

May 5, 2005

Andrew Barnsdale, CPUC c/o Aspen Environmental Group 235 Montgomery Street, Suite 935 San Francisco, CA 94104

SUBJECT: APCD Comments on Draft EIR for the Proposed Diablo Canyon Power Plant Steam Generators Replacement Project

Dear Mr. Barnsdale:

The San Luis Obispo County Air Pollution Control District (APCD) appreciates the opportunity to provide comments on the draft environmental impact report (DEIR) for the Pacific Gas & Electric's (PG&E) proposed project. The proposal is to replace the steam generators for the two reactors at the Diablo Canyon Power Plant (project), the construction of 90,000 square feet of temporary facilities, and the construction of a holding facility for the old steam generators. The DEIR addresses several of the APCD comments that were included in our November 8, 2004 letter on the Notice of Preparation for the proposed project. The APCD looks forward to working with the County of San Luis Obispo, PG&E, and the California Public Utilities Commission (CPUC) on implementing the air quality mitigation measures necessary to bring the impacts of the proposed project to a level of insignificance.

CONSTRUCTION EMISSIONS

General Comments

In general, the Air Quality section is relatively understandable; however, the emission tables are somewhat unclear and clarification is needed. The DEIR has emission tables for each of the activities that will take place during the replacement steam generator (RSG) project. What is unclear is whether some or all of these activities will occur concurrently. As such, daily and quarterly total emission tables are needed to clearly identify all the emissions that will occur for all activities that occur simultaneously. Those emission tables need to be compared to the APCD's construction based CEQA Significance Thresholds and additional mitigation is necessary if those scenarios indicate threshold exceedences.

There is also an inconsistency in the DEIR's discussions about the maximum number of days that RSG transport activities shall occur. In paragraph two on Page D.2-7, it is stated that, "The duration of transport activity would be about two to four days for each of the two separate shipments." In paragraph four on that same page, it is stated that, "Quarterly emissions from all transport activities are calculated by assuming that no more than five days of transport trips would occur...." The inconsistency needs to be corrected and the emissions analysis needs to reflect the worst case scenario.

One final general comment before getting into specifics is that the daily emissions associated with the transport activities are estimated to be 571 lbs of NOx/day. This substantially exceeds

Proposed Diablo Canyon Power Plant Steam Generators Replacement Project DEIR Comments May 5, 2005 Page 4 of 7

excess NOx emissions over its lifetime. The APCD would prefer to have concurrent daily peak offsets, but the tug boat emissions are so large that there is likely no comparable local daily offset project available. Therefore, the APCD settles for the next best mitigation option, offsetting the short-duration 1.5 tons of total excess emissions over a much longer period of time.

The potentially significant emissions shown above are based on the use of newer, or lower-emitting, transport equipment as part of a Diesel Combustion Emission Control Plan and the use of double occupancy vehicles or a vanpool by all commuters in worker vehicles. If the transport equipment is poorly maintained or if out-of-date engines are used, then the off road equipment emissions from transport would be likely to temporarily exceed the 185 pound per day significance criteria for daily emissions. To manage the emissions from transport and all other construction-type activities, the Applicant has committed to implementing best management practices (BMPs) that are considered to be a part of the Proposed Project (PG&E, 2004c), including:

f. List of best management practices (BMP) on Page D.2-8:

The following practice needs to be removed since it is no longer considered a BMP:

i. Use of Caterpillar pre-chamber diesel engines (or equivalent) together with proper maintenance and operation to reduce emissions of NOx where feasible;

The following two idling limitations need to be added because they are new BMPs:

- ii. Drivers of any diesel powered vehicle shall not idle the diesel engine(s) for greater than five minutes at any location, except as noted in Subsection (d) of the California Airborne Toxic Control Measure to Limit Diesel-Fueled Commercial Motor Vehicle Idling. Signs shall be posted in appropriate areas to remind drivers of the five-minute idling limit;
- iii. Operators of any equipment with a diesel powered off-road engine(s) shall not idle these engines for greater than five minutes at any location. Signs shall be posted in appropriate areas to remind operators of the five-minute idling limit.

g. First paragraph on Page D.2-9:

Replace "CBACT" with "BACT" throughout this paragraph and any other instance in the EIR since it is the APCD's current acronym for best available control technology for construction equipment.

Proposed Diablo Canyon Power Plant Steam Generators Replacement Project DEIR Comments May 5, 2005 Page 5 of 7

h. Second paragraph on Page D.2-9:

The current cost of reducing one ton of excess NOx is \$13,600. This value is consistent with the California State Carl Moyer Memorial Air Quality Standards Attainment Program. The APCD has been active in implementing voluntary emission reduction projects for seven years and the increase in the mitigation value reflects the fact that over time the cost effectiveness of emission reductions from projects has increased as less effective projects are those that remain.

To simplify the off-site mitigation program, this paragraph needs to be updated as follows:

The SLOAPCD recommendation to address the residual impact of tugboat emissions would be accomplished by an Applicant-funded mitigation program that provides emission reductions (or offsets) at non-project sources in the Avila Beach and Port San Luis communities. The level of funding recommended by SLOAPCD would be is calculated based on the quantity of daily project NOx emissions exceeding the threshold (SLOAPCD, 2004). Preliminary information in Table D.2-7 indicates that approximately-1.544 tons of NOx in excess of the thresholds would be generated by the short-term transport activity (i.e., 386 pounds over the threshold for eight days total). According to 2004 cost data provided by SLOAPCD for this Proposed Project, t The current APCD cost of reducing one excess ton of NOx is currently around \$8,500 \$13,600. The precise amount of funding or specific offsetting approach needed Therefore, PG&E shall provide \$21,000 to mitigate the excess tugboat NOx emissions. would depend on the type of tugboats used and the specific operating schedule, and it should be determined through negotiation with the SLOAPCD. It would be appropriate to conduct this effort after a detailed offloading and transport plan is developed by PG&E. The reductions would be funded through grant programs managed by the SLOAPCD like the Carl Moyer Heavy Duty Engine Emission Reduction Program, which sponsors projects reducing NOx and PM10 from a wide range of sources such as marine vessels, agricultural engines, and stationary engines. These funds shall be used to fund a grant program managed by PG&E that is like the Carl Moyer Heavy-Duty Engine Emission Reduction Program, which sponsors projects reducing NOx and PM10 from a wide range of sources such as marine vessels, agricultural engines, and stationary engines. Should PG&E choose to allow the APCD to manage this program, PG&E shall provide APCD with the \$21,000 in mitigation funds plus a 15% (\$3,150) administration fee. This figure is based on the information contained in the DEIR. Should significant deviations from this estimate occur, the project proponent and the APCD shall meet and modify the mitigation value. By Pproviding approximately 1.544 tons of NOx emission reductions (Mitigation Measure A-1c) and over a period of time far greater than the short-duration impacts and by implementing Mitigation Measures A-1a and A-1b would fully mitigate. the APCD shall consider the NOx impacts caused by transport activities so that no impact to air quality standards would occur (Class II) to be mitigated (Class II - Significant but mitigated).

Proposed Diablo Canyon Power Plant Steam Generators Replacement Project DEIR Comments May 5, 2005 Page 6 of 7

i. Third and fourth paragraph on page D.2-9: To more accurately characterize the short-term odor and diesel PM impacts from this project the following changes need to be made:

TAC emissions and odors from transport activities could cause a significant impact according to the SLOAPCD primarily due to the proximity of the activities to homes in Avila Beach and Port San Luis where children or elderly may reside (Class II). The short term effects are of particular interest, given that transport activities would be unlikely to cause long term effects. Because of the short duration, the effects of diesel particulate matter and odors would not be significant.

The SLOAPCD recommends a detailed analysis of acrolein emissions from diesel powered equipment and ambient concentrations (SLOAPCD, 2004). In order to assess the acute health hazards of acrolein, detailed information would be needed about the specific tugboats and heavy duty on-land equipment that would be used and their operating schedules. It is appropriate to conduct this analysis after a detailed offloading and transport plan is developed. To ensure that surrounding receptors would not be exposed to substantial acrolein concentrations, Mitigation Measure A-1d is recommended. Depending upon the results of the health hazard analysis, public access in the immediate vicinity of offloading activities may need to be temporarily restricted to reduce this potential impact to a less than significant level. Since these activities are close to residences and public areas in Avila Beach and Port San Luis, Mitigation Measure A-1d also addresses diesel odor impacts during the transport activities.

- j. Last paragraph on Page D.2-9: Remove the word "yet" in the third line of this paragraph as its inclusion marginalizes the short-term emission impacts.
- k. Modify mitigation measure A-1c: To better define this mitigation measure and its timing, the following modifications are needed:

Offset tugboat NOx emissions with an off-site mitigation program. PG&E shall develop and implement or fund an off-site mitigation program that would will provide approximately 1.544 tons of NOx reductions from existing sources in the Avila Beach and Port San Luis communities. PG&E shall initiate this program such that the emission reduction project(s) is in place prior to the RSG transport activities. PG&E shall accomplish this either by developing and implementing a program of reductions (e.g., installing diesel engine or marine vessel emission control systems) or by providing mitigation funding to the SLOAPCD for emission-reducing projects identified by the SLOAPCD (e.g., through the Carl Moyer Program). If PG&E elects to implement its own emission reductions, then the approach shall be developed in cooperation with SLOAPCD and CPUC staff.

Proposed Diablo Canyon Power Plant Steam Generators Replacement Project DEIR Comments May 5, 2005
Page 7 of 7

- 1. Modify mitigation measure A-1d: Start the first sentence of this measure with, "At least 60 days prior to the start of transport activities." This addition ensures that there will be sufficient time to evaluate the potential acute hazard and define appropriate mitigation.
- 2. Section D.2.4 Environmental Impacts and Mitigation Measures for the Alternatives: Air quality mitigation measures for the proposed alternatives are adequately addressed with the necessary DEIR changes that are identified in this letter.
- 3. Section D.2.6 Mitigation Monitoring, Compliance, and Reporting Table: This table needs to be updated based on the necessary DEIR changes that are identified in this letter.

OPERATIONAL EMISSIONS

Although the air quality impacts of the proposed construction project will be addressed with the implementation of the mitigation measures defined in the final EIR (FEIR), the resulting extended operational impacts for the plant were not assessed in the EIR. Should the replacement steam generator project not move forward, Units 1 and 2 are estimated to be rendered inoperable in 2013 and 2014 respectively. The Units have valid licensing through 2021 and 2025 respectively. The proposed replacement steam generator project enables the Diablo Power Plant to continue operation under its current license for an additional 8 years for Unit 1 and 11 years for Unit 2. Without this project, the operational air quality impacts of the plant would be eliminated by 2014. The proposed project will therefore increase the total operational emissions of the Diablo Power Plant and as such need to be evaluated and mitigated in this EIR. One known impact from extended plant life is the emissions generated from vehicle trips supporting the operation. To address this impact, a mitigation measure similar to A-1a (Develop and implement a trip reduction plan) needs to be included throughout the duration of the current plant licensing.

Again, thank you for the opportunity to comment on this proposal. If you have any questions or comments, or if you would like to receive an electronic version of this letter, feel free to contact me at 781-5912.

Sincerely.

Andy Muiziger

Air Quality Specialist

AJM/sll

cc: James Caruso, San Luis Obispo County Department of Planning and Building

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