November 12, 2024



To: Greg Plucker

Colusa County Community Development Agency Colusa County as Lead Agency for Janus Solar and Battery Storage Project

From: Antoinette Marsh, MS, PhD

Sent via email: gplucker@countyofcolusa.com

This document (and attached appendix) is for public comment on the DEIR related to Janus Solar and Battery Storage Project for which Colusa County Community Development Agency is the lead agency.

Below I pose several issues/comment/concerns regarding the DEIR (Draft Environmental Impact Report).

- 1. The DEIR failed to adequately consider feasible alternatives to the project as required by CEQA.
- 2. The DEIR failed to consider the cumulative impacts especially in relation to reasonably foreseeable future projects in the adjacent area.
- 3. The DEIR failed to adequately address significant environmental impacts, and the DEIR omitted necessary information and analysis.
- 4. The DEIR does not propose sufficient mitigation measures to reduce significant environmental impacts to a less-than-significant level.
- 5. The Colusa County General Plan does not allow for the Project at that site and any decision with disregard to the holistic environmental review and analysis to Colusa County General Plan is an abuse of discretion since land development and planning should take a holistic review, receive comment and review (public and governmental agencies) rather than piecemeal approach.
- 6. Safety and well-being to Colusa County is missing to describe the Project as not harming Colusa County or the environment through direct or indirect impacts.
- 7. The DEIR contains factual errors and approval assumptions, causing some concerns about credibility of details including the descriptions, risk, and mitigation strategies.

1. The DEIR failed to adequately consider feasible alternatives to the project as required by CEQA.

A. Lack of reasonable review and analysis by the Lead Agency

One of the requirements of a CEQA is to consider and evaluate alternatives to the proposed project. The inclusion of the Northeast site containing 15 contiguous parcels totaling approximately 917 acres without any demonstration of consultation with the owner(s) of those parcels is shorting the CEQA processes, procedures and requirements. Moreover, it is inefficient use of agencies time and resources to include a site without any due diligence to determine the viability of the site as a feasible alternative. The lead agency recklessly included this site in the DIER. Under CEQA, "[b]efore using a draft prepared by another person, the Lead Agency shall subject the draft to the agency's own review and analysis. The draft EIR which is sent out for public review must reflect the

independent judgment of the Lead Agency. The Lead Agency is responsible for the adequacy and objectivity of the draft EIR." (see CEQA Statutes and Guidelines)

Mr. Plucker, as a county employee could easily determine who owned the "Northeast site" after reviewing the DEIR (prior to release for public comment) and determine if this was a properly listed feasible alternative to be included in the review and analysis. A reasonable lead agency official would be on notice after seeing that "the Applicant does not have the Northeast Site under site control" (see DEIR 3-5) to further investigate under his own review and analysis. However, that was not done, and it was discovered during a County-hosted meeting after the DEIR was disseminated to the required governmental agencies and the public that the "Northeast site" was not available, nor was the current owner(s) aware of the listing of the "Northeast site" in the DEIR. (comment by Mr. Kelly Orbaum, Planning Commission Meeting, October, 2024).

Furthermore, inclusion of the Northeast site and comment by Mr. Kelly Orbaum suggests that the DEIR contains questionable credible information. Moreover, within the DEIR, (3-1), it states, "[a]n EIR need not consider an alternative whose effects cannot be reasonably ascertained and whose implementation is remote and speculative." Why then is DEIR making a representation of Mr. Kelly Orbaum's property as an alternative site that is speculative and not compliant with CEQA Guidelines in evaluating alternative locations? It is a knowingly waste of government resources to have included the Northeast site.

B. Inability of other agencies and the public to adequately consider feasible alternatives.

The Lead Agency shall not knowingly release a deficient document hoping that public comments will correct defects in the document. Section 21083, Public Resources Code; Reference: Sections 21082 and 21082.1, Public Resources Code; Russian Hill Improvement Association v. Board of Permit Appeals, 44 Cal. App. 3d 158 (1975). The DEIR remains on the Colusa County website for Public Review. Yet, this alternative site (as required under CEQA), remains within the DEIR and essentially governmental agencies and the public (unless they attended the County-hosted meeting) are *unaware* of this reckless inclusion of non-factually correct data which is a significant part of the CEQA process and analysis. It is also wasteful of governmental agencies' time and resources to have them evaluate an alternative site, including the analysis within the DEIR when a reasonable individual would confirm (or at least even attempt to contact the owner) for the availability of approximately 917 acres for the Project.

2. The DEIR failed to consider the cumulative impacts especially in relation to reasonably foreseeable future projects.

A. The zone of influence and land use should be part of the cumulative impacts analysis, particularly relating to loss of farmland to large concentration of utility sized solar developments sprouting, growing and taking over large tracts of lands.

In science there is a maxim, "garage data in: garage science out" likewise when evaluating the LESA modeling and impact to loss of farmland one could say, outdated modeling and inappropriate scoring and weighting leads to inaccurate (outdated) impact analysis and the wrong conclusions.

In the 1997 California Agricultural Land Evaluation and Site Assessment Model (LESA), nowhere is the word "solar" used; however, water and zone of influence is. One could indicate that the zone of influence for solar development is a new variable that *is not accounted* for in the LESA model as it was not envisioned over 25 years ago in 1997 when the model was developed, nor likely when the LESA 2011 Appendices A and B (now over a decade old) were developed. Although the LESA model provides some basic information for the reviewer, the generation of solar tracts now need to consider how one solar development will influence and cause additional solar developments to occur within the same or nearby geographic areas. There is now adequate evidence to implement this into a model for farmland loss.

Solar facility development accounted for 17,192 acres of urban development between 2016 and 2018. Solar facility construction was a significant component of the urban increases in Imperial (91%), Kern (73%), Los Angeles (67%), and Fresno (63%) counties. (see www.conservation.ca.gov)

The LESA Model data for the DEIR is relying on data from the LESA Model (dated 2/2/2021) score of 55.94. Although the Applicant obtained a subsequent memo (Jennifer Merrick, 9/14/2024), the memo merely repeated the 2/2/2021 information, did not perform an updated LESA Modeling and merely summarized and indicated the Project is "occupying a smaller area and would further lessen the potential for the Project to result in significant loss of farm." Ms. Merrick provided no values, no calculations nor tables to support this statement. LESA Model data are required under CEQA.

"Finding optimal sites for the construction of solar farms is a complex task with many factors to be taken into account (environmental, social, legal and political, technical-economic, etc.), which classic site selection models do not address efficiently" (see Guaita-Pradas et al., 2019). Solar radiation intensity, temperature, and wind are factors that this 2019 scientific peer-reviewed publication addresses which is not included in the DEIR. Moreover, this publication indicates that "traditional plans for PVP investments have been somewhat arbitrary, mainly because planners of solar power plant projects have barely considered analyzing them at a regional scale."

Land is a non-renewable natural resource, and it is important that the DEIR add the planned, sustainable, appropriate and zone of influence that the Project may have such as setting a zone of influence and the "sprouting" of solar farms across the western side of Colusa County thereby impacting current infrastructure and emergency responders who will be required to protect these large monetary investments in the high risk fire zone.

B. Solar developments demonstrate a zone of influence in California and the Midwest with progressive loss of farmlands, resulting in large solar tracts in a highly concentrated manner using rural area.

