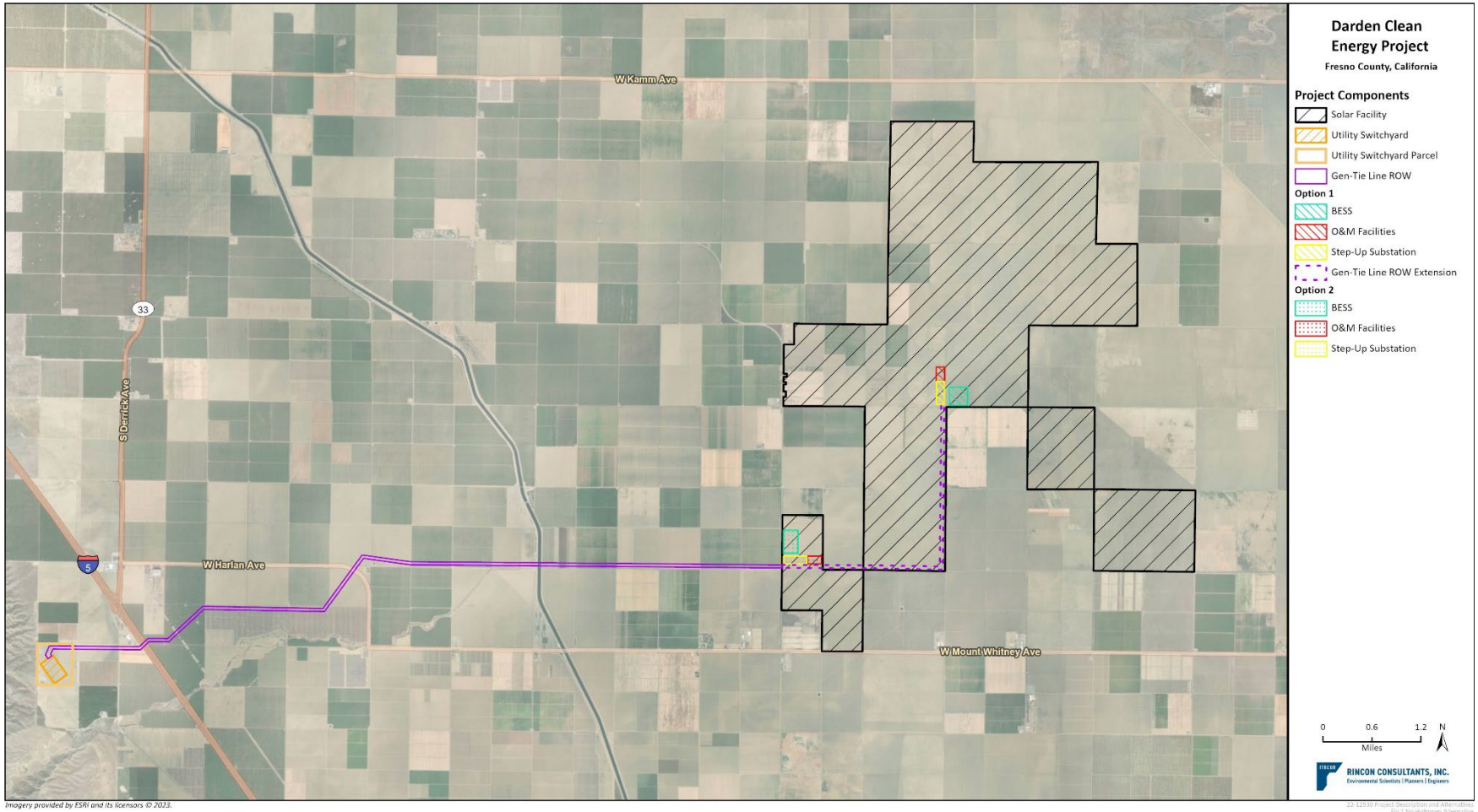
Under this alternative, operation and maintenance activities associated with the Project's green hydrogen facility would not occur. No hydrogen storage would occur on the Project site. The approximately 24 full time personnel needed to support the green hydrogen facility would not be required. Additionally, water use associated with the green hydrogen facility's electrolyzer would not occur, resulting in a net reduction of water consumption of approximately 1,000 acre-feet per year (AFY) relative to the Project.

