

phone (209) 333-6370 fax (209) 333-6374 web www.ncpa.com



Notice - Call of Special PPC Meeting

Date:

October 24, 2016

To:

NCPA Lodi Energy Center Project Participant Committee

From:

Martin Caballero, Vice Chair

Subject:

October 25, 2016, LEC PPC Special Meeting Notice & Agenda

PLEASE TAKE NOTICE that pursuant to Government Code section 54956, a special meeting of the Northern California Power Agency Lodi Energy Center Project Participant Committee is hereby called for Tuesday, October 25, 2016 at 3:00 p.m. to discuss those matters listed in the attached Agenda. The meeting will be held at the Northern California Power Agency, 12745 N. Thornton Road, Lodi, California.

If you are unable to attend the meeting in person at the Lodi location and wish to attend via teleconference, in accordance with The Brown Act, you must attend at one of the locations listed on the Agenda and post the Agenda at that location no later than 24-hours prior to the meeting commencement date and time, in a location that is accessible to the public until the completion of the meeting.

Martin Caballero, Vice Chair



12745 N. Thornton Road Lodi, CA 95242

phone (209) 333-6370 fax (209) 333-6374 web www.ncpa.com

Agenda - Special Meeting

Date: October 24, 2016

Subject: October 25, 2016 Lodi Energy Center Project Participant Committee Meeting

Location: 12745 N. Thornton Road, Lodi, CA or via teleconference

Time: 3:00 P.M.

*** In compliance with the Brown Act, you may participate in person at the meeting location or via teleconference at one of the locations listed below. <u>In either case</u>, please: (1) post this notice at a publicly accessible location at the <u>participation</u> location at least 24-hours before the call begins, and (2) have a speaker phone available for any member of the public who may wish to attend at your location.

CITY OF AZUSA	CITY OF HEALDSBURG	NCPA
729 N. Azusa Avenue	401 Grove Street	12745 N. Thornton Road
Azusa, CA 91702	Healdsburg, CA	Lodi, CA
BAY AREA RAPID TRANSIT	CITY OF LODI	PLUMAS-SIERRA RURAL ELECTRIC
300 Lakeside Drive, 16 th Floor	1331 S. Ham Lane	COOP
Oakland, CA	Lodi, CA	73233 Highway 70
		Portola, CA
CITY OF BIGGS	CITY OF LOMPOC	POWER & WATER RESOURCES
465 "C" Street	100 Civic Center Plaza	POOLING AUTHORITY
Biggs, CA	Lompoc, CA	418 32 Street
		Glenwood Springs, CO 81601
CALIFORNIA DEPARTMENT OF	MODESTO IRRIGATION DISTRICT	SILICON VALLEY POWER/CITY OF
WATER RESOURCES	1231 Eleventh Street	SANTA CLARA
2135 Butano Drive, Room 125	Modesto, CA	1500 Warburton Avenue
Sacramento, CA		Santa Clara, CA
CITY OF GRIDLEY	NCPA	CITY OF UKIAH
685 Kentucky Street	651 Commerce Drive	300 Seminary Avenue
Gridley, CA	Roseville, CA	Ukiah, CA

1. Call Meeting to Order and Roll Call

PUBLIC FORUM

Any member of the public who desires to address the Lodi Energy Center Project Participant Committee on any item considered by the Lodi Energy Center Project Participant Committee at this meeting before or during the Lodi Energy Center Project Participant Committee's PPC consideration of that item shall so advise the Chair and shall thereupon be given an opportunity to do so. Any member of the public who desires to address the Lodi Energy Center Project Participant Committee on any item within the jurisdiction of the Lodi Energy Center Project Participant Committee and not listed on the Agenda may do so at this time.

BUSINESS ACTION ITEM

2. LEC Stack Stratification Correction Project; Approval of Project and Related Expenditure – Discussion of work necessary to correct the HRSG stratification problem and related issues. Staff seeking PPC approval of the proposed project and related expenditure of not-to-exceed \$430,000 and authorization for the NCPA General Manager to approve Purchase Orders to carry out this work, subject to Commission approval (Michael DeBortoli).

