DOCKETED	
Docket Number:	09-AFC-08C
Project Title:	Genesis Solar Energy Project
TN #:	266299
Document Title:	Notice of Receipt - Petition to Amend
Description:	Notice of Receipt - Petition to Amend for Installation of Hydrogen Removal System
Filer:	Anwar Ali
Organization:	California Energy Commission
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SUMMARY OF POST CERTIFICATION PETITION PETITION FOR POST CERTIFICATION CHANGE GENESIS SOLAR ENERGY PROJECT (09-AFC-08C)

On September 30, 2025, Genesis Solar LLC, the project owner, filed a Post-Certification Petition for Changes in Project Design, Operation or Performance and Amendments to the Commission Decision (Petition) (TN <u>266238</u>) with the California Energy Commission (CEC) for the Genesis Solar Energy Project (GSEP), pursuant to California Code of Regulations, title 20, section 1769.

The GSEP is a 2-unit, nominal 250-megawatt, concentrated solar electric generating facility located in an undeveloped area of Sonoran Desert at 11995 Wileys Well Road in Blythe, eastern Riverside County.

The project was certified by the CEC on September 29, 2010. Unit 1 began commercial operation on March 7, 2014, and Unit 2 on November 30, 2013.

SUMMARY OF PROPOSED CHANGES

Genesis Solar, LLC, is proposing installation of two Hydrogen Removal units (HyMATE); one in each unit 1 and 2 located in the Heat Transfer Fluid (HTF) area directly underneath the existing Expansion Vessel (EV).

The HyMATE system is mounted inside a high-cube container (20' L x 8' W x 9'6" H) that includes the following main components and accessories:

- 1. Membrane assemblies with palladium membrane for selective hydrogen removal and membrane heaters;
- 2. Gas blower for circulation of headspace gas;
- 3. Vacuum pumps for hydrogen removal;
- 4. Catalytic oxidizer for conversion of hydrogen to water;
- Steam traps/knock out pot and condensate return pump;
- 6. Programmable Logic Controller with software license and data acquisition;
- 7. System Instrumentation (pressure transmitters and indicators, temperature transmitters, and flow meter);
- 8. Complete signal and power accessories;
- 9. Pneumatic control valves, manual shutoff valves, and pressure safety valves;

- 10. Piping and accessories for circulating headspace gas, nitrogen and hydrogen supply, and for vacuum system;
- 11. Insulation and heat tracing;
- 12. Container for mounting all components; and
- 13. Data interface for remote control system.

The HyMATE system functions by extracting hydrogen from the headspace gas that is maintained above the liquid HTF in the EV and overflow vessels (OFVs). As hydrogen is removed from the headspace gas, dissolved hydrogen in the adjacent HTF transfers to the headspace gas, thereby removing hydrogen from HTF in the EV. Hydrogen in the circulating solar field HTF is removed as it passes through the EV.

For additional information, go to the <u>CEC's project webpage</u>, (https://www.energy.ca.gov/powerplant/solar-thermal/genesis-solar-energy-project). In the box labeled "Compliance Proceeding," click on "Docket Log" to access documents for this proceeding.

REVIEW PROCESS

This petition is reviewed pursuant to California Code of Regulations, title 20, section 1769. The review process includes an evaluation of the effect the change could have on the environment; the project's compliance with applicable laws, ordinances, regulations, or standards; and whether a change to, or deletion of any condition of certification adopted by the CEC in the final decision or subsequent amendments is required.

After staff has completed its independent review and analysis of this petition, the assessment will be published for public review and comment. Included in the staff analysis there will be a written notice of staff's intent either to process the proposed changes as a staff-approved project change or schedule it for consideration by the CEC at a regularly scheduled business meeting.

PUBLIC PARTICIPATION

This summary of the post certification petition is being mailed to the following persons on the CEC's mailing list for the project: interested agencies, members of the public, property owners who requested placement on the mailing list, and property owners within 500 feet of linear features (for example, pipeline) and within 1,000 feet of the facility. The notice is also being sent electronically using the GSEP electronic subscription service. The electronic subscription service is an automated CEC system by which information about this facility is emailed to parties who have subscribed. To subscribe, go to the CEC's project webpage,

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cited above, scroll down the right side of the project webpage to the box labeled "Subscribe," and provide the requested contact information.

Any person may comment on the petition or the staff analysis when publicly available. The CEC encourages use of its electronic commenting system. To use the CEC's electronic commenting feature, go to the CEC's project webpage, cited above, click on the "Submit e-Comment" link, and follow the instructions in the online form. Be sure to include the facility name in your comments.

Written comments, attachments, and associated contact information (for example, address, phone number, email address) become part of the viewable public record. This information may also become available via any internet search engine.

Written comments may also be mailed to:

California Energy Commission Docket Unit, MS-4 Docket No. 09-AFC-08C 715 P Street Sacramento, CA 95814

If you have questions about this notice, please contact Compliance Project Manager Anwar Ali, Compliance Monitoring and Enforcement Unit, Safety and Reliability Branch, at (916) 698-7498 or via e-mail at anwar.ali@energy.ca.gov.

For information on public participation, please contact the CEC's Office of Public Advisor, Energy Equity, and Tribal Affairs at (916) 957-7910 or email at publicadvisor@energy.ca.gov.

News media inquiries should be directed to the CEC's Media Office at (916) 654-4989, or by email to mediaoffice@energy.ca.gov.

Mail List: 7378

Subscription List: Genesis Solar Energy Project