The No Hydrogen alternative would result in many of the same environmental, economic, and policy benefits that the Project would generate, as this alternative would satisfy the 11 Project objectives

related to the solar facility and two Project objectives related to the BESS. However, this alternative would not satisfy any of the four Project objectives related to the green hydrogen facility. Consequently, overall benefits would be lessened relative to the Project. The green hydrogen facility constructed under the Project is anticipated to produce an average of up to 220 metric tons of green hydrogen per day, or approximately up to 80,300 tons of green hydrogen per year. Under the No Hydrogen alternative, this hydrogen production and associated transport of hydrogen via pipeline would not occur.

Green hydrogen technology represents a key strategy in support of the State's carbon-free energy goals. CARB estimates in its 2022 Scoping Plan for Achieving Carbon Neutrality that the State will need to increase its annual supply of green hydrogen by roughly 1,700 times its 2022 demand in order to accommodate demand for green hydrogen across all industries by 2045 (CARB 2022). The Project would contribute hydrogen needed to close this gap in hydrogen supply by 2045. Under the No Hydrogen alternative, the Project would not contribute to the State's hydrogen supply, and the Project objectives related to the green hydrogen facility would go unmet. Nevertheless, because the No Hydrogen alternative would meet most of the Project objectives, a more detailed discussion of potential environmental impacts of the No Hydrogen alternative relative to the Project as well as a discussion of whether the alternative avoids or reduces any significant impacts of the Project are provided in the sections that follow. Because CEQA requires the discussion of alternatives to focus on alternatives that could reduce or eliminate the significant impacts of a proposed project, the discussion below includes only those resource areas and impact evaluation criteria where a potentially significant impact has been identified for the Project.

Figure 6-2 No Hydrogen Alternative Components



6.3.1 Cultural Resources and Tribal Cultural Resources

As described in Section 5.1, *Cultural Resources and Tribal Cultural Resources*, impacts to cultural resources associated with Project construction would be less than significant with incorporation of Mitigation Measures CUL-1 through CUL-7 due to the depth of proposed ground-disturbing activities and location within high-sensitivity sediments, as well as impacts to an identified archaeological resource (Darden-ISO-CJ-68) determined to be eligible for the NRHP and CRHR. Under the No Hydrogen alternative, construction and operation of the Project's proposed green hydrogen facility would not occur at either the Option 1, Option 2, or alternate site locations. However, the proposed solar facility and BESS would be constructed, with the proposed solar facility expanded to cover the Option 1 and Option 2 sites in lieu of the green hydrogen facility. Under the No Hydrogen alternative, impacts to Darden-ISO-CJ-68—located within the proposed solar facility—would still occur. Furthermore, ground-disturbance would still occur within geologic units with high archaeological sensitivity at the sites of the proposed solar facility, the utility switchyard, and along the proposed gen-tie line corridor. As with the Project, Mitigation Measures CUL-1 through CUL-7 would apply, requiring designation of a Cultural Resources Specialist (CRS), collection of Darden-ISO-CJ-68 prior to construction, preparation of an Archaeological Monitoring and Discovery Plan, completion of a worker environmental awareness program, archaeological monitoring during activities within archaeologically sensitive geologic units, implementation of an unanticipated discoveries protocol, and implementation of a human remains discovery protocol. Therefore, impacts to cultural resources under the No Hydrogen alternative would be less than significant with mitigation incorporated; such impacts would be similar relative to the Project.

The Project would not result in any other potentially significant cultural resource impacts that may be avoided or substantially lessened by this alternative, and impacts to tribal cultural resources associated with the Project have not been determined at this time.