To support this zone of influence impact and the need to include it in the DEIR, please see Appendix A_Marsh, demonstrating a visual progress of the loss of farmlands associated with solar developments. Also, the need to include and consider this in the DEIR is critical, particularly since the factors are present or are proposed for the Project location (transmission lines, substation, lack of population to displace). Thus, Appendix A is a visual display of the area and foothill region of western Colusa County to demonstrate that once the Gen-tie and the Project is built then it is

reasonably foreseeable that additional lands will undergo solar development, likely resulting in significant environmental impacts due to the overall landscape changes (soil-biome, wind, erosion, microclimate, security fencing, vertebrates and invertebrates and their foraging and migration needs) that occur with 10,000 acres under solar panels. This is not speculative as it is an observable fact or event in Southern California and across the Midwest with some of the largest farmland tract losses occurring in Ohio.

- 3. The DEIR failed to adequately address significant environmental impacts, and the DEIR omitted necessary information and analysis.
- A. Microclimate, soil microbiome or their changes to the vegetation diversity impacts were not addressed in the DEIR.

To have a better, more holistic understanding, Moore-O'Leary et al. 2017 in their publication, *Sustainability of Utility-scale Solar Energy–Critical Ecological Concepts*, used five concepts applicable to the development of a more sustainable, utility-scale solar park for analysis. One of these concepts is the 'Land-Energy-Ecology Nexus,' which represents the interactions between land use, energy production, and ecology. Studies evaluating soil carbon cycling and the current understanding of the impact of land-based PV solar developments are currently being done and published. There are published peer-reviewed papers that describe case studies of the interaction between solar developments, animals, and the potential for the disruption of the food chain, by a change in population size. These are not addressed in the DEIR.

Changes to microclimate relative to solar development and land use is not speculative. According to Vervloesem et al., 2022, the data analysis of the microclimate variables that are measured include the following: photosynthetic active radiation (PAR), surface temperature (T_{surf}), air temperature (Tair), and relative humidity (RH). Other components of analyzing for the environmental effects along with the microclimate effects include the data analysis of the vegetation samples include the number of species and their relative cover. The multidimensional functional diversity (FD), or more specifically the distribution of the vegetation according to different bioindicators; and finally, and the land use impact. Nowhere in the three large documents compiling the DEIR could I find the word, "microclimate." This was an issue raised during an earlier public comment period. The Project may impact or could pose a risk to the environment and a microclimate analysis needs to be included to determine if there is an environmental risk and mitigation measures needed if the impact is found significant. In fact, the Department of Energy is keen to further investigate the impact of different solar operations, types and management of vegetation through their InSPIRE projects; thus, the impact of microclimate is not speculative and should be review and analyzed in the DEIR with the currently available science and a number of experts available.

Within a solar field, concentrated water and water-saturated soil strips will occur following precipitation. This can cause a grid pattern to vegetation within the Project area and potentially change the soil structure, leading to erosion or dust. The spacing of water impose differential plant growth strips which has not be modelled or included in the DEIR. This event occurs and maybe related to the water discharge from the solar panel (Dr. Eric Romich, Professor, The Ohio State University).

4. The DEIR does not propose sufficient mitigation measures to reduce significant environmental impacts to a less-than-significant level.

Within the Solar Only Alternative (see 3-5) it is not clear why "the BESS is needed to help reduce the potential energy lost from off-site storage facilities. By building a BESS, it would allow energy to be stored on-site and distributed to the grid when needed. With the Solar Only alternative, energy would be directly distributed to the grid." There is insufficient description and analysis regarding the benefits and risks for locating the BESS compound (the lithium battery storage compound or chemical energy storage unit) for the statement "minimize line loses as compared with off-site storage." This is not sufficiently described for one to determine if the benefits to "minimize line loses" outweigh the risk and environmental impacts sufficiently for leaving them on the Project site. The location of lithium battery storage off site adjacent or near the PG&E substation moves any fire risk or run-away-heat reaction closer to the first responders and into an open plain and not within a valley structure only accessible via a single gravel road. According to Dr. Romich (Ohio State University Professor and Extension Field Specialist, Energy Development) the current lithium batteries have approximately a 10-year life span. Periodic replacement and movement, including dropping, shifting or damaging the units can occur. Another issue analysis for the lithium batteries related to keeping them onsite (high risk) relative to the cost to run the transmission line; yet that transmission line is required to be run whether the batteries are present on or off-site. Furthermore, in times of high wind, high fire danger within Spring Valley, the entire Project (solar arrays and lithium batteries) would be required to be offline (recall the cause of the Paradise, California PG&E line). In contrast, if the lithium battery storage unit facility occurred elsewhere (adjacent to the substation) then it would serve as supplemental power source, and it might not be required to go offline.

Air Quality, Impact 4.3-1, "equipment must be checked and determined to be running in proper condition before the start of work. Idling, staging, and queuing of diesel equipment within 1,000 feet of sensitive receptors shall be limited." Limited to what value, term or fact, this is non-specific, and as such one is unable to determine if it satisfactorily mitigates the impact. It does not state, prohibited or time restricted, or time of day restricted or the number of diesel equipment. These factors are need for a proper analysis.

IMPACT 4.3-2: What does "curtail construction activities" mean? Stop, decrease by 50%, 75%, only use electronic construction equipment and no diesel equipment or dust creating activities? Again, lack of specificity causes inability to do an adequate review of the DEIR and mitigation measures.

What are the contingency control measures when primary controls are ineffective. This is worrisome if already there is some concern that primary controls will be ineffective. Without listing the contingency control measures, the DEIR is not specific and lack definitive factors for reasonable analysis.

Under IMPACT 4.4-1: There is no comment about the sound and vibrations that will occur to the ground that may impact Burrowing Owls that maybe present more than 150 meters from the project site.

BIO-2: indicates "greatest buffer (up to 50 feet) should be flagged around the sensitive habitat. This is in conflict with the early statements regarding protection of the Burrowing Owls and Swainson Hawk that require greater protective border. Thus, the mitigation measures need to clearly define that the greatest borders (not the most minimum borders, ie "up to 50 feet") will be flagged. There is inconsistency in the DEIR as to the mitigation measures to sensitive habitats.

Why is the speed limit on Spring Valley Road **limited to 15 mph** and then **within the construction site the speed limit is allowed up to 20 mph**. Although not specified here, it is assumed that within the project site, dirt or gravel roads will exist (similar to Spring Valley Road gravel). The increase to 20 mph within the project site is anticipated to create dust and cause elevated particulates in the air (impacting air quality). Explain how 15 mph on Spring Valley Road mitigates dust while 20 mph on the site does not.

The holistic environmental impact during the decommission of the project is missing. It merely states that a long-term trash abatement program "shall be established ... decommissioning." This means there is NO defined plan, NO ability to review the plan, and NO ability to include mitigation measures to decommissioning risks. There is no ability to review and assess the risk and risk mitigation if the details of decommission are insufficient.

BIO-3: Failed to adequately address the impact of sound and its cumulative impacts to sites beyond the 500-foot buffer. The DEIR failed to address all audible factors involved in the project construction (driving, reverse alarms, post installation, etc). All of these contribute to sound and audible disturbances and need to be included in the DEIR. The DEIR does indicate noise minimization with the following: "noise walls" (See Noise), no height given for these walls or structure. The DEIR indicates construction noise would "not exceed 86 dBA at the Project boundary." I am not convinced the geography of the site allow for containment of the construction noise to be retained within the (no height provided) noise walls and kept below 86 dBA. One only needs to fire a gun to hear the sound travel within Spring Valley. Sound travels in 360 degrees from the source and is three dimensional, not just lateral/horizontal across the ground. Moreover, based on the construction site, a complete noise wall would be required around fueling stations, equipment parking pads, during post installation, and equipment loading and offloading, including the appropriate height (this needs to be provided for analysis) to prevent or determine noise pollution mitigation across Spring Valley. Moreover, noise should be included in the BIO-3 analysis component regarding impact to sensitive species. Again, I reference back to an earlier public comment period to the audio recording file submitted of a solar installation project. The noise impact component has not been sufficiently addressed, mitigated and is/will be a significant ongoing impact during construction and post-construction of this project. The Addendum to the Sound Survey fails to address the issues above in sufficient detail for an environmental review of the impact and mitigation strategies.