ADJOURNMENT

The Lodi Energy Center Project Participant Committee may take action on any of the items listed on this Agenda regardless of whether the matter appears on the Consent Calendar or is described as an action item, a report, or an information item. If this Agenda is supplemented by staff reports, they are available to the public upon written request. Pursuant to California Government Code Section 54957.5, the following is the location at which the public can view Agendas and other public writings: NCPA, 651 Commerce Drive, Roseville, CA or www.ncpa.com

Persons requiring accommodations in accordance with the Americans with Disabilities Act in order to attend or participant in this meeting are requested to contact the NCPA Secretary at 916.781.3636 in advance of the meeting to arrange for such accommodations.



Lodi Energy Center Project Participant Committee

Staff Report AGENDA ITEM NO.: 2

Date: October 24, 2016

Meeting Date: October 25, 2016

To: Lodi Energy Center Project Participant Committee

Subject: LEC Stack Stratification Correction Project

<u>Proposal</u>

Approve the LEC Stack Stratification Correction Project and related expenditure of not-to-exceed \$430,000 and authorize the NCPA General Manager to approve Purchase Orders to carry out this work, subject to Commission approval.

Background

LEC has been in operation since 2012. During this time frame, the project conducts annual emissions source testing as required by the EPA and the local air district. During the 2016 emissions source testing on October 20, 2016, it was discovered that emissions readings in one part of the stack varied greatly from emissions readings in another part of the stack. Because the plant's emissions monitor happened to be reading from an area that was located where the lowest emissions are found, the variation caused the plant's monitor to be determined to be out of compliance. As a result, the plant was forced offline.

In reviewing previous emissions reports, staff confirmed that the stack has always had some level of stratification, however, none as severe as what was detected during 2016 source testing. There was a substantial change between this year and the previous year. Noting this change, it was determined that further investigation inside the boiler (HRSG) was required to see if a cause could be determined.

Staff quickly mobilized to perform inspection of the boiler which resulted in findings that need to be corrected.

Finding #1: There were significant ammonia salt deposits on the tube bundles in the back end of the boiler. The deposits form during normal operation of these types of plants. They were present during the May 2016 outage when inspections were performed. At the time, they did not appear to be severe enough to warrant removal and it was determined to monitor them for a future outage. During the inspection in October 2016, there was an exponential increase in the deposits. These deposits block gas flow and are a contributing factor to stratification.

Finding #2: There was insulation accumulating on the high pressure tube bundles. The insulation is a problem that has required mitigation on several occasions since the transition duct floor first failed. The insulation clings to boiler tubes and due to the tightly packed spacing, is difficult to remove. During operation, it tends to work its way down the tubes and becomes accessible for removal. The last cleaning of insulation occurred during the May 2016 outage.

LEC Stack Stratification Correction Project October 24, 2016 Page 2

Finding #3: East/West component. The inspection revealed that deposits are tending to occur on the easternmost tube bundles. There are many reasons this can occur, but the only one that can be checked and adjusted is to verify the tuning of the injection grid.

Finding #4: Build-up around the ammonia injection distribution nozzles. This was not present in the inspection during the May 2016 outage. There is now some formation that needs to be removed. Any disruption of flow to the catalyst can be a contributing cause to stratification.

Selection Process

LEC is currently forced offline. Staff is performing urgent work to restore LEC to operational status. In addition, staff is only aware of one contractor, Precision Iceblast Corporation, that can perform the necessary HRSG work at the levels required. There are other contractors that can and have performed more basic cleaning work for LEC, but they are not equipped with the training and tools to reach between the tube bundles and remove deposits. In consideration of the urgency of the work, as well as the specialized capabilities of the contractor, the bulk of the work will be awarded to Precision Iceblast Corporation in accordance with the terms and conditions of NCPA's existing Multi-Task General Services Agreement with Precision Iceblast.

Fiscal Impact

Total cost of the project is not-to-exceed \$430,000. A purchase order was issued on October 21, 2016, for mobilization and investigation into the issues and those costs are included in the total cost of the project. This project was not included in the current fiscal year budget. However, funds will be drawn from the existing budgeted maintenance account [553-009-011-610-044-001] to fund this project. There is a total of \$3.2mm currently budget for fixed maintenance costs. Cost allocation will be based on generation entitlement share.

Environmental Analysis

This activity would not result in a direct or reasonably foreseeable indirect change in the physical environment and is therefore not a "project" for purposes of Section 21065 the California Environmental Quality Act. No environmental review is necessary.

Submitted by:

KEN SPEER, Assistant General Manager

meson for Ken Speer

Generation Services