

RIDGECREST SOLAR POWER PROJECT (09-AFC-9)
CEC STAFF DATA REQUEST NUMBERS 119 - 120

Technical Area: Hazardous Materials (AFC Section 5.5)

Response Date: January 25, 2010

DR-HAZ-119

Information Required:

If the applicant is considering an above-ground placement of these pipes and systems across Brown Road from the north solar field to the south power block, please provide documentation to support this alternative that includes at a minimum the following:

- a. A hazard and operability analysis (HAZOP).
- b. A risk assessment addressing the probability of an HTF pipe failure and the resultant consequences.
- c. A security Threat Assessment, Criticality Assessment, and site Vulnerability Assessment.

Response:

The applicant is not proposing placement of the HTF pipes above Brown Road from the RSPP south solar field to and from the power block, located north of Brown Road. (See Response to DR-HAZ-120 for a conceptual description of how the HTF lines will be routed underground.) Because the HTF pipes will be located under Brown Road, the remaining elements (a, b, and c) of this question are not applicable.

DR-HAZ-120

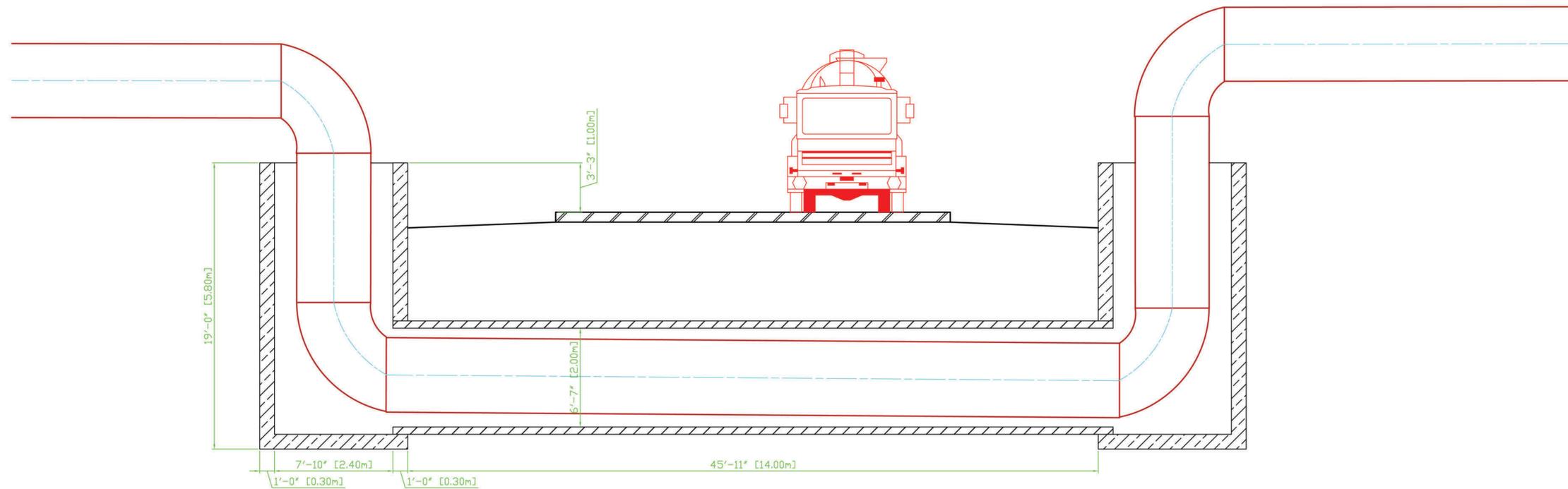
Information Required:

If the applicant is proposing to place these pipes and systems beneath Brown Road, please provide a description of how the undergrounding will be accomplished, that is, if it will be a filled-in trench or a tunnel large enough to service the pipes and systems by a person.

Response:

Within the north solar field and south solar field, the HTF lines will be aboveground. However, as the HTF supply and return lines approach Brown Road between the south solar field and the north solar field, they will be directed underground. It is expected that the seamless welded piping will have expansion loops aboveground on each side of Brown Road. Therefore, the piping under Brown Road can be placed in a structure such as a box culvert to hold the two insulated HTF lines. For the initial concept of the HTF pipe routing, see figure Titled "Pipe Crossing Brown Road" provided at the end of this section.