Under Hazards and Hazardous Materials, Impact 4.9, does not describe the cumulative volume of fuel storage (storage containers, equipment tanks, personal vehicles, etc) that will occur for the onsite equipment. The impacted is stated less than significant and no mitigation required. This is

lacks definitive details and specificity and likely needs some sort of mitigation strategy due to the hazards of diesel and gasoline or other hydrocarbons storage units, particularly larger volumes as used in construction and soil grading. Stored according to regulations or law does little to understand the environmental risks and mitigation strategies used, particularly in a comprehensive and cumulative review of the Project.

5. The Colusa County General Plan does not allow for the Project at that site and any decision with disregard to the holistic environmental review and analysis to Colusa County General Plan is an abuse of discretion since land development and planning should take a holistic review, receive review and comment (public and governmental agencies) rather than piece-meal approach.

As indicated and noted in my previous comments, the Project is not compliant with the Colusa County General Plan and is now seeking a Use Permit to get around the noncompliance issue with the Colusa County General Plan. This could be considered an abuse of the process, notice and discretionary decision making, and further setup the County to potential litigation. A general plan is required to undergo its own CEQA. The DEIR's approach is undermining the correct procedure to land use and planning.

6. Safety and well-being to Colusa County is missing to describe the Project as not harming Colusa County or the environment through direct or indirect impacts.

Page ES-2: No where in the Projective Objectives is the word, "safe" or "safety" used. Yet in SB 100 which is California law to achieve 100% of the state's electricity to come from renewable and zero-carbon resources uses the word "safe" or "safety" six times. California is not foregoing safe or safety just to achieve zero-carbon electricity. The Project DEIR needs to consider safety whenever designing and analyzing the impacts and mitigation strategies.

- 7. The DEIR contains factual errors and approval assumptions, causing some concerns about credibility of details including the descriptions, risk, and mitigation strategies.
- A. The DEIR should be correct as to the geographic location and description or details of information provided within the documents.

Figure 2-1 shows project location only on the EAST side of Spring Valley Road, yet within the Executive Summary it still includes an address on the West side of Spring Valley Road and includes the description of Section 3 of Township 14 North, Range 4 West which is located on the WEST side of Spring Valley Road.

"Defenders of Wildlife," (see 1-3) is NOT a public agency.

B. The DEIR makes statements of approval *assumptions* without the ability of reviewing external agency partners or the public to review or provide analysis of the Project information or mitigation plans.

Note, under "Vegetation Management and Wildfire Prevention Plan shall be submitted to the Williams Fire Protection Authority and the County for review and approval." This statement indicates that the Williams Fire Protection Authority and the County will be only be allowed to review and approve the Plan. It should state the following: Vegetation Management and Wildfire Prevention Plan shall be submitted to the Williams Fire Protection Authority and the County for review, revision and necessary modification as required, and if deemed acceptable then Williams Fire Protection Authority and the County will approve the Plan. A draft of the Vegetation Management and Wildfire Prevention Plan is included in the Appendix (and then give designation number). The italic font is representative text and information that should be in the DEIR for review and analysis.

Regarding, 2.4.5 PG&E Improvements, the Project does not specify that it has a memorandum of agreement, contract or any other document that would confirm that PG&E would construct the network upgrades as specified in the DEIR (and also noted in section 4.1.7). It appears that the Project may have executed "Interconnection Agreement" and plans to use Cortina 60 kV transmission line through the PG&E utility. However, the available information shows as a proposed (as filed with IR) as 12/31/2021 (see California ISO Resource Interconnection Management System) (and it is unknown if this is a definitive, MOU or a taking agreement). Therefore, it is likely that the this "Interconnection Agreement" reflects an earlier superseded development design. Moreover, the Janus project (Colusa) is in the queue position of 1455. The current "Interconnection Agreement" should be included as an appendix so DEIR reviewers can understand and verify that the Project is legitimate.

C. Internal conflicts within the DEIR confound or make the environmental analysis impossible and thus any measure of impact and related mitigation measures impossible.

Under fire, it lists mowing will occur to prevent grass height. Commercial law mowers/tractors can exceed 90 dBA (University of Florida, Environmental Health and Safety). This will be an ongoing activity during the late springtime when sensitive species may be impacted. Normally for this location (Spring Valley), extensive acres of "commercial grass trimming" is not an ongoing activity, particularly to keep grass either non-existent or ~2 inches as stated for fire mitigation. If the solar panel require washing (see 2-15, "cleaning of the solar panel"; see 2-16, unknown frequencies, listed as months to years) (pressure washer, 100 dBA) there is no ongoing mitigation measures for this noise level from occurring on an ongoing basis and at sensitive times of the year. There is an internal conflict (noise associated with ongoing vegetation/solar panel maintenance) with environmental impacts (ongoing noise levels for the duration of the Project) and proposed mitigation strategies (limited to construction activities). The DEIR does not resolve the internal conflict.

In viewing Figure 2-3 Site Plan, it is not clear how the sound and visual impacts will be mitigated (specified buffer zones that included items such as 50 feet zone, 500 feet zone and 86 or less dBA)

on the southwestern corner of the Site Plan. The Site Plan and solar panel arrays are setup against the southwestern boundary with no apparent bordering access roads around the entire solar array, including the southwest corner in Figure 2-3 Site Plan. Figure 2-3 is inconsistent with statements in section 2.4.4.6 Access and Circulation. Inconsistency does not allow for an environmental review of the level of significance and assessment of the mitigation measures when an impact occurs.

Also, relating to Figure 2-3 Site Plan, there is no key, figure legend, or descriptive text related to the purple or yellow or red coloring on Figure 2-3. Without this information, it is impossible to fully analyze the project impact. The DEIR should contain all necessary information for review, analysis and comment.

This project discussed panel section and used the following statement: "would be determined at the detailed Project engineering phase" yet the DEIR states construction would begin summer 2025 ("operational in the summer of 2026" see 2-22). Summer 2025 is less than 9 months away (current date is November 2024). The DEIR was drafted in September (less than 12 months from the proposed construction start date). The final panel selection is vague unless the lead agency's goal was to be not specific so as to avoid agency and public environmental review over this item. CEQA does not make exception for required information (i.e. cannot claim trade secrets).

Page 2-9 fails to indicate the size of the generator and the size or amount of onsite storage of propane or diesel that will be used to power this generator. Nor are these details apparent from the diagram, 2-5 and 2-6. Interestingly, it is apparent that the fuel tank is adjacent to the 20-foot drive gate. If this the same access gate referenced at the site entry (see 2-15) some concern about egress and ingress may occur. Please include the information regarding the fuel tanks and an alternative location should the fire department not approve having a propane or diesel tank adjacent to an access gate.

Regarding, 2.4.7.1, citing to the decommissioning, the DEIR uses the term, "primarily non-hazardous." As most of the site will be covered with unknown type of solar panels (see panel selection "would be determined at the detailed Project engineering phase"), analysis of the DEIR cannot be completed and allow verification of the "non-hazardous" statement. The DEIR needs to either specify the type of solar panel arrays that WILL be used or not make blanket statements about an unknown commodity used and how this unknown commodity is considered "primarily non-hazardous" during decommission.

