

From: [Cherry Diefenbach](#)
To: [Harris, Susan](#); [Koutoufidis, Nicholas](#); [Jacob, Dianne](#)
Subject: Comments on the JVR Energy Park (PDS2018-MUP-18-022) DEIR
Date: Wednesday, December 02, 2020 11:58:04 AM
Attachments: [Cherry Diefenbach"s commnets on the jvr solar DEIR Dec 2, 2020.docx](#)

Hi Susan,

Attached are my comments regarding the inadequately prepared DEIR for the proposed JVR Energy Park.

This project, which does not begin to fit into our rural landscape, will swallow Jacumba, destroy community character, and forever limit the town's ability to grow in size. **The NO Project Alternative is clearly the right for choice for County Supervisors.**

Cherry Diefenbach
619-743-5224

Cherry Diefenbach
PO Box 792
Pine Valley, CA 91962
619-743-5224
csdiefenbach@sbcglobal.net

December 2, 2020

Susan Harris
PDS
5510 Overland Ave., Ste. 310
San Diego, CA 92123

RE: JVR Energy Park (PDS2018-MUP-18-022) DEIR Comments

Dear Ms. Harris,

The JVR CEQA process has been flawed due to COVID restrictions. On Oct 8, 2020, PDS issued a written notice of availability regarding the project DEIR. Buried on page 2 of this letter was the notification of the Oct. 28, 2020 on-line/phone-in public meeting held by Planning & Development Services (PDS) and the comment submission deadline. **The DEIR notice of availability letter should have been mailed to all Jacumba PO boxes.** Under normal non-COVID times, the PDS project planner and likely the project applicant would have held a meeting with Jacumba residents in our community center where they would have had an opportunity to ask questions about the project. While an on-line public meeting might provide a viable meeting format in more affluent communities, many of Jacumba's residents don't have their own personal computers, their own internet access, or even smart phones. (A large number of residents rely on computer access at the Jacumba Branch library which was closed on the day of the meeting.) Although I participated in the on-line meeting, it was a huge disappointment--questions raised during the meeting were not recorded. The PDS planners who hosted the on-line meeting simply referred people with questions to a specific area of the DEIR. With a meeting format that kept participants' microphones muted except for the person making the comment, it was not a real exchange of ideas.

On Oct. 8, 2020, a printed copy of the 1,200+ page DEIR and a flash drive containing nearly 12,000 pages of appendices were placed at the Jacumba Branch Library. Given the library's reduced hours and limited days of operation due to COVID restrictions, this placement did not provide ample opportunity for local residents to participate in the CEQA process. (The Jacumba Library was actually closed to patrons for an entire week (Oct. 28 through Nov. 3, 2020.)

On Oct. 29, 2020, the Jacumba Sponsor Group (JSG) held a virtual meeting which included a discussion of the JVR DEIR. Due to COVID restrictions imposed by county leaders, less than five members of the public participated in this virtual meeting. **As a result of an inadequate CEQA process, the community of Jacumba has been disenfranchised, and it will have very little meaningful input about this massive industrial energy project that will negatively affect their quality of life.**

Background: Jacumba Hot Springs is a small community composed of low-income but proud residents, many of whom depend on social security and SSI benefits. Since they value their quiet rural setting with its open spaces, they have watched with alarm as the natural landscape has been filled in with a variety of transmission lines, the massive 58 acre ECO-Substation, and a 108 acre solar farm two miles east of town. Whenever the State of California needs a residential placement for a released sexually violent predator (SVP), Jacumba seems to be a favored destination. Jacumba residents have also seen local businesses close and their local elementary school become moth-balled due to declining student enrollment. In October 2020, after the new owners of the Jacumba Spa and much of the empty commercial buildings expressed plans to revitalize the town, residents were given hope that Jacumba's future would be brighter. That hope has been dashed by the prospect of an enormous solar farm that would virtually surround their small community.

Overall, the JVR DEIR is an inadequately prepared document, with numerous inconsistencies, contradictions, and avoidable omissions as well as many typographical errors.

If the proposed Major Impact Service and Utility type project was an appropriate and compatible land use immediately adjacent to the small rural village of Jacumba Hot Springs as stated in the DEIR, then why does the project conflict with the 2011 Mountain Empire Sub-regional plan and why does the DEIR identify ten different areas of controversy? These areas include: Aesthetics; Agricultural Resources; Air Quality; Biological Resources; Cultural Resources; Hazards and Hazardous materials; Hydrology and Water Quality; Land Use and Planning; Noise; and Parks and Recreation. Even with identified mitigation measures, 12 impacts remain significant and unavoidable—perhaps because you can't make a silk purse out of a sow's ear. The DEIR also lists other areas of concern raised by the public such as: environmental justice, negative impacts to a low income community, to local tourism and property values, a lack of tangible benefits to the community, and potential changes to local temperatures (S-6). **The DEIR does not address any mitigation measures for those legitimate concerns.**

VISUAL IMPACTS (ASETHETICS). The JVR DEIR minimizes the project's huge impacts to community character and its non-compliance with the Mountain Empire Sub-regional Plan. Although it provides key views and visual simulations of the project from a variety of locations, it omits (perhaps deliberately) the visual simulation from the Highland Senior Center which is located on the south side of Old 80, east of the community park, where there is only a 40 foot setback from the project's prison-like fence. (The Highland Center is the heart of the town--the de facto town hall and community gathering place.) Some other critical key views and/or visual simulations that must be part of the final EIR are:

--A visual simulation of the occupied single family residence south of Hwy 80 (660-150-05 & 660-150-06), that will be surrounded on three sides by a 75 foot buffer zone, project fence, and solar arrays. This residence, which looks north across Old 80, will also have a view of hundreds of solar arrays, only partially shielded by yet another project fence.

--A visual simulation of the tunnel-like view that east or westbound motorists travelling on Hwy 80, a county-designated scenic highway that runs through Jacumba would experience. The setback from right of way (ROW) north of Hwy 80 is 65 feet and the setback from the ROW

south of Hwy 80 is just 45 feet. The DEIR provides a misleading long-distance visual simulation from Airport Mesa looking west toward Jacumba that shows significantly wider setbacks along the south side of Hwy 80 and along the border fence. (See arrows in DEIR Figure 2.1-16 below.)