6.3.2 Noise

As described in Section 5.3, *Noise*, the Project would result in a potentially significant impact due to operation of the proposed green hydrogen facility at the Option 1 or Option 2 sites, which could increase operational noise at nearby sensitive receptors above Fresno County's exterior noise standards. This impact would be reduced to a less-than-significant level with implementation of Mitigation Measure NOI-1, which requires quantitative analysis and implementation of measures such as operation hours restrictions, setbacks, barriers, and other shielding techniques to reduce operational noise. Under the No Hydrogen alternative, the proposed green hydrogen facility would not be constructed, and this operational noise impact would not occur and Mitigation Measure NOI-1 would not be necessary. While the potential green hydrogen sites would instead be developed with additional solar facility components, such components would not increase the capacity of the proposed solar facility and would not be anticipated to result in any appreciable increase in operational noise associated with the proposed solar facility. As with the Project, construction noise impacts and operational noise impacts associated with the proposed solar facility, BESS, utility switchyard, traffic, and workers would be less than significant under this alternative. No impact with respect to airports or air strips would occur. Therefore, because this alternative would avoid the potentially significant operational noise impact associated with operation of the proposed green hydrogen facility, noise impacts under the No Hydrogen alternative would be less than significant and reduced relative to the Project.

The Project would not result in any other potentially significant noise impacts that may be avoided or substantially lessened by this alternative.

6.3.3 Traffic and Transportation

As discussed in Section 5.4, *Traffic and Transportation*, the Project would result in one potentially significant impact due to generation of construction-related VMT. This impact would be reduced to a less-than-significant level with incorporation of Mitigation Measure TRA-1, which would require preparation of a Construction Traffic Carpool and Trip Reduction Plan for review by affected jurisdictions. Under the No Hydrogen alternative, construction of the proposed green hydrogen facility would not occur, but construction of other Project components—including the proposed solar facility, BESS, and utility switchyard—would still take place. Any reduction in construction-related VMT associated with removal of the green hydrogen facility scope element would be at least partially offset by additional construction associated with the proposed solar facility at the Option 1 and Option 2 sites. As with the Project, Mitigation Measure TRA-1 would apply, reducing construction-related VMT by encouraging ridesharing opportunities, hiring local construction workers, or employing other strategies to reduce construction trips. Therefore, under the No Hydrogen alternative, impacts to traffic and transportation would be less than significant with mitigation incorporated. Such impacts would be similar relative to the Project.

The Project would not result in any other potentially significant transportation impacts that may be avoided or substantially lessened by this alternative.

6.3.4 Visual Resources

As described in Section 5.5, *Visual Resources*, the Project would result in a potentially significant impact due to a reduction of the existing visual character and quality of public views of the site and its surroundings. Impacts from the solar facility, step-up substation, gen-tie, BESS, and green hydrogen facility components would be reduced to a less-than-significant level with implementation of Mitigation Measure VIS-1, which would require preparation of a Surface Treatment Plan for these Project components to reduce visual contrast with the surrounding environment. Impacts from the utility switchyard would be reduced to a less-than-significant level with implementation of Mitigation Measure VIS-2, which would require preparation of a Utility Switchyard Surface Treatment Plan for this Project component to reduce visual contrast with the surrounding environment consistent with PG&E's surface treatment standards. Under the No Hydrogen alternative, construction of the green hydrogen facility proposed under the Project would not occur, but all other Project components including the proposed solar facility, gen-tie line, BESS, and utility switchyard would be constructed.

Under the Project, the proposed green hydrogen facility would contribute to a decrease in visual intactness and unity within the Project vicinity as shown at Key Observation Points (KOPs) 3, 4, and 6 due to the presence of solid white, cylindrical structures that contrast from their surroundings. Under the No Hydrogen alternative, these components would not be constructed and, as such, would not contribute to a decrease in visual quality at these KOPs. Nevertheless, construction of the proposed solar array and gen-tie line would reduce visual quality within the Project vicinity as shown at KOPs 1, 2, 3, 4, and 6. As with the Project, this impact would be potentially significant. Implementation of Mitigation Measure VIS-1 and VIS-2 would require a Surface Treatment Plan to minimize Project components' contrast with their surroundings, reducing this potential impact to a less-than-significant level. Therefore, like the Project, impacts to visual resources under the No Hydrogen alternative would be less than significant with mitigation incorporated. Because the

proposed green hydrogen facility would not contribute to a reduction in visual quality within the Project vicinity as shown at KOPs 3, 4, and 6 under this alternative, impacts would be reduced relative to the Project.

The Project would not result in any other potentially significant visual resources impacts that may be avoided or substantially lessened by this alternative.