Under section 2.4.8.1, with the application of pre-emergent herbicide, the DEIR needs to include or address how they will protect surface and ground water or herbicide bioaccumulation or translocation from the site. This is a large site that will then undergo significant grading and topsoil movement. Move over if annual or even more frequent spraying is done, bioaccumulation and soil health are important parameters.

Section 2.4.8.2, lacks details on the soil recompacted and how much noise (dB and duration) or ground compression will occur during the recompaction of the soil. This information is necessary for the DEIR review.

Section 2.4.8.2 is not specific enough regarding how many steel piles will be driven into the ground as compared to the conventional foundations. Also, little analysis has been done regarding the

environmental impact and carbon emissions these two methods generate when installing the support poles for the solar panels. The DEIR only indicates that "geotechnical analysis" or "cost-effective" will be used to determine whether steel piles or conventional foundation will be used. For an adequate DEIR, including the ability to comment and analyze the environmental impact, additional information, specifically how many steel and how many conventional foundations will be installed. Also, the associated greenhouse emission (GE) should be included. In addition, the material used for creating the conventional foundations such as concrete, including its transportation is a known carbon emission building product and should be analyzed or compared.

Section 2.4.8.3 indicates that the BESS would be placed on steel pile, grade-beam or concrete foundations. Again, proposed construction is less than 1 year away (see 2-20, listed as "July 2025") yet the DEIR fails to specify how the BESS (essentially a chemical storage reaction unit) will be onsite. Without specificity, one cannot provide appropriate public comment on the DEIR. Please specify what will be the supporting structure for the BESS (the chemical storage reaction unit).

Regarding 2.4.8.4, Gen-tie Line Construction and Stringing, the DEIR fails to describe precise location of the new poles or if the pole will occur within the County Right of Way, private property utility easement, private easement, or other arrangement. These poles will be installed by the Applicant (see 4.6-9), yet the DEIR fails to indicate who is responsible for these poles following installation. If the poles remain the private property of the Applicant (non-public utility), then additional information is necessary to evaluate easements and private property rights, including maintaining the appropriate County Right of Way for Spring Valley Road without encroaching upon the private property of others and if the environment will be impacted and by whom or when maintenance is done on the poles or the line or the vegetation around the poles (sprayed or mowed). Does the Project have a memorandum of agreement with the County or the public utility concerning this component? If so it should be included for review to ensure ongoing environmental impacts from the Project are reviewed.

Regarding hours, the DEIR states that "potentially 8:00 am to 5:00 pm Saturdays and Sundays" (see 2-20) work on the construction site could ensue. The pile-driving audio file submitted as part of the earlier public comment was recorded on a Saturday morning. According to the nearby resident (where the recording occurred), they experienced pile driving noise 7 days a week for months. Again, noise travels in a 360-degree manner and the DEIR fails to detail the mitigation strategy at the southwestern corner of the project likely impacting the environment and residence at that location.

Regarding, 2.4.8.6, indicates perimeter and internal roads would be present, yet the diagram of the Figure 2-3 Site Plan fails to include this data. What is correct, the written text or Figure 2-3 Site Plan? The DEIR is inconsistent with the information provided and analysis cannot be complete.

Under Drainage and Water Runoff (2-24), indicates the units are waterproof. The DEIR fails to clarify if they remain waterproof if warped, or there is damage to the metal-weld or the seams seal integrity will remain intact despite high temperatures during either an electronic-chemical reaction, fire or physical impact by equipment. Within the paragraph it states, "runoff from applied water would not contain contaminants as the units are waterproof and the gravel surface would allow the water to percolate into the ground." High temperatures and fire can cause compromise of containers, resulting in leaks and hazardous spills. The DEIR fails to address how to deal with BESS

compromised integrity and environmental impact (after allowing the water to percolate into the ground and then what is the plan to mitigate this to prevent predictable ground water contamination). According to the DEIR, the Project "is within the Colusa Basin Watershed which is part of the Sacramento National Refuges Complex" (see 4.1-9).

Regarding reduced acreage (see 3-2) it is not clear that this analysis is complete nor compliant with CEQA guideline requirements. As the solar panels have yet to be selected and therefore, the solar panel associated efficiency to capture energy has yet to be provided, it is unclear how the DEIR determined that the reduction of overall acreage from 666 to 629 (overall reduction of only 6% of the total acreage) could so significantly impact the Project as to make it not economically viable. The DEIR failed to include a comparative data associated with the selected solar panels, their number, and the setup of the panels. As such, a complete review of the DEIR could not be performed.

Under the Aesthetics analysis, the simulated conditions (4.1-10 to 4.1-13) failed to include the perimeter road and the impact to aesthetics. These would be considered lines and differences in the colors. The simulated conditions are <u>incomplete in the DEIR</u> relative to the earlier Project text descriptions. To fully analyze the impact, these figures should be compliant and simulate the conditions as described in the text.

Moreover, the text for Key Observation Point 8, indicates "[t]his KOP depicts views <u>focused</u> <u>southeast toward</u> the Project site." This is <u>NOT a true statement</u>. Rather, point 8 is a northwest toward the Project site. And, this view also fails to include the perimeter road. This is important since a residential property (located 100 feet south of the Project, near the project's southwest corner, see 4.3-2) is located at KOP 8 and will look at that view 24/7, including any motion detection lights that turn on and off during darkness. The stimulation should include winter views and darkness with the motion lights on too. The simulated conditions are <u>incomplete in the DEIR</u> relative to the earlier Project text descriptions. To fully analyze the impact, these figures should be compliant and simulate the conditions as described in the text. Moreover, as stated in the DEIR, "from KOP 8 approximately 50% of the Project is potentially visible." (see 4.1-42).

Under California Land Conservation Act of 1965, the solar use easement does not include the use of an energy storage facility like the proposed BESS. The solar use easement is for "solar power generation" and does not include "storage."

Under 4.3 Air Quality, the DEIR failed to indicate the risk of air borne fungi or bacterial spores that may be present in those soils, particularly with the amount of grading and soil movement that would occur. Valley Fever, coccidioidomycosis is caused by fungi spores that are then carried by the wind and inhaled by individuals.

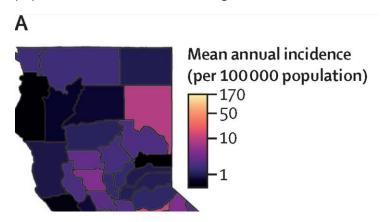
There are at least 3 reports by the Centers for Disease Control of coccidioidomycosis outbreak among workers constructing solar power facilities (see CDC Morbidity and Mortality Weekly Report, August 24, 2018). In the CDC analysis, it included that incidence among solar installation workers was 4.4 to 210.6 times higher than background county rates, providing evidence that illness was work-related. Moreover, the CDC recommends that prevention methods need to be better incorporated into the planning and monitoring of large solar construction projects and the

involvement of public health practitioners into preproject reviews. Nowhere in the DEIR did I locate a discussion over prevention or mitigation of *Coccidioides* spp or the use of public health officials.

According Head et al., 2022 (UC Berkely):

Coccidioidomycosis is an emerging infectious disease caused by the inhalation of spores of the soil dwelling fungal pathogen belonging to the *Coccidioides* genus, which can become airborne through wind erosion or soil disturbance and are amendable to wind dispersion. Infection can lead to a primarily respiratory illness that can last months or might progress to a chronic state in 5–10% of individuals. In California (USA), age-adjusted incidence rates of coccidioidomycosis increased by nearly 8 times from 2000 to 2018, and more than tripled between 2014 and 2018.... Changing climatic factors that influence the distribution of suitable *Coccidioides* habitat could have a major role in the expansion and rise of coccidioidomycosis in California. (individual citation omitted)

As illustrated in the Head et al. study (2022), Colusa County has a higher incident per 100,000 population relative to surrounding counties.