--Visual simulations of the collector substation, the overhead slack span transmission



Visual Simulation of the Project

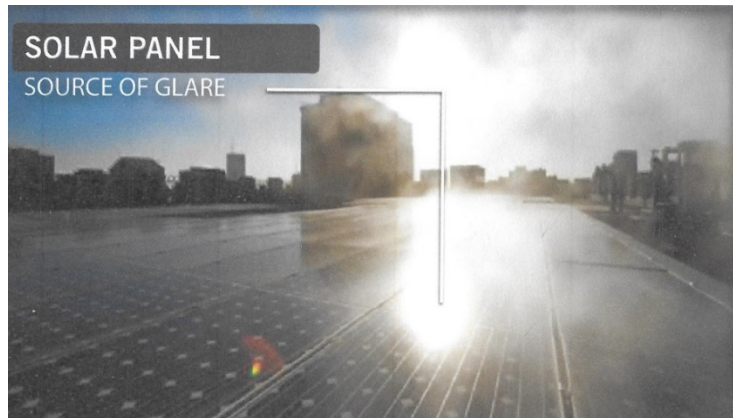
line, and the (optional) 3.2 acre switchyard as seen from motorists on Carrizo Gorge Road and Interstate 8.

--Existing view and a visual simulation from the 20 or so hillside residences located along Snob Hill Rd. on the southeastern side of town.

--A visual simulation of solar panels, three battery storage units, an inverter and a transformer on the low hill where vacant farm buildings are currently located. A six-foot high slatted fence at grade level along Hwy 80 will not adequately screen solar equipment from motorists or homes. (See 2019 photo of the project area including farm buildings, indicated with an arrow, as seen from a hillside location in town.) It is interesting to note that all those omitted visual simulations would show the project's most severe impacts to aesthetics. **Add additional visual simulations to the EIR as indicated above.**



Within the DEIR, PV modules are described as “uniformly dark in color, non-reflective, and highly absorptive of all the light that strikes their glass surfaces” (1-3). Alternately, the DEIR describes PV modules as “highly reflective” (2.1-44). Appendix B to the DEIR includes a glare study prepared by Power Engineers, Inc. Below is Figure 3 from the glare study which shows an example of glare produced by solar panels. This study analyzed potential solar panel glare impacts to small planes operating at the Jacumba airport. The glare study concluded that solar panel glare for small engine aircraft landing on the runway #7 would be limited to an hour or less of glare in the afternoon during winter months. However, it failed to adequately analyze glare impacts to glider planes, the airport’s primary users, which loiter in the sky above the project area.

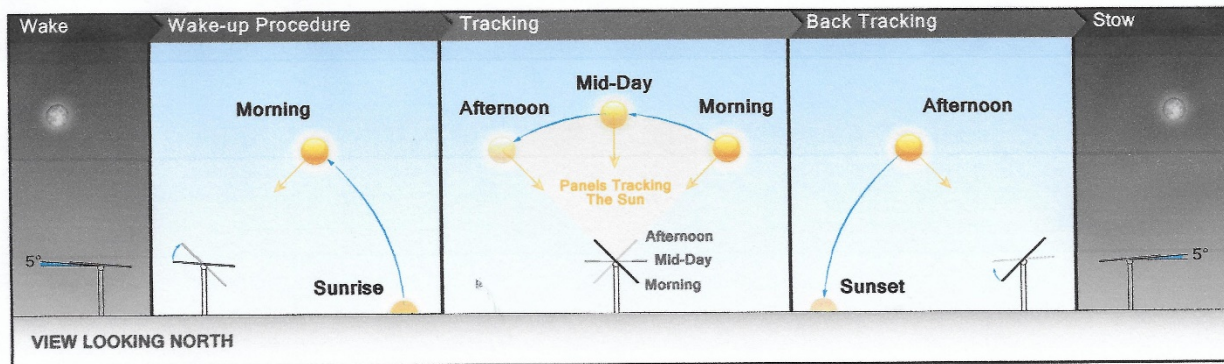


Alsadar Mullarney, an experienced glider instructor who has logged many flight hours out of the Jacumba airport states that unlike small engine planes, gliders do not make a single approach to a runway. Instead gliders circle area above the airport many times before they determine that wind speed and direction is suitable for landing. Gliders launching from the airport use a cable/winch arrangement. During emergency situations, the cable may be jettisoned and it could conceivably end up striking solar panels next to the runway. Mullarney recently voiced his concerns about the safety of glider operations during an October 29, 2020 Jacumba Sponsor Group meeting. He also explained that gliders generally fly within 5 to 6 miles of the Jacumba airport and that there have been numerous glider pilots who have overshot the runway but were able to land safely in the dirt past the runway. He also pointed out that landing in energized solar arrays would likely be a lethal outcome for glider pilots. **For safety reasons, Mullarney believes that placement of solar panels on three sides of the airport runway will introduce an unnecessary safety risk and therefore, solar arrays on the south side of Hwy 80 should be pulled back from the vicinity of the runway and placed north of Hwy 80. I agree.** (Although I have only been a glider passenger on one occasion, much of the thrill in flying in a glider is viewing the natural landscape as seen from above. Flying over a sea of glare producing solar panels that are parallel to the ground during a midday sun, would not be appealing to me. More importantly, student glider pilots and passengers will regard landing near the high voltage equipment associated with a solar farm of this magnitude as unsafe.) **Clearly, the JVR glare study’s findings with regards to glider operations is faulty. Solar panel glare will negatively impact airport operations and it may significantly reduce the airport’s future use by glider planes. Given that the study underestimated the effect of glare on glider operations, the project is NOT Consistent with ALUC Policy JAC3.5 (3.4.4-88).**

A DEIR guideline for determining whether light and glare pose a significant impact states: “The project will install highly reflective building materials, including but not limited to reflective glass and high-gloss surface color that will create daytime glare and be visible from roadways, pedestrian walkways or area frequently used for outdoor activities on adjacent

properties” (2.1-44). The project’s glare study also analyzed potential glare distractions to motorists and nearby structures based on a viewer height of 10 feet and then it erroneously concluded Jacumba residences would not be impacted by solar panel glare. The DEIR further states that the “5-degree wake/stow angles would cause any potential glare to be directed above and away from analyzed sensitive viewers residential locations and motorists on I-8, Carrizo Gorge Rd, and Old Hwy 80” (2.1.47). That statement doesn’t make any sense. The solar panels are in the wake/stow positions before they begin to track the east-west movement of the sun and also when the sun is directly overhead. (See Figure 6 from the glaze study below.)