6.3.5 Socioeconomics

The following sections provide a comparative economic merit analysis for the No Hydrogen alternative, including discussions of population, housing, economy and employment, County fiscal resources, community character, public services and facilities, and utilities.

Population

Under the No Hydrogen alternative, population trends in the region would continue as described in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*. Non-local workers needed to construct the solar facility, BESS, and related components would represent a very small temporary increase in the population of the study region. Compared to the Project, the No Hydrogen alternative would have up to 18 fewer non-local workers at peak construction. Local and non-local construction workers combined at peak would continue to represent a large concentration of workers relative to the local population under the No Hydrogen alternative, though it would be somewhat smaller than the Project. This increase would be a temporary population change and would not represent unplanned population growth.

The operational workforce under both the No Hydrogen alternative and the Project would include all local workers, so would not increase the permanent population in the region.

Housing

Under the No Hydrogen alternative, housing trends in the region would continue as described in Section 5.6.1, *Environmental Setting* of Section 5.6, *Socioeconomics*. Housing supply would continue to be particularly constrained in western Fresno County, especially during times of peak demand associated with the agricultural season and migratory workforce. Under the No Hydrogen alternative, demand for temporary housing would decrease somewhat with up to 18 fewer non-local workers seeking accommodations. Combined across the Project components (including the solar facility, step-up station, and gen-tie; BESS; and utility switchyard) the remaining demand of about 60 non-local workers at peak construction represents a tiny percent of the approximately 9,000 units of available vacant housing much of which is in hotel/motels. If these workers seek temporary housing in western Fresno County during the harvest season, when vacancy rates are very low, there is the potential for displacement of other migrant workers.

The operational workforce under both the No Hydrogen alternative and the Project would include all local workers; therefore, neither would increase demand for temporary housing in the region.

Economy and Employment

Construction of the No Hydrogen alternative would produce somewhat less spending in the study region compared to the Project, resulting in lower impacts on the economy and employment. Direct output and income would decrease by about $370 million and $15 million, respectively, compared to the Project (similar levels for both the 18- and 36-month construction periods). The No Hydrogen alternative would have up to 160 fewer direct construction workers compared to the Project and

would support up to 730 fewer secondary employment levels in the study region. Table 6-2 shows total direct and secondary (indirect and induced) impacts on the economy and employment for the 18-month construction period for the No Hydrogen alternative with Option 1 and Option 2 Project components. Levels for the 36-month construction period would be similar, but slightly higher.

Table 6-2 No Hydrogen Alternative Economy and Employment Impacts

Impact	Direct	Indirect	Induced	Total
Total Option 1				
Jobs	2,280	1,140	980	4,400
Income	$206,105,000	$78,034,000	$54,945,000	$339,084,000
Output	$892,893,000	$278,787,000	$166,721,000	$1,338,401,000
Total Option 2				
Jobs	2,280	1,120	970	4,370
Income	$206,105,000	$76,583,000	$54,652,000	$337,340,000
Output	$879,243,000	$273,288,000	$165,832,000	$1,318,363,000

Source: IMPLAN 2021, ECONorthwest
Note: Data shown is for the 18-month construction scenario.

Operation of the No Hydrogen alternative would require 24 fewer workers, resulting in a permanent operational workforce of less than half (16 workers) compared to the Project alternative. Lower spending on operations under the No Hydrogen would reduce direct output (by about $5.8 million per year) and income (by about $1.7 million per year) in the study region. It would also produce lower secondary output, income, and employment in the study region.

Agricultural Production

The agricultural land permanently converted for the proposed alternate green hydrogen facility would continue to be available for use under the No Hydrogen alternative. The Project green hydrogen Options 1 and 2 site locations are on retired agricultural land that would not have agricultural production with or without the Project; moreover, the Option 1 and 2 site locations would be developed as the solar facility under this alternative. The agricultural production on roughly 169 total acres of land associated with the alternate green hydrogen facility would continue to support employment and income under this alternative. This amount of agricultural land and production is very small relative to agricultural production in the study region, so the change in direct and indirect employment impacts that would not occur under the No Hydrogen alternative would also be very small, as Table 6-3 shows. This continued production, employment, and income represents substantially less than one percent of current levels.