According to the California Department of Public Health, [m]ost cases of Valley fever in California are reported from the Central Valley and Central Coast regions. But Valley fever cases have also been increasing outside of these regions as California experiences more drought. Valley fever cases are on the rise in California, including in the northern Central Valley and southern coastal areas of California. (www.cdph.ca.gov)

No where in the DEIR is any consideration of the disruption of the soil, particularly soil that has undergone dry and wet conditions without disruption for years, and the impact to air borne fungi or bacterial spores that are dispersed by the wind. There is no analysis of this impact and when the winds blow, we know that particulates from fire/smoke can be carried for miles if not across county lines.

The DEIR does admit that fugitive (escaped) dust from soil disturbance activities (see 4.3-15) will occur; however, as most individuals involved in construction sites understand, wetting and dust mitigation is not 100% moreover some wetting and dust mitigation interfere with rapid soil grading that would need to occur for the Project (see, 4.3-15, i.e., 11 months for construction). Moreover, the temperature and humidity in another 6 to 9 months is unknown.

Although *Coccidioides* may not be an individual item under regional and local air quality conditions, it is considered a hazard, demonstrates higher incident in Colusa County relative to surrounding counties, and as such should be included in the DEIR for the Project analysis.

According to the CDC, the cumulative total of both confirmed and suspect Coccidiodomycosis case in California for 2024 to date include, 8338. Although farm cultivation involves disruption of the soil, it generally only involves a single individual in a tractor cab. In contrast, the Project estimates that 200 workers will be onsite in that environment. Thus, there are both short- and long-term impacts to and from the environment regarding the dust and this specific item is not address in the DEIR.

It is known that animals can contract coccidiodomycosis. Again, there is no review or consideration of this item.

Finally, because dust mitigation and other measures are recommended by public health, it is not evident from the DEIR that adequate water supplies (for dust) are onsite to fully mitigate this public health and environmental threat. In the DEIR (4.11-8), it indicates, the County may apply its police power authority to regulate land use. The County may also prohibit a public health threat. Under normal circumstances, the governing body of the local jurisdiction (board of supervisors or city council) is responsible to take measures as may be necessary to preserve and protect the public health (Health & Saf. Code, §§ 101025, 101450). Within the DEIR, it is not evident that the lead agency has adequately address this known and demonstrated risk (Coccidioides spp. associated with large scale solar installation.

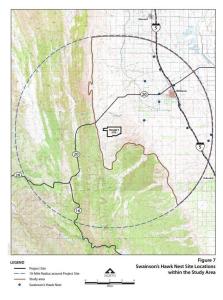
Some of the DEIR Biological Resource analysis occurred during an unprecedented period of drought from 2020 to 2022 in Colusa County (see 4.4.1-3, Vegetation Community, BSA during the 2020 field surveys). The analysis is going to be significantly impacted by this and may not be accurate. According to California Office of Environmental Health and Hazard Assessment, droughts can have significant environmental impacts and "[d]roughts produce a range of ecological impacts." Although the DEIR attempted to update some data during the spring of 2024 (lists only late spring/early summer 2024 and not winter BUOW survey data) it does not completely encompass and replace the presented data obtained during 2020 in the DEIR which was collected during an unprecedented period of drought in Colusa County and may not accurately account for the biological resources (including the rare plants) present and thus, the DEIR analysis is not complete. Moveover, these populations may be just recovering after drought and not representative of normal population basis. Finally, did the subsequent biological surveys (2024) find the initial survey work (pre-2023) problematic, if so then a description and declaration should be included.

The DEIR should footnote the specific year and time of year from which the individualized data originated, including when the "protocol-level rare plant surveys conducted for the Project" (see 4.4-13, no specific year given).

Moreover, it is rather concerning that the DEIR footnotes an important issue lacking data, ".... survey for burrowing owls will be conducted during the winter of 2024-2025" (see 4.4-2, 4.4.10). Thus, admittedly the DEIR is incomplete by the applicant for sensitive species and as such full and complete impacts cannot be completed.

It is not clear in the DEIR how some of the data was collected after reading statements such as this: "[t]here are no CNDDB occurrences of this species within 5 miles of the project site" (see 4.4-14 & -15). Please see Google Earth Map below, as supplied by this author, and not part of DEIR. The line represents a straight course of 1.7 miles from the Project. Much of the visual landscape is privately owned and with difficult accessibility on the west and southern sides of the Project. The lands to the southeast of the project would include raptors or other sensitive species presence or their habitat that must be considered within the DEIR review. Yet within the DEIR, the survey purports (Figure 7) to have included these lands in their analysis.







Moreover, the DEIR assurances that "a qualified biologist shall conduct preconstruction surveys of all potential nesting habitats within the Project site and a 0.5 mile buffer" (see 4.4-52) is questionable and misleading because an earlier statement in the DEIR stated, "on private property and could not be accessed during the survey" (see 4.4-27). Earlier line of site analysis demonstrate (see KOP) that not all views on the horizon can be seen at a distance of 0.5 miles. There are inconsistent statements made in the DEIR and resolution of them are necessary for an accurate presentation of data for analysis to determine the Project impacts.

Specifically, the Department of California Fish and Game indicate the following for proper survey protocol for Swainson's hawk:

A qualified raptor biologist with Swainson's hawk survey experience, approved by the Department and the appropriate lead agency, should conduct surveys in a manner that maximizes the potential to observe the adult Swainson's hawks and the nest/chicks via visual and audible cues within a **five-mile radius of the project** (emphasis added). All potential nest trees within the **five-mile radius shall be surveyed for presence of nests**. Surveys should be conducted prior to environmental analysis.

Thus, the DEIR and posed mitigation measures (surveying only 0.5 mile, see ES-8, Sept 2024) for the Swainson's Hawk do NOT comply with the CFG survey protocol for Swainson's hawk.

For the Greenhouse Gas Emissions, the DEIR failed to include the materials used for the Project, including all the petrochemical based wire coatings. It does not state where the materials are sourced such as imported from aboard, using a non-USA manufacturer, or manufactured within California or elsewhere in the USA. As anticipated construction (listed as July 2025 in the DEIR, see 4.8-9) then it is likely that these materials are being procured and the Applicant knows where they plan to source construction materials, including the solar panels. A statement as to the source location and sizing of cargo is important to analyze the overall CO2 emissions associated with transportation of building materials and to verify the values provided in the DEIR since some of the earlier information within the DEIR indicates review, verification and/or contesting is required, including understanding and assigning an impact level of the Project. This request on materials and shipment was included in my public comments, see July 31, 2024 (Notice of preparation, DEIR) and I included pictures of these materials being used in a solar project development.

Regarding 4.9.1.3 Solar Photovoltaic Panels the DEIR indicates that "First Solar has a state-of-the-art facility in Ohio for recycling all the components of solar arrays and claims a 90 percent recoverable rate of materials processed (First Solar 2024)" (see 4.9-4). This is not a completely true statement, per First Solar's website, "Cadmium and tellurium separation and refining are conducted by a third-party" and "First Solar currently operates recycling facilities in Ohio, Malaysia, Vietnam, Germany, and India." (see www.firstsolar.com). Also, as material undergo heating and combustion, individual components have differing vapor pressures, to summarily state that the "[n]o emissions from CdTe PV would be released during fires because Cd would dissolve into the molten glass," may not be a completely accurate statement. Noting the type of substance, the conditions under which it burns (temperature, vapor pressure), and the specific harmful chemicals released or providing a peer-reviewed citation for the summary statement is needed. It's important

to understand the potential health impacts and environmental consequences of these emissions. Knowing the types of panels (silicon, thin-film or polymer-based) will also control what is emitted during a "burning or heating process." The panel types are not specifically provided.