Single Axis Tracker Behavior



Within the DEIR there is some confusion as to the orientation of the solar arrays. While the glare study describes an east/west tracking pattern for the solar panels, it also states “the solar facility would be directed southward toward the sun (2.6-35). **Clarify solar panel tracking and alignment.**

The project glare study also did not analyze the impact of potential glare from 643 acres of solar panels to Jacumba’s southeastern hillside homes located less than a mile away from the solar project. Viewer height at that elevated location is well above the 10 foot height assumed by the glare study. Therefore, DEIR findings that glare impacts from the project would be less than significant are wrong. (2.1-48 and 2.1.63) (The impact of solar panel glare must be modified on pages 2.1-58 and 2.6-33.)

In 2006, Old Highway 80 was appropriately designated as a state/county historic highway complete with appropriate signage. On any given day, motorists choose to drive on historic Highway 80 instead of Interstate 8 because they appreciate rural views, open spaces, and the small communities that flank it. The scenic nature of Hwy 80 brings financial support from visitors to the small, unique businesses struggling to operate in these communities. As more and more industrial energy projects are placed next to this scenic highway and others, there is a cumulative impact--these roads will no longer be considered “scenic” by motorists. Since this enormous solar project will dominate Jacumba’s currently rural landscape and be visible to motorists travelling on the I-8 corridor, it is likely to reduce the number of visitors coming to Jacumba. This will negatively impact the survival of local businesses. In Table 2.1-1 and Table 3.1.4-5, the DEIR identifies the Mountain Empire Sub-regional Plan Scenic Highways goal and then it incredibly finds the JVR project to be consistent with it. The DEIR states that solar panel screening (landscaping and fencing) will mitigate views from motorists, and then renders an opinion that the JVR project would not inhibit the County from establishing future regulations or

development standards that would protect and enhance scenic highways. Using that rationale, there won't be anything of scenic value left along Old Hwy 80 to protect and enhance.

The placement of a major energy facility next to the tiny town of Jacumba is contrary to a variety of goals and policies found in the San Diego County General Plan such as: Goal LU-2: Maintenance of the County's Rural Character and Goal LU-6: Environmental Balance. Given the scope and mass of this project, it also does not conform to similar goals and policies found in the Mountain Empire Sub-regional Plan, that were created to protect and conserve the natural environment, open space, and scenic vistas etc. The DEIR states that the introduction of the solar facility adjacent to a small rural town (Jacumba) would result in a significant change to the character of the community (2.1-21). It also states that with respect to the implementation of nearby projects in Boulevard, "the proposed JVR project would result in a cumulatively considerable visual impact" (2.1-55). Then it erroneously concludes that since "similar development has occurred in the sub-regional plan area, the proposed project would not result in a cumulatively considerable impact associated with plan conflicts" (2.1-57). (Translation: If large energy projects have already industrialized the backcountry's natural environment, it is no big deal to screw it up further.)

The mitigation measures identified in the DEIR do not provide any meaningful reduction in visual impacts to Jacumba's community character. Landscaping and slatted chain-link/barbed wire fencing is the equivalent of "putting lipstick on a pig." Quite frankly, the DEIR insults the residents with its suggestion that "the order created by repeating rows of support racks and panels and straight roads would be somewhat compatible with the grid-like patterns of residential development in Jacumba"(2.1-27). **Nowhere else in San Diego County, has an energy project of this scale and mass been built immediately up against two sides of a small rural village.** If this massive JVR project is approved, it would set a dangerous precedent that would facilitate the siting of similar large scale energy projects adjacent to other small communities.

AIR QUALITY/CLIMATE IMPACTS. The DEIR site-specific climatic conditions are inaccurate (2.2-2). Jacumba's wintertime lows are often below freezing and average summertime highs (July through September) average 90 degrees F with temperatures over 100 degrees F not uncommon. Solar farms are said to produce a photovoltaic "Heat Island effect" with solar panel surface temperatures reaching as much as 36 degrees warmer than ambient temperatures. (https://www.solarnovus.com/photovoltaic-heat-island-effect-large-solar-power-plants-increase-local-temperatures_N10518.html.) The DEIR does not address the potential increases to local temperatures when hot Santa Ana winds drive across more than 600 acres of "super-heated solar panels" and then blow into town.

Nor does it address how it will mitigate for movement of particulate matter (dust clouds) produced as easterly Santa Ana winds sweep across hundreds of acres of disturbed bare dirt beneath solar arrays toward the town. **After construction has been completed, will soil stabilizers be regularly applied to minimize the impact of blowing dust on residences?**

BIOLOGICAL IMPACTS. The DEIR states that there are eight sensitive vegetation communities (S-3) in the project area. However, it also states in a different section there are nine sensitive vegetation communities (2.3-3). **Resolve discrepancy.**

The biological surveys conducted as part of the CEQA process minimize the solar project's potential impact to what is clearly Golden eagle habitat. These raptors routinely use the project area for foraging. Right is a 2013 photo of a golden eagle perched in the large pine tree beside an abandoned Ketchum farm house. In October 2020, one was also observed flying from the same pine tree.

The JVR project, as planned, would demolish all vacant farm buildings, remove all nearby vegetation including a fringe of mesquite trees and several large trees that are regularly used as roosts and lookouts by a variety of raptors such as Golden eagles and great horned owls. It would put 12 foot high solar arrays, three battery storage containers, six inverters and three transformers on skids at this elevated hillside location. (See 2020 farm photo right.)