Table 6-3 Agricultural Production Alternative Hydrogen Location: Output, Income, and Employment

Impact	Direct	Indirect	Induced	TOTAL
Alternative Hydrogen				
Jobs	2.3	1.3	1.0	4.5
Income	$229,284	$83,468	$64,404	$377,156
Output	$583,273	$148,033	$195,638	$926,945

Notes: Dollar year 2022
Source: IMPLAN 2021, ECONorthwest

County Fiscal Resources

Lower spending in the region for construction of the No Hydrogen alternative would result in lower sales tax revenues by almost $11 million compared to the Project.

The No Hydrogen alternative would result in somewhat lower annual sales tax revenue collections due to lower overall operational spending compared to the Project, although the difference is unknown at this time. The No Hydrogen alternative would also have lower property tax revenue collections compared to the Project, arising from both lower overall assessed value of improvements and continued property tax exemptions associated with agricultural lands for the alternate green hydrogen facility. Insufficient information is currently available to calculate these revenues under either the No Hydrogen alternative or the Project.

Community Character

Under the No Hydrogen alternative the change in the rural character of western Fresno County arising from the temporary local population change during construction would be similar to the Project. The concentration of workers in western Fresno County would still occur at a similar scale from Project-related construction workforce demand.

The change in land use and community character during the operational phase would still occur under the No Hydrogen alternative, as the change primarily arises from the remaining Project components (including the solar facility, step-up substation, and gen-tie; BESS; and utility switchyard). These changes may be viewed positively or negatively by residents and visitors, depending on individual preferences.

The investments in the community through the Community Benefits Agreement would still occur under the No Hydrogen alternative (in addition to the increases in local spending and tax revenues that would benefit local businesses and residents). These investments would produce benefits for residents, likely at a similar level to the Project under this alternative.

Public Services and Facilities

The concentration of construction workers under both the No Hydrogen alternative and the Project would increase service demands for law enforcement, fire protection, and emergency medical service providers. The reduced construction workforce under the No Hydrogen alternative may reduce the incremental demand measured in terms of number of calls incrementally, although the need for coordination with local public service providers would remain unchanged. During operation, the No Hydrogen alternative would reduce impacts by a small amount to law enforcement, fire protection, and EMS providers compared to the Project. This reduction would occur because responders would not need to spend time on training, education, and coordination around potentially unique risks related to emergency response at the green hydrogen facility. While potential impacts to law enforcement, fire protection and emergency services under the No Hydrogen alternative would be reduced in comparison to the Project, they would remain potentially significant and Mitigation Measure SOC-1 would be required to reduce impacts to a less than significant level.

The Project would not result in any other potentially significant public services and facilities impacts that may be avoided or substantially lessened by this alternative.

Utilities

The Project would not result in any potentially significant utilities-related impacts that may be avoided or substantially lessened by this alternative.

6.3.6 Air Quality

As described in Section 5.7, *Air Quality*, the Project would result in potentially significant impacts related to generation of a cumulatively considerable net increase of criteria pollutants and potential to conflict with or obstruct implementation of an applicable air quality plan. Specifically, Project construction could result in exceedances of SJVAPCD annual emissions thresholds and daily screening levels for NO_x, CO, and PM_{10}, as well as the daily emissions screening level for $PM_{2.5}$. Impacts would be reduced to a less-than-significant level with implementation of Mitigation Measures AQ-1 and AQ-2.

Under the No Hydrogen alternative, construction emissions associated with the proposed green hydrogen facility would not occur, which would reduce daily and annual emissions in 2028 under the 36-month construction scenario and daily emissions and annual emissions in 2026 and 2027 under the 18-month construction scenario. Under this alternative, construction emissions would not be anticipated to exceed the 100-ton per year annual CO threshold under the 36-month construction scenario in 2028 or the 100-pound per day $PM_{2.5}$ screening level in 2026 under the 18-month construction scenario. However, all other impacts associated with exceedance of SJVAPCD NO_X, CO, and PM_{10} emissions thresholds would still occur. As with the Project, Mitigation Measures AQ-1 and AQ-2 would apply and would reduce all emissions below applicable SJVAPCD thresholds of significance. While this alternative would result in a nominal reduction of criteria pollutants due to slightly reduced construction activities, it would not avoid any potentially significant impacts and mitigation would still be required to reduce emissions below applicable SJVAPCD thresholds. As such, air quality impacts under the No Hydrogen alternative would be less than significant with mitigation incorporated and similar relative to the Project.

