



500 Capitol Mall, Suite 1600
Sacramento, California 95814
main 916.447.0700
fax 916.447.4781
www.stoel.com

February 3, 2012

MELISSA A. FOSTER
Direct (916) 319-4673
mafoster@stoel.com

VIA EMAIL AND US MAIL

Mr. Eric Solorio, Siting Project Manager
California Energy Commission
1516 Ninth Street
Sacramento, CA 95814

Hard Copy

DOCKET

11-AFC-1

DATE FEB 03 2012

RECD. FEB 03 2012

**Re: Pio Pico Energy Center Project (11-AFC-1)
PSD Application – 1-Hour Ozone Compliance Demonstration**

Dear Mr. Solorio:

On February 2, 2012, Applicant Pio Pico Energy Center LLC, via its consultant Sierra Research, Inc., submitted to Gerardo Rios of the U.S. Environmental Protection Agency, Region 9, additional information related to Pio Pico Energy Center Project's Application for a Prevention for Significant Determination Permit. In addition to the attached correspondence to Mr. Rios, Applicant submitted modeling files related to the 1-hour ozone compliance demonstration.

Applicant notes that the modeling files referred to above exceed the maximum limitations as set forth in the Commission's General Order (11-GEN ADMIN-01), dated November 30, 2011. To that end, Applicant will submit these materials directly to dockets and serve the same via mail to all parties.

Respectfully submitted,

A handwritten signature in black ink, appearing to read "Melissa A. Foster".

Melissa A. Foster

MAF:jmw

Enclosure

cc: See Proof of Service

BEFORE THE ENERGY RESOURCES CONSERVATION AND DEVELOPMENT
COMMISSION OF THE STATE OF CALIFORNIA
1516 NINTH STREET, SACRAMENTO, CA 95814
1-800-822-6228 – WWW.ENERGY.CA.GOV

APPLICATION FOR CERTIFICATION
FOR THE *PIO PICO ENERGY CENTER, LLC*

Docket No. 11-AFC-1
PROOF OF SERVICE
(Revised 12/16/11)

Pio Pico Energy Center, LLC
Letter to Eric Solorio dated February 3, 2012 re PSD Application –
1-Hour Ozone Compliance Demonstration

APPLICANT

Gary Chandler, President
Pio Pico Energy Center
P.O. Box 95592
South Jordan, UT 84095
grchandler@apexpowergroup.com

David Jenkins, Project Manager
Pio Pico Energy Center, LLC
1293 E. Jessup Way
Mooresville, IN 46158
djenkins@apexpowergroup.com

APPLICANT'S CONSULTANTS

Maggie Fitzgerald, Project Manager
URS Corporation
2020 East 1st Street, Suite 400
Santa Ana, CA 92705
maggie_fitzgerald@urscorp.com

COUNSEL FOR APPLICANT

John A. McKinsey
Melissa A. Foster
Stoel Rives, LLP
500 Capitol Mall, Suite 1600
Sacramento, CA 95814
jamckinsey@stoel.com
mafoster@stoel.com

INTERESTED AGENCIES

California ISO
e-mail service preferred
e-recipient@caiso.com

PETITIONERS

April Rose Sommer
Attorney for Rob Simpson
P.O. Box 6937
Moraga, CA 94570
e-mail service preferred
aprilsommerlaw@yahoo.com

ENERGY COMMISSION-
DECISIONMAKERS

CARLA PETERMAN
Commissioner and Presiding Member
cpeterma@energy.state.ca.us

KAREN DOUGLAS
Commissioner and Associate Member
e-mail service preferred
kldougla@energy.state.ca.us

Jim Bartridge
Adviser to Commissioner Peterman
jbartrid@energy.state.ca.us

Galen Lemei
Adviser to Commissioner Douglas
e-mail service preferred
glemei@energy.state.ca.us

Raoul Renaud
Hearing Officer
renaud@energy.state.ca.us

ENERGY COMMISSION STAFF

Eric Solorio
Siting Project Manager
esolorio@energy.state.ca.us

Kevin W. Bell
Staff Counsel
kwbell@energy.state.ca.us

Jennifer Jennings
Energy Commission Public Adviser
e-mail service preferred
publicadviser@energy.state.ca.us

DECLARATION OF SERVICE

I, Judith M. Warmuth, declare that on February 3, 2012:

I deposited copies of the aforementioned document and, if applicable, a disc containing the aforementioned document in the United States mail at 500 Capitol Mall, Suite 1600, Sacramento, California 95814, with first-class postage thereon fully prepaid and addressed to those identified on the Proof of Service list herein and consistent with the requirements of California Code of Regulations, Title 20, sections 1209, 1209.5, and 1210.

