

STATE OF CALIFORNIA

Energy Resources Conservation
And Development Commission

In the Matter of:

Application for Certification
for the Carlsbad Energy Center Project

Docket No. 07-AFC-6

DOCKET

07-AFC-6

DATE _____

RECD. JUN 29 2011

**ENERGY COMMISSION STAFF'S RESPONSE AND COMMENTS
TO THE PRESIDING MEMBER'S PROPOSED DECISION ERRATA**

At the June 15, 2011 Business Meeting, the Commission continued final consideration of the Carlsbad Energy Center Project Presiding Member's Proposed Decision (PMPD) Errata until the June 30, 2011 Business Meeting. Upon further review of the PMPD Errata, staff recommends the following changes¹ for the Committee and Commissioners' consideration in the following technical areas:

Air Quality – Page 1

Cultural Resources – Page 3

AIR QUALITY

PMPD Errata Pages 8 and 9 - Air Quality Table Source Exhibits.

Comment: *The source exhibits for the PMPD Errata corrected Air Quality Tables 10 and 13 were inadvertently left as "Ex. TBD". We believe those source exhibits should be referenced as Ex. 226, as was noted in the text prior to the PMPD Errata corrected Air Quality Table 10. Please also note that the table numbering for these two tables is shown corrected below.*

¹ Where text is modified, underlining and red are used to indicate the restoration of PMPD text deleted in the Errata. To distinguish recommended text newly inserted by staff, double underlining and red are used. To distinguish Errata text newly deleted by staff, ~~double strikethrough and red~~ are used. Staff comments are in *italics*. Unchanged Errata text appears as it did when the Committee published its PMPD Errata on June 14, 2011, with changes to its PMPD shown in **bold underline**/~~strikeout~~ (**new text**/~~deleted text~~).

Air Quality Table ~~919~~ 11
CECP Normal Gas Turbine Operating Impacts – Both CTGs, ($\mu\text{g}/\text{m}^3$)

Pollutant	Averaging Period	Project Impact ($\mu\text{g}/\text{m}^3$)	Background ($\mu\text{g}/\text{m}^3$)	Total Impact ($\mu\text{g}/\text{m}^3$)	Limiting Standard ($\mu\text{g}/\text{m}^3$)	Type of Standard	Percent of Standard
NO ₂	1 hour Federal	--	--	85.7^a	100	NAAQS	86%
	1 hour State	13.3	152.6	165.9	339	CAAQS	49%
	Annual	0.1	22.8	22.9	57	CAAQS	40%
PM10	24 hour	1.2	57	58.2	50	CAAQS	117%
	Annual	0.1	24.2	24.3	20	CAAQS	122%
PM2.5	24 hour	1.2	37.7	38.9	35	NAAQS	111%
	Annual	0.1	12	12.1	12	CAAQS	101%
CO	1 hour	9.0	6,785	6,794	23,000	CAAQS	30%
	8 hour	1.9	4,011	4,013	10,000	CAAQS	40%
SO ₂ ^b	1 hour	4.3	94.3	98.6	655	CAAQS	15%
	3 hour	2.0	84.9	86.9	1,300	NAAQS	7%
	24 hour	0.4	23.6	24.0	105	CAAQS	23%
	Annual	0.0	10.7	10.7	80	NAAQS	13%

Sources: Ex. 222, p. 4.1-36, Ex. ~~226(FBD)~~

^a Represents the air quality standard basis of the three year average of the 98th percentile of maximum daily 1-hour values.

Air Quality Table ~~1143~~
Cumulative Impacts Modeling Results ($\mu\text{g}/\text{m}^3$)

Pollutant	Averaging Period	Project Impact ($\mu\text{g}/\text{m}^3$)	Background ($\mu\text{g}/\text{m}^3$) ^a	Total Impact ($\mu\text{g}/\text{m}^3$)	Limiting Standard ($\mu\text{g}/\text{m}^3$)	Type of Standard	Percent of Standard
NO ₂	1 hour Federal	--	--	88.3^d	100	NAAQS	88%
	1 hour State	133.5	152.6	286.1	339	CAAQS	84%
	annual ^b	0.3	22.8	23.1	57	CAAQS	41%
PM10	24 hour ^c	7.1	57	64.1	50	CAAQS	128%
	annual	0.1	24.2	24.3	20	CAAQS	122%
PM2.5	24 hour ^c	7.1	37.7	44.8	35	NAAQS	128%
	annual	0.1	12	12.1	12	CAAQS	101%
CO	1 hour	3,228	6,785	10,013	23,000	CAAQS	44%
	8 hour	676	4,011	4,687	10,000	CAAQS	47%
SO ₂	24 hour ^c	10.5	23.6	34.1	105	CAAQS	32%
	annual	0.1	10.7	10.8	80	NAAQS	14%

Sources: GECP Cumulative Assessment (SR 2008f). Ex. 222, p 4.1-50; Ex. ~~226(FBD)~~

^a Background values have been adjusted per staff recommended background concentrations.