The Project would not result in any other potentially significant air quality impacts that may be avoided or substantially lessened by this alternative.

6.3.7 Public Health

As described in Section 5.8, *Public Health*, the Project would result in one potentially significant impact related to Project personnel and public exposure to Valley Fever-causing fungal spores. This impact would be reduced to a less-than-significant level with incorporation of Mitigation Measure PH-1. Under the No Hydrogen alternative, ground disturbance on the approximately 9,500-acre Project site may be reduced by up to 1.25 percent relative to the Project, as the proposed green hydrogen facility would not be constructed. This negligible reduction in ground disturbance would not be expected to substantially reduce fugitive dust generation and potential Valley Fever exposure. All activities on the Project site would remain subject to applicable SJVAPCD regulations, including SJVAPCD Rule 8021 pertaining to fugitive dust control for future construction, demolition, and earthmoving activities, and SJVAPCD Rule 8081 for control of agricultural sources of fugitive dust. Adherence to these regulatory requirements would reduce potential dust and Valley Fever impacts. Additionally, Mitigation Measure PH-1 would apply to further reduce potential Valley Fever exposure associated with Project activities. Because ground-disturbing activities would be similar, impacts related to Valley Fever would be less than significant with mitigation incorporated. Such impacts would be similar relative to the Project.

The Project would not result in any other potentially significant public health impacts that may be avoided or substantially lessened by this alternative.

6.3.8 Biological Resources

As described in Section 5.12, *Biological Resources*, the Project would result in a potentially significant impact due to the potential for construction and operation of Project components to substantially adversely affect approximately 14 special-status bird species, two special-status mammal species, and one special-status reptile, as well as common bird species protected under the MBTA and CFGC. All impacts would be reduced to a less-than-significant level with implementation of Applicant Proposed Measure BIO-1 and Mitigation Measures BIO-1 through BIO-8, which include completion of Worker Environmental Awareness Training, construction BMPs, nest buffers, and various species-specific avoidance measures.

Under the No Hydrogen alternative, a slight reduction in potential impacts to tricolored blackbird, burrowing owl, ferruginous hawk, Swainson's hawk, mountain plover, northern harrier, white-tailed kite, California horned lark, prairie falcon, loggerhead shrike, Oregon vesper sparrow, yellow-headed blackbird, and American badger may occur, as impacts to these species associated with development of the alternate green hydrogen facility site would not occur. Nevertheless, impacts to species associated with all other Project components would occur. As with the Project, Mitigation Measures BIO-1 through BIO-9 would apply and would reduce any potential impacts to a less-than-significant level. Such impacts would be similar relative to the Project.

The Project would not result in any other potentially significant biological resources impacts that may be avoided or substantially lessened by this alternative.

6.3.9 Water Resources

As described in Section 5.13, *Water Resources*, to ensure that sufficient water supply would be available to the Project and reliable for the hydrogen facilities during Project operations, the Project would be required to implement Mitigation Measure WAT-1, *Water Supply Contingency Plan*. With implementation of Mitigation Measure WAT-1, the Project would minimize or avoid potential to substantially decrease supplies in the Westside Subbasin or contribute to ongoing Critical Overdraft conditions. In addition, the Project would not conflict with or obstruct implementation of a sustainable groundwater management plan, the Westside Subbasin Groundwater Sustainability Plan, as implementation of Mitigation Measure WAT-1 would demonstrate water supply reliability for the Project's long-term demands associated with cleaning solar panels and providing water for the hydrogen electrolyzer component. Under the No Hydrogen alternative, construction and operation of the proposed green hydrogen facility would not occur, and feedstock water demand associated with the facility's electrolyzer would not materialize. While operational water demand associated with the proposed solar facility would still be required (i.e. cleaning of solar panels, vegetation management, and operation and maintenance facilities), operational water demand would be reduced to 35 AFY, in comparison to Project operational demand of 1,039 AFY. Nonetheless, under this alternative, the proposed solar facility component would still be required to implement Mitigation Measures WAT-1to reduce potential impacts related to sustainable groundwater management to a less-than-significant level, similar to the Project.