Under the BESS location (see 4.9-6) initially, the DEIR indicates a minimum spacing of 21 feet yet then the DEIR indicates, "spacing is subject to change at the time of final design." This makes no sense to set a minimum and then make it subject to change and then attempt to determine impacts. The change could make the spacing smaller or larger and the appropriate DEIR analysis cannot be performed without at least standard established minimum spacing distance given.

Regarding, Automatic Protection, (see page 4.9-6), and as indicated (2-24) "water used during a fire would be used to cool adjacent structures ... runoff from applied water would not contain contaminants as the units are waterproof and the gravel surface would allow the water to percolate into the ground," yet there is no specific information on the welds, sealing or impact of heat on the welds, sealing, or seams on the BESS units when placed and used in the Project site. Any compromise of the BESS then results in water intrusion and as stated in the DEIR relative to fire, "prolong the internal reaction... thermal runaway... contamination...." Please indicate how the risk and impact was analyzed here and *in combination* with the "spacing is subject to change," without determinate measurements provided. Vague and indeterminate values in a DEIR will result in the inability to determine the environmental impact. There is no analysis or modeling of the cumulative impact of having the proposed project number of BESS units, side-by-side, in the environmental conditions as present in Spring Valley during the summer time condition when fully operational and completely charged to 100% capacity.

The DEIR fails to indicate how long non-functioning lithium batteries, targeted for recycling will remain on site and how and the location of these non-functioning batteries will be stored (see 4.9-17) as they are considered hazardous waste (see 4.9-18). This information is needed to analyze the DEIR and overall site plan, including egress/ingress and overall safety of the environment and emergency responders to the site and the impact of the Project.

On page 4.9-20, the DEIR states relating to fire hazards and risks, "no heat fluxes were recorded at distances of up to 20 to 30 feet from the battery cabinet." The issue for analysis is the DEIR also states as noted earlier that a minimum spacing of 21 feet will be used then the DEIR indicates, "spacing is subject to change at the time of final design." Here, we cannot analyze the risk or hazard because the spacing is subject to change and anything less than 20 feet likely has a heat flux. The DEIR indicated fire propagation to adjacent cabinet (BESS unit reference) did not occur (6-inches and 8-feet apart) but it also did not indicate if heating or warping or pressure changes occurred to the adjacent cabinets, and the cumulative impact of several units (reference to BESS) in close proximity. The environmental impact cannot be determined.

On page 4.9-20, it fails to note the material for which the pressure relief vents (or pouch seams) will be made of (aluminum or steel or some other composite material) or how they will be constructed. The Megpack 2/XL only states, 'pressure-sensitive vents" or "integral and proprietary explosion mitigation system (deflagration control)" [note trade secrets are not exempted from disclosure for CEQA and DEIR; by analogy it would be the same for proprietary information]. The risk of hazard or environmental impact cannot be analyzed in the DEIR without this information. For example, East

Palestine Ohio train derailment had <u>relief valves malfunction</u> which contributed to the environmental release of hazards into the environment with toxic chemicals that then set a chain reaction of events. As of January 2024, the railroad's costs related to the derailment and **environmental impact were \$1.1 billion**, with \$101 million in insurance payments issued. (see Funk, AP, 2024).

According to the DEIR, the sparkers are located throughout the Megapack at various heights and continuously operate to ensure that any flammable gas build-up is ignited early – limiting the concentration of flammable gas within the unit and activating the pressure-sensitive vents to create a natural ventilation pathway to the exterior. For the Deflagration Control System what is the threshold limit of flammable gas? That value is not given. The TELSA Megpack 2/XL Hazard mitigation analysis does not address site-specific hazards, barriers and mitigation of the battery packs. Also, that specific document also includes the following disclaimer:

This document is not meant to serve as professional and credentialed engineering, legal, technical, or emergency response judgment, should not be used in place of consultation with such appropriate professionals, and you should seek the advice of such appropriate professionals regarding such issues as required. Further, the contents of this document are in no way meant to address specific circumstances, and the contents are not meant to be exhaustive and do not address every potential scenario associated with the subject matter of the document. Site and circumstance-specific factors and real-time judgment and reason may significantly impact some of the subject matter conveyed in this document.

One of the more concerning passages in the TELSA Megpack 2/XL Hazard mitigation analysis is the following: "Toxic and highly toxic gases released during fires and other fault conditions will not reach concentrations in excess of immediately dangerous to life or health (IDLH) level in the building or adjacent means of egress routes during the time deemed necessary to evacuate from that area" (see page 6 of TELSA Megpack 2/XL Hazard mitigation analysis); and "[i]n the unlikely event of a fire, the system will consume itself slowly in a safe and controlled manner, without any explosive bursts, projectiles, or unexpected hazards" (page 8 of TELSA Megpack 2/XL Hazard mitigation analysis).

The DEIR fails to provide a comprehensive, clearly organized subsection detailing the risks of the BESS as addressed within the manufacturer materials. The inclusion of conflicting information (not hazardous as described in the main body of the DEIR) and then the manufacturer indicating toxic gases released during fires and fault conditions and the system will consume itself during a fire are difficult to reconcile and analyze the potential environmental risks and mitigation strategies listed.

Table 4.13-7 failed to include pile-driving machine (as noted in section 2-6) and the associated values with the pile-driving machines during construction. The DEIR is not complete.

According to EchoBarrier, pile driving is one of the noisiest construction activities, reaching almost 120 dB from 10 feet away. The DEIR notes that during construction "the temporary increase in noise...is considered to be less then significant." I would encourage anyone to listen to the audio

file submitted during the early public comment period, Monday through Friday, 7am to 7pm; 8am to 5pm Saturday and Sunday for a full week and then make the conclusion if the temporary increase in noise is less than significant. For the Project construction, the pile-driving machine will be installing metal piers into the ground. It essentially causing a nuisance and is a taking of a residence for 11 months due to the excess noise associated with the construction. The tables included in section 4.13 fail to model the noise during construction. The other component of concern is the loss of wildlife that could permanently move from the location due to the months of pile-driving activity and construction noise.

The DEIR notes that the roller (see 4.13-20) is associated with the worst-case vibration source. If the pile-driving machine is not included in the DEIR section 4 then how can the impact be fully analyzed. The DEIR is incomplete relating to vibrations, sources and impacts.

Section 4.15.4 impact analysis is inconsistent with previously described BESS installation, as Section 4.15.4 states, "[a]ll battery components for the BESS would be installed on concrete pads...." Whereas, earlier, (see Under Drainage and Water Runoff (2-24)), indicates the units placed on "the gravel surface would allow the water to percolate into the ground." The DEIR is inconsistent in the plans and description and as such environmental impacts cannot be accurately analyzed if varying description and different substrates are used for foundations and/or supports.

In section 4.17.6 mitigation measures (see 4.17-9), "[d]amage to streets to the extent determined to have been caused by Project construction traffic shall be repaired to the satisfaction of the Public Works Director" does not indicate who determines the damage to the streets and how to resolve a dispute if the Public Work Director indicates the damage is cause by the Project, repair is not satisfactory or done in a timely matter, and the Applicant (the Project) disputes the Public Work Director's findings. This incomplete method of resolution means the DEIR is incomplete and complete analysis of mitigation measures cannot be completed because the damage may remain unmitigated due to dispute. Foreseeability and predicting impact is an important component of the DEIR process.