The DEIR states "trees are limited within the project area" (2.1-26). County Zoning Ordinance Section 6954(b)(3) which regulates solar energy systems, requires that Major Impact Service and Utility projects minimize visual impacts. It states "the removal of existing vegetation shall be minimized." The project could easily minimize its impact on scenic vistas, on foraging raptors, and other wildlife by foregoing the placement of solar arrays on this low hill and leaving the existing vegetation intact. Also since there are very few active dairies left in San Diego County, the project developer should also be required, as a condition of project approval, to restore and preserve some of the historic 1928 farm buildings which could serve as an educational site for the public. The Mountain Empire Historical Society (MEHS) in Campo could serve as an advisor for this preservation effort. The farm structures that should be saved as a minimum are: a milking barn, the milk processing plant/office, and the grain silos. The developer would also provide permanent a large on-site educational kiosk historical information/photos as well as a dedicated public trail/pathway leading to this historic farm site. These elements should be required as project mitigation measures. (See 2020 photos below.)



The project area

currently supports 20 special status wildlife species (2.3-8). In spite of the identified mitigation measures (2.3-116 & 2.3-117) for what the DEIR describes as a “short term” construction period, those animal species and others will be negatively impacted. A 13-month construction period, during which 500 workers will clear the area using heavy equipment and install solar equipment from 7 am to at least 4 pm Monday through Saturday will certainly displace local wildlife, likely permanently.

The JVR project falls within the East County MSCP Plan Area. Given that the 2014 EC MSCP Planning agreement has expired, and the new agreement estimated to have been completed in 2020 has not been finalized, this project will not face the normal scrutiny (2.3-39). After it is covered with solar panels, it will obviously be excluded from a future EC MSCP. However, from the project applicant’s perspective, now is an opportune time to jam through this massive project.

The DEIR states that 435 acres of biological open space will be preserved in perpetuity (2.3-43). **If the 1356 acre JVR project area includes 435 acres of biological open space and 635 acres of solar panels, what is the planned land use for the remaining 286 acres?** Will solar panels be placed on those remaining acres in a Phase II project plan?

HAZARDS/HARADOUS MATERIALS. The Environmental Site Assessments (ESA) prepared in January 2018 for the project site (Appendix G to the DEIR) are incomplete. Below are specific comments on the Phase 1 Jacumba Valley Ranch (JVR) ESA:

The JVR ESA historical source review is incomplete. It should include 1928 aerial photographs of the project area (available at the County Department of Public Works, Cartography counter) which show cultivated agricultural land use on both sides of U.S. 80, farm buildings, and the Jacumba Airport Inn/Café, Service Station/Garage) immediately to east of the project area. In the 1928 photo below, an arrow indicates the Mountain Meadows Dairy which operated from the mid-1920s to the mid-1950s. The star indicates the Airport inn/café/service station/garage complex that operated from 1942 to the early 1960s.



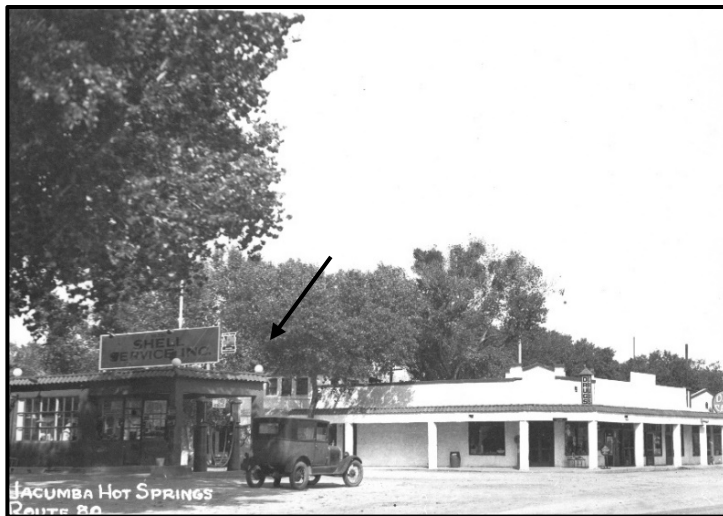


(Left is a photo that shows the scope of the dairy operations in 1940.) The dairy which managed a large herd of up to 1,000 cows, also had a fleet of trucks that delivered milk twice a day to a creamery in Mission Valley. To facilitate milk delivery, fuel was stored in an underground tank. After William Ketchum took over dairy operations in the mid-1950s, it became known as the Ketchum ranch. (Note: The presence of the former dairy underground fuel tank was not identified in the JVR ESA. Nor was the fuel tank or tanks

associated with the nearby Jacumba Airport Service Station/Garage.)

During the JVR ESA interview, Kishore Madduri, the JVR property owner since 2005, disclosed the presence of two gas stations at the north end of the project site. He also stated an unfamiliarity with past property uses, though he had leased 450 acres of the property to Bornt organic farms from 1999 to 2012. **Apparently he was unaware that Bornt Farms had sprayed a strong chemical pesticide on their former fields in the summer of 2012.** This was done to eliminate the eye gnat problem that had been plaguing Jacumba residents for several years. (After spraying their fields, Bornt ceased its organic farming operations in Jacumba in 2012.)

Other JVR ESA omissions are:



--No mention of the 1928 Shell gas station that operated on the north side of Hwy 80 near the original Jacumba bathhouse which is also visible in the 1928 aerial photos. (See arrow in c.1930 photo left.) A gas station was operated at this location until the mid-1950s. It was later replaced by a newer Shell gas station at a different site in Jacumba. In the late 1960s, it was moved to its current site near the I-8 Jacumba exit.

--No mention of two surface mining pits located in the southeastern JVR project area on the hillside above the old farm buildings.

Mr. Madduri also stated on the JVR ESA questionnaire that the property was not used as a junkyard or as a motor repair facility and that hazardous materials such as automotive tires were not dumped above ground. Right is a 2013 photo that shows a fleet of junk cars and piles of tires that were present on the former Ketchum farm site. He also stated that there was no hydraulic equipment/elevators on the property. However, a former weight station is still present on the site of old dairy.



The Phase 1 Environmental Site Assessment (ESA) for the Landman property needs to be updated to include historical agricultural use that dates back to 1928 as well as information about the early 1928 Shell gas that operated near the former Jacumba bathhouse. (See my previous comments about this gas station in the JVR ESA.) Although the Landman ESA states historical source information prior to 1953 was not available, this is not true. Bessie and her husband, William P. Foster were two of Jacumba's earliest residents and they lived on Landman property near the border with Mexico from the late 1890s until 1922. (See c.1918 photo of the former Foster home in Jacumba.)