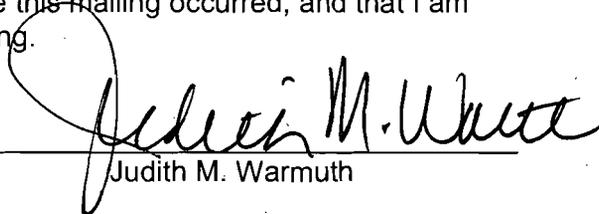
OR

I transmitted the document(s) herein via electronic mail only pursuant to California Energy Commission Standing Order re Proceedings and Confidentiality Applications dated November 30, 2011. All electronic copies were sent to all those identified on the Proof of Service list herein and consistent with the requirements of California Code of Regulations, Title 20, sections 1209, 1209.5, and 1210.

OR

On the date written above, I placed a copy of the attached document(s) in a sealed envelope, with delivery fees paid or provided for, and arranged for it/them to be delivered by messenger that same day to the office of the addressee, as identified on the Proof of Service list herein and consistent with the requirements of California Code of Regulations, Title 20, sections 1209, 1209.5, and 1210.

I declare under penalty of perjury under the laws of the State of California that the foregoing is true and correct, that I am employed in the county where this mailing occurred, and that I am over the age of 18 years and not a party to the proceeding.



Judith M. Warmuth

February 2, 2012

Mr. Gerardo Rios
Chief, Permits Office
U.S. EPA Region 9
75 Hawthorne Street
San Francisco, CA 94105



**sierra
research**

1801 J Street
Sacramento, CA 95811
Tel: (916) 444-6666
Fax: (916) 444-8373
Ann Arbor, MI
Tel: (734) 761-6666
Fax: (734) 761-6755

**Subject: Pio Pico Energy Center PSD Permit Application
1-Hour Ozone Compliance Demonstration**

Dear Mr. Rios:

As requested by EPA during the December 9, 2011 meeting between representatives of EPA and Pio Pico Energy Center, LLC (Applicant), we are herein submitting additional information on behalf of the Applicant. Specifically, EPA requested additional information from the Applicant, using background concentrations from the El Cajon and Otay Mesa monitoring stations.

It should be noted that the Applicant submitted the proposed modeling protocol for the Pio Pico Energy Center (Project) to EPA on December 1, 2010, with a request for review and comment, consistent with EPA's policy encouraging early consultation on modeling issues.¹ EPA did not respond to the Applicant's request. In the absence of any questions or concern expressed by EPA regarding the protocol, the Applicant proceeded with modeling and analysis consistent with the protocol, and has expended considerable time and effort in reliance on EPA's tacit approval.²

Background

The Applicant has previously provided air quality analyses demonstrating compliance with federal National Ambient Air Quality Standards (NAAQS) as part of its application for a PSD permit. The demonstration of compliance with the new 1-hour NO₂ standard

¹ Appendix W, Section 10.2.1: "[e]very effort should be made by the Regional Office to meet with all parties involved in a SIP revision or a PSD permit application prior to the start of any work on such a project. During this meeting, a protocol should be established between the preparing and reviewing parties to define the procedures to be followed, the data to be collected, the model to be used, and the analysis of the source and concentration data."

² It should also be noted that during the December 9 meeting EPA staff indicated that any additional concerns regarding modeling issues would be documented in a letter to Applicant on or before December 16, 2011. To date, no such letter has been received and several calls have been placed to EPA modeling staff to confirm that any remaining issues have been resolved. However, no calls have been returned. Applicant has therefore proceeded on the assumption that EPA's requests for additional information about modeling issues have been fully addressed.

was made using Chula Vista monitoring data to characterize regional background concentrations throughout the entire region. Several non-project sources were also explicitly modeled as nearby sources to determine the cumulative impact of the project and the existing background. During the December 9 meeting, EPA staff suggested that other monitoring sites might provide a more accurate characterization of background concentrations. Specifically, EPA suggested El Cajon (because it is located approximately the same distance from the ocean as the Project, whereas the Chula Vista station is much closer to the ocean) and the station located at the Otay Mesa border crossing.