In the executive summary (see ES-22) it indicates within FIRE-1: Wildfire Protection Measures it states, "Zone 2: Grass maintained at stubble height (~ 2 inches)" and "Zone 3: Grass maintained at 4 inches in height" (zone 3 is defined at 0-20 feet from all PV arrays); whereas in 4.20 Wildfires, the DEIR states, "[t]he minimal vegetation maintenance in the areas between the arrays would include vegetation up to 12 inches in height." It would be anticipated that zone 3 and the area between arrays would overlap. Will some sort of marker be established to ensure the complete 20-foot zone of zone 3 is maintained? It was not clear from the DEIR how this zone would remain consistent and the Project would remain compliant.

As it is anticipated that workers will spend their entire shifts on site at the Project, there is no statement in the DEIR where workers will take their breaks which include breaks for smoking of tobacco or if similar substances will be allowed. If smoking is prohibited at the Project site then it is foreseeable that workers will relocate outside the Project site to smoke, or attempt to park off site and use their cars for smoking or resting. This may include standing outside the Project site gates or parking cars alongside the Spring Valley Road to be off the Project site. There are no mitigation measures listed in the DEIR for this likely and very foreseeable scenario.

Per 4.20-19, "[t]he ESRP will also take into account recommendations provided by the BESS supplier" yet no supplier or supplier recommendations are included in the DEIR section for review or analysis in combination with the other statements and the supplied appendix information includes multiple models by the manufacturer. There is no definitive statement as to the exact model of BESS being proposed. Without this specific information, this DEIR is incomplete, and it is impossible to determine if there is inconsistency or conflict between statements made in the DEIR text and what the BESS supplier may recommend. Therefore, the risk and mitigation cannot be determined.

Per 4.20-20, it indicates "[b]attery container spacing shall be determined based on UL 9540A test data, manufacturer recommended separations, and potentially a heat flux analysis utilizing computational fluid dynamic modeling software," yet earlier in this DEIR, it stated, a minimum spacing of 21 feet will be used then the DEIR indicates, "spacing is subject to change at the time of final design." With distances changing within the DEIR, there is inconsistency in the information provided, resulting in the inability to analyze the risk and mitigating measures or determine and/or verify the impacts of the Project.

Under section 4.20-20, it states, "[s]hould the Project Owner place on the site more than one battery storage prior to obtaining approval of the Williams Fire Protection Authority of the UL 9540 certification or the testing equivalent, it does so at its own risks..." No risk or analysis or impacts were provided for this statement. It is unclear what "it does so at its own risks" means. Does this mean the WFPA is not required to render emergency fire control?

Under air quality for the distributed solar alternative (see 5-9), the DEIR states, "[t]he Distributed Solar alternative would result in more vehicle trips compared to the proposed Project as on-site construction equipment and worker vehicles would be dispersed throughout the County, requiring multiple, distributed trips' is not supported by any analysis or data to indicate vehicle trips. The alternative was not analyzed sufficiently under the CEQA guidelines since no data was provided to make this concluding statement above.

Under energy for the distributed solar alternative (see 5-9), the DEIR states "[t]he Distributed Solar alternative would also result in more fuel consumption compared to the proposed Project as onsite construction equipment and worker vehicles would be dispersed throughout the County, requiring multiple, distributed trips" is not supported by any analysis or data to indicate vehicle trips. The analysis included fossil-fuel trips and emission. Yet, electric cars and trucks are entering our transportation force, and it would be anticipated that solar installers would be using some if not advocating for solar/electric vehicles. There was no analysis to include trip associated with electric vehicles as compared to fossil-fuel vehicles.

Per Odens, 2013:

"Less energy is wasted when solar power is produced close to the source of its use. In order for the energy from solar panels to be used, the energy harvested must be tied into the grid, a process requiring electricity lines to be run from the solar panels to a grid location. Not only does this process require more land and clearing to construct the energy lines, the energy harvested by the panels degenerates as it moves through the lines to the grid. Therefore, as the

distance increases between the solar panels and the place where the energy ties into the grid, a greater percentage of energy is lost." (internal citations omitted)

The alternative was not analyzed sufficiently under the CEQA guidelines since no data was provided to make this concluding statement, more fuel consumption compared to the proposed Project. Based on Oden, rooftop panels are more efficient for individual homeowner energy use than for energy-generation elsewhere, such as miles away, and then transmitted to home for use.

In 5.6 The Undergrounded Gen-Tie alternative failed to describe the additional ground disturbance compared to the proposed Project in sufficient detail (width of trench, trench equipment, time to trench, exact location of trench, etc.) to fully analyzed and compare impacts. The only information included was the 4 miles and estimated costs widely ranging without considering the local Colusa County factors that went into the CPUC 2019 cost estimates (location, easement purchases, relocation of other utilities, etc). The CPUC website includes other factors such as population and building density, labor costs, terrain, and geology may result in a range of costs for undergrounding conversion. None of these were itemized within the project DEIR for analysis and impact relative to environmental risk and costs to mitigate. The CPUC provided an average cost of average cost of \$3.8 million per circuit mile of conversion for undergrounding for California.

Biological Survey Report, (page 5), describes "meandering survey transects" but does not include the number and length of each transect. The details of the DEIR are missing for review and analysis to determine if appropriate detection occurred.

In conclusion:

The DEIR and its appendices contained over 2000 pages, including various surveys, reports, and manufacturing information. For an individual partnering agency to review this material in 45 days and provide comment is not realistic, particularly when the document is not harmonized. The DEIR contains internal inconsistencies and factual errors, and verification of information presented is required. Not all relevant agencies likely have reviewed the DEIR because relevant information to provide them notice is missing.

If the lead agency was pressured or intimidated through threaten legal litigation by the Applicant to put a problematic DEIR into the State Clearing House and the Public Comment space, then it should come as no surprise to the Applicant when the lead agency must delay the process to acquire additional information, seek supplementation report or additional review period is required. The lead agency is required to take all public comments into consideration. It is likely that the Public comments demonstrate insufficiency of the environmental analysis, insufficiency of the risk assessment and insufficiency of the mitigation. These records may include advise my the lead agency to the applicant that the DEIR would be problematic. Thus, these records would prove useful and measures should be taken to retain them and properly safely archive them.

Finally, the County is on notice and should maintain all records and correspondence, including email regarding this project addressed to the County and most particularly the lead agency, including Mr. Greg Plucker (as Director of the lead agency) if he intends to retire, end employment or severe his relationship with the County of Colusa. These could be considered relevant documents

or information when considering or evaluating the adequacy, knowledge, and efforts of disclosure surrounding the Project and environmental review.

The current DEIR is inadequate, incomplete and demonstrates a bad faith effort at full disclosure and as such it should be voluntarily withdrawn from the process by the lead agency and/or advocating Applicant.

Cited and uncited references are available upon request.