The Project would not result in any other potentially significant water resources impacts that may be avoided or substantially lessened by this alternative.

6.3.10 Paleontological Resources

As described in Section 5.15, *Paleontological Resources*, impacts to paleontological resources associated with Project construction would be less than significant with incorporation of Mitigation Measures PAL-1 through PAL-5 due to the depth of proposed ground-disturbing activities and location within high-sensitivity sediments. Under the No Hydrogen alternative, construction and operation of the Project's green hydrogen facility would not occur at either the Option 1, Option 2, or alternate site locations. However, the proposed solar facility and BESS would be constructed, with the proposed solar facility expanded to cover the Option 1 and Option 2 sites in lieu of the green hydrogen facility. All three of the green hydrogen facility sites considered as part of the Project are underlain by Quaternary fan deposits, which has low paleontological sensitivity to a depth of 5 feet and high paleontological sensitivity below a depth of 5 feet. Under the No Hydrogen alternative, ground-disturbance would still occur at the Option 1 and Option 2 sites due to construction of the solar facility, which has the potential to impact paleontological resources. As with the Project, Mitigation Measures PAL-1 through PAL-5 would apply, requiring identification of a Paleontological Resources Specialist, completion of a Worker Environmental Awareness Program, paleontological monitoring during activities within sensitive geologic units, a salvage and curation protocol, and preparation of a mitigation report upon completion of ground-disturbing activities. Therefore, impacts to paleontological resources under the No Hydrogen alternative would be less than significant with mitigation incorporated; such impacts would be similar relative to the Project.

The Project would not result in any other potentially significant paleontological resources impacts that may be avoided or substantially lessened by this alternative.

6.4 Alternatives Considered and Rejected

CEQA requires the selection of a range of reasonable alternatives, including those that could feasibly accomplish most of the basic Project objectives and could avoid or substantially lessen one or more of the Project's significant effects. Furthermore, CEQA requires identification of any alternatives that were considered by the lead agency but rejected as infeasible during the scoping process (CEQA Guidelines, section 15126.6(c)). The following alternatives were considered but rejected, either on the grounds that they were deemed infeasible or that they were unlikely to substantially lessen one or more of the Project's significant effects.

6.4.1 Alternative Locations

Only locations that would avoid or substantially lessen any of the significant effects of the Project must be considered for analysis pursuant to CEQA (CEQA Guidelines, section 15126.6(f)(2)(a)). As described in Section 6.2, *Project Site Selection*, the Project site was selected based on criteria intended to support the feasibility of the Project, such as site topography and proximity to existing electrical and transportation infrastructure, while avoiding or substantially lessening environmental effects, such as separation from existing residences and the absence of sensitive habitat, sensitive cultural resources, and important agricultural lands. By nature of the site selection process, the Project site has been identified to reduce or avoid potential environmental impacts while supporting the feasibility of the Project. No equivalent alternative Project location satisfies the siting constraints analysis described in Section 6.2. Therefore, no alternative locations are considered in this section, as such locations would either be unlikely to avoid or substantially lessen any potential environmental effects of the Project, or, in doing so, would sacrifice Project feasibility.

6.4.2 Hydrogen Trucking

As described in Chapter 2, *Project Description*, hydrogen generated as part of the Project is anticipated to be made available to end markets through interconnection to planned hydrogen pipelines in the region through initiatives such as the Alliance for Renewable Clean Hydrogen Energy Systems program or Southern California Gas Company's Angeles Link project. The Applicant considered an alternative in which green hydrogen generated and stored on the site would be transported to end markets via trucks along local roads and Interstate 5. Although viable, hydrogen transportation via truck would be expected to contribute substantially to potential environmental impacts related air quality, hazardous materials handling, traffic and transportation, public health, worker safety, and noise. Because this alternative would be unlikely to avoid or substantially lessen any potential environmental effects of the Project, it has been rejected from further analysis.

6.5 References

CARB 2022. 2022 Scoping Plan for Achieving Carbon Neutrality. December 2022. Available online at: https://ww2.arb.ca.gov/sites/default/files/2023-04/2022-sp.pdf. Accessed August 2023.

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