In 1920, Bessie Foster described a troublesome subsurface petroleum contaminant problem with her water well. (See *San Diego Union* article right.)

OIL INDICATIONS ON JACUMBA RANCH

"I cannot understand why Jacumba has not received attention from the men trying to bring oil in San Diego County," said Mrs. Foster yesterday...On my ranch, I have a well of 39-feet that gives water so heavily impregnated with oil that it is undrinkable. Recently I drew a pail of water from this well and then held a lighted match near the surface of the water. The result was a crackling sound with some smoke coming off the water. There is also a spring on my ranch that at times, has forced out large lumps of shale...If those oil men want to bring in oil, I am sure they could find it at Jacumba."

SDU 10/3/1920

Although it is not clear whether the abandoned water well mentioned in the Landman ESA is the former Foster well, the potential presence of subsurface petroleum should be investigated before underground electrical wiring associated with solar arrays is placed beneath the surface. **Update the Hazards/Hazardous Material Section of the EIR to reflect the historical use information and potential hazards associated with that historical use.**

The JVR project, as proposed, includes the placement of numerous high voltage components that increase potential fire danger to the community of Jacumba. Which DEIR project map shows the location of the step-up transformer that would contain approximately 6,000 gallons of mineral oil (2.6-27)? Is this reference to the transformer at the Collector Substation or step-up transformers located on skids next to each inverter? **Provide step-up transformer specifics in the EIR.**

Since the project area has been designated by Cal Fire as a “high” Fire Hazard Severity Zone (FHSZ) (2.12-2), why aren’t some of the high voltage elements of the proposed project being sited closer to their out-of-area energy consumers. For example, battery storage units could be located next to urban areas at consolidated locations--there is no need to store the power in Jacumba when it will be used elsewhere. **Why does the project require the construction of a 3.2 acre switchyard when the solar power it generates could be fed into the power grid via the existing SDG&E ECO Substation located less than 2 miles from the project site?**

HYDROLOGY/WATER QUALITY. This project proposes to place high voltage equipment over hundreds of acres where the flood risk is undetermined because FEMA has not conducted a flood hazard analysis (2.7-5). Due to flooding uncertainty, the project plans to raise the level of solar panels several feet above grade which exacerbates its severe visual impacts to community character.

Much of the JVR project area has historically been subject to flooding caused by summer storms. One of the earliest recorded incidents of extreme flooding in Jacumba was experienced by members of the state highway commission in 1912. (See *San Diego Union* article below.)

“Returning from Devil’s Canyon on Thursday, they ran into the effects of a cloudburst...The Jacumba valley was filled with running water, waist deep, which put their machine out of commission. The travelers were obliged to strip, wade into the water, and push their automobile onto dry land. The assistance of a neighboring rancher was solicited and they towed their machine to dry land on the north side of the valley, and their trip was resumed.”

SDU 7/21/1912



Intermittent summer flooding would occur in the Jacumba Valley every few years and impact ranch operations, stated Bill Ketchum, who grew up on the Ketchum Ranch during the late 1940s to mid-1960s. In 1959, several large cracks appeared in Jacumba Valley near the Jacumba Airport. One 150 foot long crack widened to two and one-half feet and two-feet deep. “The large cracks are in an area that was under two to five feet of water a few weeks ago. The water left during flash flooding made new gullies in the earth and intense summer heat caused the cracks” (*SDU 7/23/1959*).

In 1976, Tropical Storm Kathleen came through southeastern San Diego County dumping heavy rain on the area. The storm caused major flooding of Boundary Creek. As a result of that flooding, a pedestrian bridge was constructed in vicinity of the Jacumba railroad station so that foot traffic could safely cross the creek. (See 2010 bridge photo right.)



Jose Cesena has lived in his residence on the south side of Hwy 80 near the Jacumba airport for nearly 30 years. He states that before the U.S. Army Corps of Engineers built a large dirt berm around three sides of his property, the flooding from Mexico was so bad that he would have a foot of water inside his house. The DEIR states that historical drainage patterns will not be changed by the project though it proposes to grade and redistribute 264,000 cubic yards of soil during its construction. **How will the project mitigate drainage pattern disruptions given the large-scale grading operations (cut and fill)?**

Throughout the DEIR, the project boundary fence is described as chain-link fencing with slats with barbed wire on the top. The project's drainage study states that boundary fencing may alter drainage patterns or redirect flooding during heavy rainfall. It also states that break-away fencing and flow-through fencing may be used in certain areas. **The EIR should provide a visual simulation of break-away fencing and flow-through fencing and include a project map that shows where it would be employed.**

NOISE. Inverters, transformers, and HVAC units will generate and inject continuous noise 24 hours per day into Jacumba's exceptionally quiet rural landscape. Table 2.9-1 identifies a 20dB noise level as a typical "quiet rural nighttime" (2.9-43).

Table 2.9-2 provides a misleading snapshot of Measured Outdoor Ambient Noise Levels in the proposed project vicinity. For example, noise measurements taken at 12:10 pm at STE2 (the Cesena residence at the center of the project area south of Old Highway) show a maximum of sound level of 66.9dB and a minimum sound level of 32.1dB which gives an average of 49.5dB. A large truck driving past STE2 would artificially raise sound levels for a very short duration. The normal sound level at this location is likely to be closer to the minimum sound level. It is also unclear from the table whether the sound measurements were taken on a weekday or on a Saturday or a Sunday (2.9-43).