While the Applicant disagrees with EPA's belief that these alternate stations offer any better characterization of regional background than does the Chula Vista station, the Applicant agreed to perform additional analysis to support its PSD application. Specifically, the Applicant agreed to perform a compliance demonstration using El Cajon data as the background concentration at receptors that are closer to El Cajon than to Chula Vista.³ The Applicant also agreed to use Otay Mesa data at receptors within 0.5 km of the Otay Mesa station. The additional analysis does not require additional dispersion modeling, and has been performed by replacing Chula Vista background NO₂ data at some receptors with El Cajon data or Otay Mesa data, as appropriate.

El Cajon Data

As noted above, the Applicant agreed to apply El Cajon data to all receptors closer to El Cajon than to Chula Vista. As a screening step, the Applicant applied the El Cajon data to all receptors. The result was that compliance was demonstrated at all receptors, and therefore compliance was demonstrated at the subset closest to El Cajon. The highest 5-year average of the 98th percentile cumulative impact (project plus nearby sources plus regional background) was 173 µg/m³. This can be compared to the value reported in the AFC (179 µg/m³) and the standard (188 µg/m³). Because no non-complying receptors were identified, it was unnecessary to limit the analysis to any particular subset. No further analysis was performed, and additional details are provided on the worksheet being provided with this letter.

Otay Mesa Data

The Otay Mesa station is located at the U.S.-Mexico border and is heavily impacted by border traffic. This includes a significant number of vehicles that are not equipped with California emission controls. The monitor shows significant spikes in concentrations during morning and evening rush hours. Because the monitor is directly impacted by nearby emissions, it cannot be considered representative of background concentrations. Nevertheless, EPA requested that Otay Mesa data be used to evaluate cumulative impacts at receptors within 0.5 km of the station.

³ Letter, Steve Hill to Gerardo Rios, *Pio Pico Energy Center PSD Permit Application Modeling Questions*, December 1, 2011.

The Otay Mesa station lies just outside the Project's NO₂ impact area. There is only one receptor within 0.5 km of the station that has a project impact above the NO₂ SIL, and there is only one hour in the 5-year evaluation period where the NO₂ impact from the project exceeds the SIL.

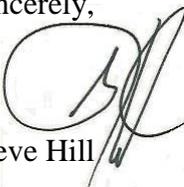
Synthetic Background Concentration Profile – Previous compliance demonstrations used a conservative synthetic background concentration profile. The profile used in previous demonstrations was constructed by determining, for each month in the 5-year evaluation period, the maximum concentration for each clock hour during a calendar month. These values were used to construct 60 daily concentration profiles, one for each calendar month in the five-year evaluation period.

For the present analysis, a different procedure was used. Following EPA guidance,⁴ multi-year averages of the 98th percentile of available background concentrations were calculated by season and hour-of-day. The guidance recommends using the 3rd highest value for each season and hour-of-day combination in the evaluation period. The multi-year average for each season is then calculated. This procedure results in four daily profiles, one for each season. The modeled project impact for each hour was then added to the background concentration in the appropriate seasonal profile. Any resulting value above the standard would be a potential violation.

Using this methodology, the maximum cumulative impact (Project plus nearby sources plus background) at the receptor was determined to be 164 µg/m³, which is below the NAAQS of 188 µg/m³. The cumulative impact during the one hour when the project's impact exceeded the SIL was 148 µg/m³. See the enclosed worksheet for additional detail.

If you have any questions regarding this information, please contact the Applicant's representative David Jenkins at (317) 431-1004, or Gary Rubenstein or me at (916) 444-6666.

Sincerely,



Steve Hill

cc: John McKinsey, Stoel Rives LLP
David Jenkins, Apex Power Group
Steve Moore, San Diego Air Pollution Control District

Enclosure: CD

⁴ Fox, Tyler, *Additional Clarification Regarding Application of Appendix W Modeling Guidance for the 1-hour NO₂ National Ambient Air Quality Standard* (March 1, 2011). p. 19