^b Annual NO₂ impact has been multiplied by the U.S.EPA Ambient Ratio Method value of 0.75.

^c These 24-hour values are all based on worst-case existing Encina Boilers firing oil. When firing natural gas, the worst-case cumulative PM10/PM2.5 and SO₂ impacts are 1.4 and 0.4 $\mu\text{g}/\text{m}^3$, respectively.

^d **Represents the air quality standard basis of the three year average of the 98th percentile of maximum daily 1-hour values.**

PMPD Various Pages - PMPD Table Numbering.

Comment: *It has come to staff's attention, along with the redundant table that was deleted properly in the PMPD Errata; Air Quality Table 10 was skipped as a table number in the PMPD. Therefore, staff suggests that the table numbering, and table referencing for continuity, be revised as follows:*

<u>PMPD Number</u>	<u>Corrected Number</u>
Table 8	Table 7
Table 9	Table 8
Table 11	Table 9 (this one was renumbered as 10 in the PMPD errata)
Table 12	Table 10
Table 13	Table 11
Table 14	Table 12

PMPD Page 12 fourth full paragraph.

Comment: *Staff requests that a comment requested in staff's PMPD comment document be reconsidered. We suggest that an additional Finding of Fact after Finding 3, or numbered elsewhere in the findings of fact, on page 12 (i.e. the second "page 12" in the air quality section of the PMPD) reflecting the recent testimony on compliance with the new federal NO₂ standard, as follows:*

3.a. The evidence establishes that CECP will comply with the new federal short-term NO₂ standard.

CULTURAL RESOURCES

44. Cultural Resources Condition CUL-6, page 15, revise as follows:

CUL-6 The project owner shall ensure that the CRS, alternate CRS, or CRMs monitor full time all ground disturbance of native soils at the project site, along linear facilities and roads, and at parking and other ancillary areas, including wetlands mitigation areas, to ensure there are no impacts to undiscovered resources and to ensure that known resources are not impacted in an unanticipated manner. ~~The project owner shall ensure that the CRS, alternate CRS, or CRMs shall monitor ground disturbance, including tank removal and soil remediation, full time at the project site and linear facilities, and ground disturbance full time at laydown areas or other ancillary areas, to ensure there are no impacts to undiscovered resources and to ensure that known resources are not impacted in an unanticipated manner (discovery). Specifically, the CRS, alternate CRS, or CRMs shall monitor the ground disturbance, including tank removal and soil remediation that reaches to within 3 feet of native soil below the fill and all ground disturbances, including tank removal and soil remediation, in native soil. Whether or not archaeological monitoring is being conducted at project locations,~~ **Twice daily, in the morning and afternoon, the**

CRS or an archaeological monitor CRM shall examine locations where machinery is disturbing fill soil to determine whether native soils ~~might be disturbed~~ have been reached. If disturbance is ~~within 3 feet of~~ extends into native soils, full-time monitoring of native soils shall commence.

Comment: *The replacement of the original first sentence of this paragraph by the bold, underlined text in the Errata is recommended by cultural resources staff. The deletion of the second sentence is also recommended because having a CRM monitor three feet of fill soils above native soils was a precautionary strategy staff originally recommended in **CUL-6** to minimize disturbance of native soils during their exposure by imprecise machine excavation. But staff is willing to forego that and instead rely on the underlined, red text (indicated as deleted in the Errata) in the third sentence to provide for both the identification of native soils and the triggering of monitoring. This text needs to be restored because, without the determination by a qualified person that ground disturbance has reached native soils, the cultural resources conditions provide no other signal for the start of monitoring.*

Full-time archaeological monitoring for this project shall be the archaeological monitoring of all earth-moving activities on the project site and laydown areas, along linear facilities and roads, and at parking and other ancillary areas, including wetlands mitigation areas, ~~including tank removal and soil remediation,~~ for as long as the activities are ongoing. Full-time archaeological monitoring shall require at least one monitor per excavation area where machines **are actively disturbing** ~~may disturb~~ native soils. If an excavation area **or areas are** is too large for one monitor to effectively observe the soil removal, one or more additional monitors shall be retained to observe the area.