Table 2.9-4 predicts the one hour average of the Proposed Project Operations Noise Levels at STE2 from all project noise sources would be only 43.7dB (2.9-44). This prediction seems low--project maps show a total of three battery storage containers, each with their own HVAC units and skids (2 inverters, 1 transformer) at two separate locations in close proximity to STE2. This means a total of 6 batteries/6 HVAC units, 12 invertors, and 6 transformers would be placed near to that residence. **The DEIR does not provide the cumulative daytime noise levels (existing ambient noise levels plus proposed project operational noise levels) which are likely to exceed max noise levels permitted by the County. The EIR should include a table that shows cumulative daytime noise levels.**

Continuous noise can have a substantial negative impact on the quality of people's lives, affecting their sleep and general health. Background sounds affect people differently, and some people are more sensitive than others. Personally, I cannot tolerate the continuous noise produced by the air blower of a wood-burning stove for more than about 20 minutes--my husband is unaffected. Operational JVR project noise will be generated 24 hours-a-day, seven days-a-week. **If some form of this solar project is eventually approved, battery locations must be pulled further back from residences that would be affected by the continuous noise produced by the solar farm as machinery sounds will clearly exceed Jacumba's current nighttime ambient noise levels.**

TRIBAL CULTURAL RESOURCES. Historically, Jacumba, with its warm mineral springs, was the site of year-round Diegueno or Kumeyaay inhabitation. In 1853, as many as 500 Jacumba Indians are said to have attacked a mail station near Jacumba. This attack was successfully repelled by a small contingent of U.S. government soldiers.

In the early 1870s, when white ranchers began to use the Jacumba valley for grazing their livestock, local Indians were still present in the area. In 1880, a group of cowboys confronted an Indian camp at the north end of the valley because the Indians were thought to have been stealing livestock. During the incident that was described in newspapers, some number of Indians were killed. Whether they were later buried there, it is not clear. **Given the Kumeyaay's important historical record in the area, ground penetrating radar (GPR) should be used to survey the project area to protect human remains or other cultural artifacts that may be present underground before the metal supports for solar panel arrays are driven 10-15 feet into the soil.** (GPR was used during the construction of the ECO Substation.)

WILDFIRE. The JVR project area is located in a high Fire Hazard Severity Zone for which a regional Wildland Urban Interface emergency plan has not been prepared (2.12-24). The DEIR identifies a list of potential ignition sources and fire risks that would be introduced by the construction and operation of this project but does not identify any increases to local firefighting staffing or provide for additional equipment resources. In fact, **there will be a reduction of "local" available firefighting staffing when the McCain Valley Conservation Camp closes on December 31, 2020.**

Current daily staffing at Jacumba Fire station #43 is just two firefighters. This staffing level will be woefully inadequate during the 13 month construction period when as many as 500 construction workers will be working in Jacumba. **As a minimum, the County should require that the project applicant provides funding for two additional full-time Cal Fire firefighters as a condition of project approval.**

The DEIR minimizes fire danger by stating the proposed project would not conflict with an adopted emergency response plan because there isn't one (2.12-25)!!! To ensure the safety of rural communities, **the County should require the development of a regional wildland emergency response plan that includes wildfire evacuation routes BEFORE approving the placement of any more large-scale energy projects in the Boulevard and Jacumba areas.**

The DEIR states that understory fuels in the solar project area would be maintained at roughly six inches. It also contains an obvious typo: "six 10, gallon water tanks" should be six

10,000 gallon water tanks (2.17-32). The JVR Fire Protection Plan (Appendix N) states that the solar project area is to be free of vegetation (pg.44). **Resolve discrepancy regarding vegetation management under solar panels. If vegetation is to be removed, provide information regarding anticipated herbicide usage in the EIR.**

AGRICULTURAL RESOURCES. The Agricultural Resources Report (Appendix O) does not include 1928 aerial photos that show a significantly longer historical agricultural use in the project area. **Include 1928 aerial photo in Appendix O and update historical agricultural use information in the EIR.**

San Diego County's General Plan provides goals and policies designed to protect and preserve farming and agriculture as beneficial resources that contribute to the County's rural character and open space network. A Mountain Empire Sub-regional Plan goal also encourages the expansion and continuance of agricultural land use in the region.

As the population of San Diego County continues to grow, more and more agricultural lands are being converted to urban land uses. The DEIR states that least one third of the total JVR project footprint is acreage considered as "farmland of local importance" (3.1.1-3). However, since none of the land is currently under cultivation and the property has not entered into any agreement with the County to establish an agricultural preserve under the Williamson Act, the DEIR minimizes its value as important agricultural land.

The County used the LARA (Local Agricultural Resources Assessment) Model to determine whether the JVR solar project would have significant impact to on-site agricultural resources. JVR agricultural resources were evaluated using the LARA model and the required factors: climate, water and soil quality, were rated as "moderate," with two out of three complementary factors rated as "high." However, since one complementary factor, "land use consistency," was rated as "low," the DEIR concluded that the project's impacts to on-site agricultural resources are not significant. (See LARA Model below.)

LARA Model Factor Ratings

	High	Moderate	Low
<i>Required Factors</i>			
Climate		X	
Water		X	
Soil Quality		X	
<i>Complementary Factors</i>			
Surrounding Land Uses	X		
Land Use Consistency			X
Slope	X		

This determination seems to be an arbitrary one, as it seemingly rejects 65 years of successful agricultural land use: 1928 to 1980 and 1999 to 2012. If only those early Jacumba farmers would have applied the Lara Model, they would have raised their hay, vegetables, fruit trees, and dairy cows somewhere else in the county. (See 1940 photo of the Mountain Meadow Dairy farm on the next page.)



LAND USE PLANNING. The DEIR discusses the historical agricultural use of the project area. It then concludes this massive energy facility is a compatible and appropriate land use because it will not physically disrupt or divide the established community of Jacumba (3.1.4-38). **Does this means the County does not consider private residences immediately east of the village core or the Jacumba airport as part of the town?**

The DEIR also states that the project will not induce population growth. Quite frankly, the community of Jacumba would benefit from some planned population growth, as our local grade school has been closed due to declining student enrollment since 2017, and the majority of our commercial store fronts are empty. The town would be better served by a mixture of low-income housing, small ranches, and agricultural and recreational land uses on the best available vacant land in Jacumba instead of a huge solar farm which will likely cause some residents and the few remaining businesses to move away.

The DEIR discusses a 2014 California-Baja California Border Master Plan that includes a prioritized border crossing or point-of-entry (POE) between Jacumba and Jacume, Mexico. Although it is in the conceptual planning phase with no identified funding, the placement of solar panels would likely end future POE planning at Jacumba because it would consume the acreage needed to build a secure border crossing.