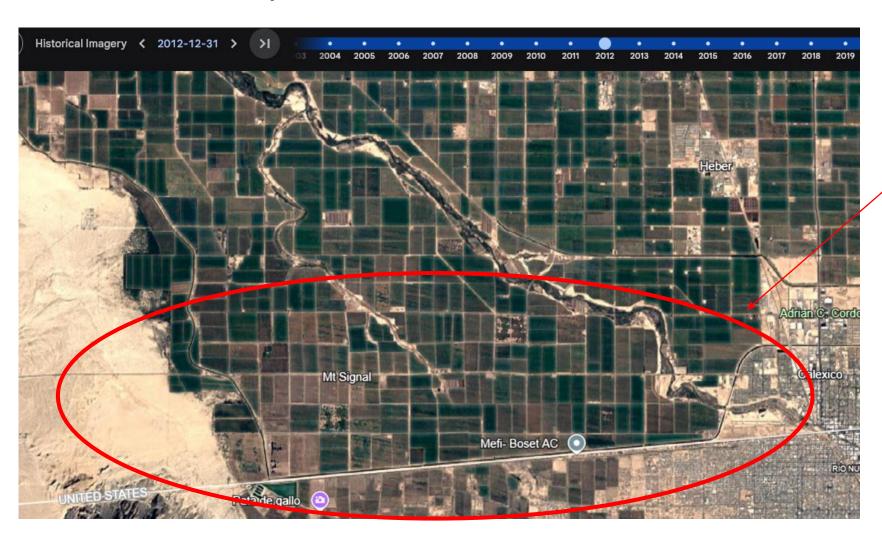
Appendix A_Marsh

DEIR needs to analyze relative to **zone of influence** and loss of farmlands as required by CEQA. By not including solar developments into the LESA analysis, it leads to incorrect analysis relative to farmland loss as well as foreseeable environmental impacts.

- Location of major lines & generation of gen-tie in. Energy generating facilities need or desire to be near the major conveyance lines.
- A high voltage line runs along the county foothills from north to south.
- This predicts where "large solar facility" will be preferred to be placed due to costs associated with transmission connections and cost to acquire open ground.
- These locations are also in a high fire danger and access challenged area.
- Not requiring underground lines set precedence for subsequent solar operations to just tie into overhead lines perpetuating the initial issues identified.
- Allowing BESS set precedence for subsequent solar operations.

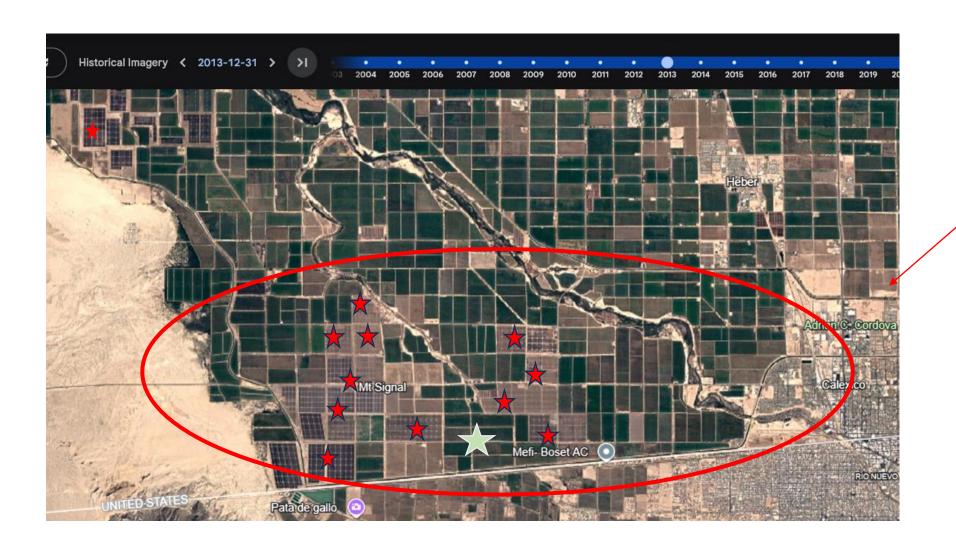
LESA model in DEIR fails to account for solar large scale developments zone of influence (ZOI).

Imperial County California: 2012, ZOI factor



Focus on changing landscape

Imperial County California: 2013



Focus on changing landscape & island of farmland;

= solar
installations, not
all solar is
marked, as too
numerous

Imperial County, California, 2020, ZOI



Focus on changing landscape: Island of

farmland; **GONE**

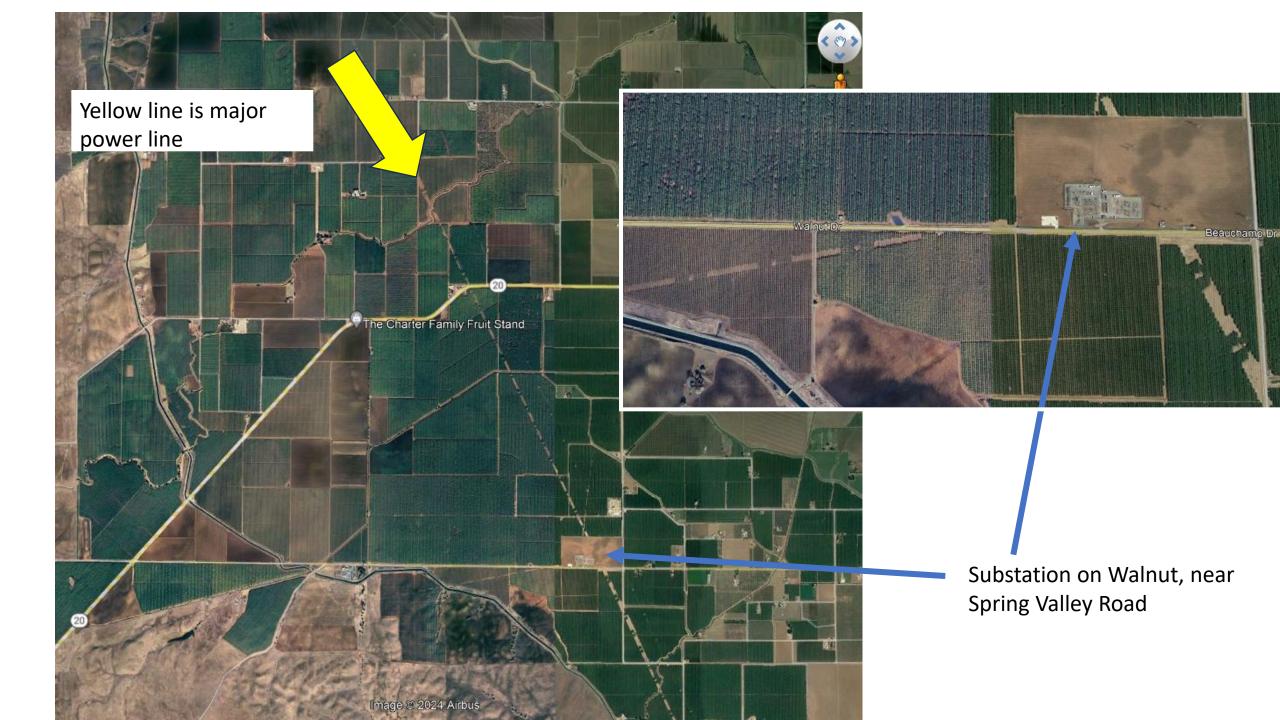
Impact of Solar to Mount Orab, OH, from 2017 to 2022; **LESA** model in DEIR does not account for solar & **ZOI**.





Last update (correction) to LESA model Appendices A and B (**dated 2011**) per Conservation.ca.gov;. Does the DEIR modeling account for changes to solar development; what and how do factor weight impact analysis, ZOI, and are they current and being applied correctly?

 Any Permit, County General plan or ordinance needs to anticipate & correctly model impacts of utility size (large scale) solar developments occurring, particularly if there is a main electrical conduit, substation and/or Gen-tie in nearby.



Red outlined areas may become solar lands and no longer farmland due to zone of influence by initial >600 ac solar facility and Gen-tie in; could also include south of displayed location below.





Substation on Walnut, near Spring Valley Road