Similar to commercial oil and natural gas pipes, it is not expected that these lines under Brown Road will require maintenance as they will be properly designed and installed. In addition, the specific design of the underground crossing will be subject to review and approval by Kern County Roads Department.



Concrete pit Brown Road

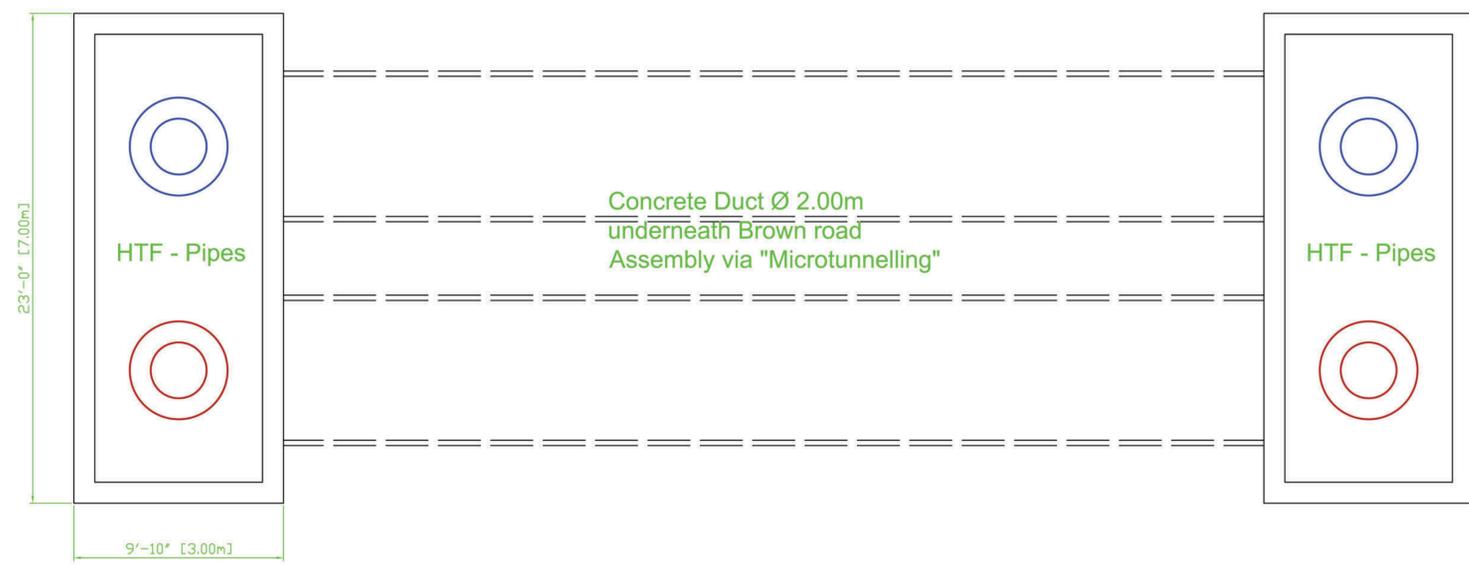


Figure DR-Haz-120		Main Contractor Solar Millennium LLC				Subcontractor FlagSol GmbH Agrippenauerstr 22 D-50678 Köln Tel.: +49 221 925 970 0 Fax: +49 221 925 970 99			
Project: RIDGECREST		Location: Ridgecrest, California		Document Title: Arrangement		Pipe Crossing Brown Rd			
Rev.	Description	Date	Drawn	Designed	Checked	Approved	Engineering	Customer Doc - ID:	
CAD File:	RC1_SOF_PIP_ARR_011_00	First Created:	2009-12-22	VG	VG	HB	HK	Sheet: 1 of 1	
Scale: 1:50		Original Size: DIN A1		ALL RIGHTS STRICTLY RESERVED REPRODUCTION OR ISSUE TO THIRD PARTIES IN ANY FORM WHATSOEVER IS NOT PERMITTED WITHOUT WRITTEN AUTHORITY FROM THE PROPRIETOR				Customer Doc - ID:	