The General Plan Land Use Element identifies many policies that should make the placement of the JVR project incongruent with the rural landscape, even if it is to be placed on a site zoned as a “Specific Planning Area (S88) that has not adopted a Specific Plan.” **Without an adopted specific plan, the placement of an enormous solar project immediately adjacent to Jacumba should not be the default land use!** The DEIR identifies Jacumba’s 2010 population as 561 perhaps to mitigate community concerns about project impacts when compared with its greater public benefits. If the County applies this logic to the placement of other large-scale energy projects, then rural landscapes will cease to exist outside of county and state parklands. Jacumba residents are taxpayers and as such, their quality of life concerns must be respected. After all, they previously supported the placement of the 20 MW 108 acre Jacumba Solar project and the massive SDG&E ECO substation just 2 miles east of town.

PARKS AND RECREATION. The DEIR makes a determination that the project will not result in significant impacts to existing parks and recreation. However, the placement of the project fence within 40 feet of Jacumba's senior center and the community park will create significant and unavoidable visual impacts to the previously unobstructed views of the Jacumba Valley from those locations.

The JVR Project should provide community benefits in the form of appropriately signed and dedicated equestrian/pedestrian/mountain bike trails along the project's western boundary, along the northern and southern sides of Old Hwy 80 adjacent to project landscaping, and along the eastern side of the project that would lead to the former Ketchum farm buildings. These trails could be used by residents and visitors, and they would provide trail connections to BLM lands and State parklands and to the proposed educational site at the historic Ketchum farm.

TRANSPORTATION. The EIR should describe the current physical condition of existing public roadways such as Carriso Gorge Road and Old Hwy 80, both of which have recently been resurfaced. **It should also identify appropriate mitigations to restore road conditions that are significantly impacted by heavy truck use during the 13 month construction period.**

Throughout the DEIR, the start and stop times for the construction workday are inconsistent. In at least two instances, construction workday hours are alternatively listed as 6 am to 7 pm (1-14) and 6 am to 4 pm (3.1.7-14). **A 6 am construction start time conflicts with the County's Noise Ordinance that prohibits construction from starting before 7 am unless it is an emergency.** Elsewhere in the DEIR, they are also listed as 7 am to 7 pm and 7 am to 4 pm. **Correct the project's construction working hours in the EIR.**

UTILITIES AND SERVICE SYSTEMS. **Estimated water usage figures for the construction period are inconsistent throughout the DEIR.** Construction water use is alternately listed as 140 acre-feet (3.1.8-15 & 3.1.8-16), and as 112 acre-feet (2.2-36). **The water supply source used during construction is also not consistent.** The water will be supplied by on-site groundwater wells in the Jacumba Valley aquifer supply (1-18 & 3.1.8-16) and alternately construction water will be imported from the Jacumba Community Services District (JCSD) with backup water supply provided by on-site wells (2.2-36). **Resolve EIR discrepancies regarding construction water amounts and the sources that will supply it.**

Some of the DEIR information about JCSD is incorrect (3.1.8-15). The JCSD currently provides potable water connections to 244 customers from JCSD wells #7 and #8 that are not located in JVR alluvial aquifer and JCSD daily potable water demand estimated at 122 afy. **Correct EIR information regarding JCSD operations (3.1.8-15 & and Table 3.1.8-4). Update JCSD non-potable water figures in Table 3.1.8-5 (3.1.8-28) to include water that is currently being provided by JCSD to support the new border wall construction project.**

Other DEIR inconsistencies are:

--264,000 cubic yards of grading/redistribution (1-14) or alternatively 75,000 cubic yards of cut and fill (2-1-67).

--The operational life-span of the solar project is alternatively described as 35, 37, and 38 years.

--A project construction start date of December 2020 (2.2-36)!!!

--The existing community of Jacumba is approximately 250 acres (4-18) or alternatively the town is concentrated on less than 100 acres (2.1-23).

PROJECT ALTERNATIVES. CEQA guidelines require the EIR to describe a range of project alternatives. However, for Jacumba residents or business owners, two of those alternatives do not provide any meaningful reductions in the project's scale, its location on two sides of the town, or its negative impacts to the town's future and the natural environment.

NO PROJECT ALTERNATIVE: This is the only alternative that does not generate significant and unavoidable impacts to aesthetics, community character, biological resources, cultural resources, and glider operations at Jacumba's airport. **In addition, the NO PROJECT Alternative does not severely impact Jacumba's future growth by squandering the best available land that could be used for a mix of low-income housing, agriculture, recreation, or even a future border crossing with Mexico, uses that could improve the quality of life for the community.** The DEIR seems to suggest that the solar project is an interim use of the Jacumba Valley and not the precursor to another equally massive green energy project. It would also have residents believe that the project is a "lesser evil" than the Ketchum Ranch/JVR specific plan that was withdrawn in 2011. The EIR rightfully admits that the No Development-No Project alternative is the environmentally superior alternative.

COMMUNITY BUFFER ALTERNATIVE: This project alternative does not deliver on its promise to provide a "real" community buffer as it only increases the setback on the northeast side of the town to 300 feet. The DEIR states that even with this buffer, noise and visual impacts would remain potentially significant (4-37 & 4-40). With the meager setbacks planned for the southeastern side of town, 40 feet near the Highland Senior Center and Community Park, and a 75 feet setback on three sides of the an occupied residence south of Hwy 80 (660-150-05 & 660-150-06), **this alternative does not offer a legitimate community buffer.**

REDUCED PROJECT ALTERNATIVE: This alternative, which reduces the project footprint by 142 acres at the north end of the Jacumba Valley, would mitigate some biological impacts as well as some aesthetic impacts to motorists travelling the I-8 corridor and visitors hiking on nearby state park lands. However, this alternative does nothing for Jacumba residents and community center/park users, glider planes using the Jacumba airport, and motorists travelling east or west on scenic Highway 80--the visual, dust, glare, and noise impacts remain significant. **It is the people of Jacumba who will be impacted 24/7 by this enormous energy facility six times the size of the town. A reduction in the project footprint should be applied to the southern portion of project that is adjacent to Jacumba.**

The DEIR briefly discusses and rejects several other project alternatives: Rooftop Solar, Alternative Locations, and the ECO Substation Alternative (No Switchyard), because they do not provide financial benefit to the project applicant. There are a number of large solar sites 1 MW or greater that can and should be sited on city parking lots and other structures and they could provide about 500 MW of green energy to the city customers who use it. (*SDU 1/15/2019*).