Comment: *In the first sentence of this paragraph, staff's inserted text repeats the text inserted in the Errata's first **CUL-6** paragraph and deletes the text deleted in the same paragraph, so that the area where monitoring applies is consistent between the two paragraphs. The restored text in the second sentence is needed to assure adequate monitoring coverage if excavation is simultaneously going on in non-adjacent areas. The bold and underlined (inserted) and strikethrough (deleted) text in the second and third Errata sentences is acceptable to staff.*

~~In the event that the CRS believes that the current level of monitoring is not appropriate in certain locations, a letter or e-mail detailing the justification for changing the level of monitoring shall be provided to the GPM for review and approval prior to any change in the level of monitoring.~~

Comment: *This insertion duplicates Errata paragraph 5, page 26, and should be deleted.*

The project owner shall obtain a Native American monitor to monitor ground disturbance in any areas ~~where Native American artifacts are discovered in native soils.~~ A Native American monitor shall be obtained to monitor ground disturbance, including tank removal and soil remediation, in areas where excavations may extend into native soils. Informational lists of concerned Native Americans and guidelines for monitoring shall be obtained from the Native American Heritage Commission. Preference in selecting a monitor shall be given

to Native Americans with traditional ties to the area that shall be monitored. If efforts to obtain the services of a qualified Native American monitor are unsuccessful, the project owner shall immediately inform the CPM. The CPM will either identify potential monitors or will allow ground disturbance, including tank removal and soil remediation, to proceed without a Native American monitor.

Comment: *The Errata rewording of the first sentence of this paragraph is recommended by staff, but in that same sentence the change in what triggers Native American monitoring is not recommended. Staff restored the text by which the extension of ground disturbance into native soils triggers Native American monitoring (as well as archaeological monitoring by a CRM). Staff believes a Native American monitor should be given the opportunity to monitor native soils because he/she may be able to recognize materials and remains of Native American origin and significance when a CRM may not. Additionally a Native American monitor may be able to provide tribal-specific information about newly discovered archaeological deposits and thus add value to our understanding of what may be found.*

Of equal concern to staff is that a specific Native American group expressed concern about potential impacts on prehistoric archaeological resources and consequently requested Native American monitoring on this project. The San Luis Rey Band of Mission Indians sent the Siting Division's Environmental Office Manager a letter, dated February 1, 2008 (Docket 07-AFC-6, tn: 45363), which stated the following:

"The Band is concerned about protecting the unique and irreplaceable cultural resources which will be affected by the project. The Tribe is also concerned about the appropriate and lawful treatment of Native American human remains and cultural and sacred items which are likely to be disturbed during the Project's development and ground disturbing activities...."

The need for mitigation measures for this Project are [sic] undisputed. The strongest protections must be afforded to protect these invaluable resources. The Band intends to use all appropriate and necessary procedures available to ensure that these resources are properly addressed via the CEQA and SB 18 processes.

To ensure a complete and undisputed understanding by all parties regarding the protection of these priceless resources, the Band respectfully requests that the following mitigation measures be added as mandatory for approving...the Project.

1. The Developer must execute a Pre-Excavation Agreement with the Band prior to any ground-disturbing activities on the Project site. The Agreement will, at a minimum, include the following provisions:
 - A. Require appropriate treatment of human remains and cultural items.
 - B. Require a good faith effort by the parties to agree on what is appropriate treatment and dignity when addressing human remains and cultural items.

- C. Require that any human remains or cultural items recovered during the grading process be returned to the Band, and not curated in a facility absent the express written consent of the Band.
- D. Require avoidance for all significant and sacred archaeological sites which may be found during development. Avoidance is the preferred method of preservation under CEQA for such resources.
- E. Require Native American monitors to be present during all ground-disturbing activities.
- F. Provide for the compensation of tribal monitors at the expense of the Developer.

2. Additionally, the Band requests that Native American monitors be added as a mandatory requirement, in addition to any archaeological monitor required by state law.”

*In originally recommending the level of Native American monitoring in **CUL-6** that staff is now asking to have restored, staff concluded that other recommended cultural resources conditions, and the Energy Commission’s obligation to ensure compliance with applicable state laws regarding Native American human remains found during construction, adequately addressed the San Luis Rey Band’s stated concerns, except for the request that the Energy Commission make mandatory the Native American monitoring of all ground disturbance at the expense of the applicant. Staff’s analysis of prior construction on the proposed plant site concluded that only CECP disturbance of previously undisturbed native soils had an appreciable potential to significantly impact intact archaeological deposits. Accordingly, in **CUL-6**, staff recommended monitoring of only native soils, when encountered, by both a CRM and a Native American.*

On page 2 of their PMPD comments, dated June 8, 2011, the applicant’s stated rationale for requiring Native American monitoring only with the discovery of Native American artifacts in native soils was a contention that a larger mandate requiring the constant presence of a Native American monitor in areas where excavations may extend into native soil, “..may create unnecessary restrictions during construction.” However, the applicant did not provide any detail as to the nature of Native American monitoring they would prefer, or what specific constructions restrictions could ensue. Accordingly, staff believes the concerns expressed by the San Luis Rey Band of Mission Indians -- and the special knowledge and value that a Native American monitor can bring to the identification of archaeological deposits -- outweighs apprehensions by the Applicant regarding construction restrictions.