County Supervisors should evaluate some combination of those project alternatives as viable alternatives to the JVR project as proposed.



The ECO Substation Alternative (no Switchyard) was dismissed in the DEIR because “it is unknown if the existing 58 acre substation operated by SDG&E has a capacity to receive the energy produced by the JVR project or if the project applicant’s use of the existing substation would be approved by SDG&E” (4.13). **Why weren’t those questions asked before 3.2 acre switchyard was included in the JVR project? Why build an ugly and unnecessary substation similar to the one pictured above that will be visible from the I-8 corridor and Carriso Gorge Road? A switchyard that according to the DEIR remains after the JVR Solar project is decommissioned in 2057?** (Perhaps the JVR solar project is just the proverbial “foot in the door” for another green energy project at this location.)

Recently, LA County Supervisors and San Bernardino County Supervisors have begun to deny the construction of large solar and wind farms on private land, bending to the will of their constituents who say they don’t want renewable energy projects industrializing their rural communities. See article excerpts below.

“...Supervisors voted to ban the construction of large solar and wind farms on more than 1 million acres of private land that would industrialize their rural desert communities northeast of Los Angeles...”

www.latimes.com/business/la-fi-san-bernardino-solar-renewable-energy-20190228-story.html

“...The San Bernardino County Board of Supervisors voted to close off more than one million acres enacting a policy that would essentially ban utility-oriented renewable energy in fourteen communities and in rural living zoning districts in that county. Instead the board will allow county-orientated renewable energy (CORE) which includes rooftop or on-site solar projects as well as shared energy generation to be used primarily by local users (community solar projects). If more than 50 percent of a project’s output is sold to the energy grid, then it is not considered to be a CORE project...”

<https://pv-magazine-usa.com/2019/03/01/san-bernardino-county-bans-large-scale-solar-wind-in-some-areas/>

Now is the time for San Diego County officials to fall in line with LA and San Bernardino County leaders and reject the continued placement of industrial renewable energy projects in the communities of Boulevard and Jacumba. Residents in backcountry areas deserve some real protections with regards to the preservation of community character and their quality of life. After all, they moved to Boulevard and Jacumba to raise families or retire in a natural environment with clean air and scenic vistas.

While I am not opposed to California's transition to green energy, I am opposed to the massive JVR project as it planned. **The NO Project Alternative is what is best for the future of Jacumba.** Point-of-use rooftop solar installations are a more environmentally sustainable and efficient way to provide power to urban consumers and decisions made by San Diego County leadership must reflect this.

Sadly, I am not so naïve as to believe that some version of the JVR project will not be approved by our County leaders. Therefore, I am proposing a new project alternative, called the "Jacumba Matters Alternative." This alternative is one that the residents of Jacumba might potentially support. As previously described, Jacumba residents have been woefully bereft of project plans due to COVID restrictions. The few of us in the community who are aware of the scope of this project are still working to educate the remainder of the community. As that continues to happen, additional community concerns may be identified which are not addressed in the "Jacumba Matters Alternative."

JACUMBA MATTERS ALTERNATE. This alternative would require the project applicant to agree to a reduction in the size and scale of the solar project, and project planners, the Planning Commission, and County Supervisors to "think outside of the box." **Specifically, it would eliminate the placement of all solar panels south of Old Highway 80.** That would allow glider planes to operate safely from the Jacumba Airport. It would also preserve the quality life for the occupants of the private residence on the south side of Old 80, preserve important acreage for a future Point of Entry at the Mexican border, as well as preserving some of Old Hwy 80's scenic views. (This downsizing might reduce energy generation by as much as 20 MW). Additionally, this alternative would:

--Increase solar project setbacks along the north side of Old Hwy 80 to 200 feet from the ROW where the developer would create a dedicated and signed community trail or pathway next to project landscaping. This trail/pathway would connect with another dedicated public trail/pathway that leads north along the eastern project boundary to the former historic Mountain Meadow dairy. (Another modest decrease in power generation.)

--Increase project setbacks on the north side of Old Hwy 80 adjacent private residences (trailer park etc.) to 200 feet. Here again, the developer would create a dedicated and signed community trail or pathway outside of the project landscaping. North of Jacumba residences, a setback of 100 feet would continue for the entire length of the northwestern project boundary where the developer would continue the dedicated and signed community trail or pathway. These larger setbacks could also serve as de facto wildlife corridors. (Another modest decrease in power generation.)

--Eliminate the placement of solar panels and battery storage containers on the hill where the old farm buildings are currently located because they will not be screened by a 6 foot high fence at grade level near Old Hwy 80. In addition to leaving existing trees and the vegetation around that hill intact to support local raptors and other wildlife, the developer would restore and preserve selected historic farm buildings as an educational site that could be enjoyed by the public. (See page 7 for details.) The developer would also create a dedicated community pathway or trail along the eastern project boundary leading to this site. (Another modest decrease in power generation.)

--Eliminate the project's switchyard and underground the energy generated by the JVR solar project directly into the electrical grid via the SDG&E ECO substation. This would eliminate the need for overhead transmission lines, thereby, minimizing long-term visual and biological impacts. Remove battery storage containers from the JVR project area because they would not be necessary or relocate them to small battery farms near the urban areas where the electrical power will be used. (A potential construction and maintenance project cost savings.)

Many of the project mitigations and community benefits as laid out in the Jacumba Matters Alternative have not been required with other large green energy projects. However, a solar project of this magnitude in such close proximity to a rural community has never been proposed in San Diego County. That doesn't mean those project conditions are not feasible or not worth exploring and implementing. **Jacumbians are asking County leaders to deny the JVR project or significantly reduce its size and scale to preserve their quality of life.**

Sincerely.

Cherry Diefenbach

CC: Supervisor Jacob