Docket:	R. 12-03-014 (Track 4)
Exhibit No.:	
Commissioner:	Florio
ALJ:	Gamson

BEFORE THE PUBLIC UTILITIES COMMISSION

OF THE STATE OF CALIFORNIA

Order Instituting Rulemaking to Integrate and Refine Procurement Policies and Consider Long-Term Procurement Plans. Rulemaking 12-03-014 (filed March 22, 2012)

TRACK 4 PREPARED TESTIMONY OF STEPHEN O'KANE ON BEHALF OF AES SOUTHLAND

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September 30, 2012

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Q. Please state your name and current employment.

 My name is Stephen O'Kane. I am employed by The AES Corporation as Manager of Sustainability and Environmental and Regulatory Compliance. In this role one of my responsibilities is the permitting of new gas -fired generation at the Huntington Beach, Alami tos and Redondo Beach electric generation station locations, collectively referred to as AES Southland (AES SL).

Q. What is your professional and educational background?

A. My professional and educational background is set out in Exhibit A.

Q. What is the purpose of your testimony?

A. The purpose of my testimony is to explain how the AES SL projects intend to meet the requirements for emission offsets to enable the permitting and potential construction of nearly 3,400 megawatts (MW) of new gas-fired generation in the South Coast Air Basin. I will also demonstrate that the replacement of the existing utility steam boilers in the Los

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Angeles basin will have a minimal impact on the amount of emission offsets in the South Coast Air Quality Management District's (SCAQMD) internal bank.

I. SCAQMD RULE 1304 AND EMISSION OFFSET AVAILABILITY

Q. How do the AES SL projects intend to meet the requirements for emission offsets required for the new units?

A. Under the provisions of SCAQMD Rule 1304(a)(2), the SCAQMD bears the obligation to surrender and permanently retire the requisite emission offsets from their internal bank following the procedures and requirements of SCAQMD Rule 1315. The AES SL projects will meet the offset requirements of US EPA New Source Review and SCAQMD Rule 1303(b)(2) as Rule 1304 applies to the replacement of less efficient electric utility steam boilers with various other generation technologies, including combined cycle gas turbines, as long as the maximum electrical power rating of the new equipment, expressed in megawatts, will not increase the electrical generating capacity in the air basin on a per - utility basis. The replacement generation projects proposed by AES SL will replace existing once-through-cooled (OTC) electric utility steam boilers, which will qualify the AES SL projects under Rule 1304(a)(2).

Q. Is Rule 1304 a new rule?

A. No, Rule 1304 was adopted in 1979 and last amended in 2013 and has the express intent of ensuring older generation technology is retired and replaced with the most modern, cleanest generation technology. To that end, when this rule is employed it ensures that basin wide generation efficiency is improved and basin wide emissions are reduced.

Q. Has Rule 1304(a)(2) been successfully used to permit and construct other new power plants?

A. Yes. Most recently the NRG El Segundo plant, the Los Angeles Department of Water and Power Haynes Steam Plant and the Edison Mission Energy Walnut Creek Energy Park all used Rule 1304(a)(2) to successfully permit and bring to commercial operation their respective replacement generation projects.

Q. Who supplies the emission offsets when utilizing Rule 1304?

A. SCAQMD has the responsibility of surrendering and retiring emission offsets from their internal bank to satisfy US EPA New Source Review regulations and requirements. SCAQMD Rule 1315 establishes the procedures and requirements for tracking and accounting for emission offsets in its internal bank.

Q. How does the SCAQMD obtain emission offsets for its internal bank?

A. Emission offsets are deposited into the SCAQMD's internal bank when emission sources in the Los Angeles basin are shut down, not replaced and don't create a marketable emission reduction credit (ERC).

As an example, when the AES Alamitos and AES Huntington Beach Generating Stations retired and did not replace their respective peaker units, the associated emission offsets were deposited in the bank. Similarly, when AES Highgrove shut down, permanently retired and not replaced the associated emission offsets were also deposited in the SCAQMD internal bank.

- Q. Does the SCAQMD have enough emission offsets in its internal bank to support the potential future replacement of the existing utility steam boilers in the Los Angeles basin?
- A. Yes. According to the SCAQMD's Status Report on Regulation XIII New Source Review from September 6, 2013 and assuming that the AES Huntington Beach Energy Project represents a typical replacement generation project accessing the SCAQMD offset bank, if all Rule 1304 eligible generation (6,228 MW) was developed and no further deposits were made, the bank would be depleted by 20% of its Particulate Matter less than 10 microns in equivalent aerodynamic diameter (PM10) offsets, 4.5% of its Volatile Organic Compounds (VOC) offsets and 32% of its Sulfur Oxides (SOx) offsets. See the table below for a side by side comparison in ton/day.

	SCAQMD bank as of Sept 2013	Total eligible 1304 utilization = 6,228 MW
PM10	13.91 ton/day	2.84 ton/day
VOC	89.82 ton/day	4.01 ton/day
SOX	3.30 ton/day	1.06 ton/day

In addition to these totals, the SCAQMD internal offset bank is also projected to grow as new emission offsets are deposited annually.

In support of the above analysis, the following information is provided.

AES SL has a pending application for certification with the California Energy

Commission for the Huntington Beach Energy Project, a 939 MW combined cycle gas

turbine generating plant. The Huntington Beach Energy Project will require the following

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emission offsets from the SCAQMD internal bank:

PM10: 856 lb/day

VOC: 1,209 lb/day

SOx: 318.3 lb/day

The SCAQMD presented a conservative planning scenario in its Socio-economic Impact Analysis of proposed Rule 1304.1 on July 26, 2013. In this presentation it was assumed that all 6,228 MW of 1304(a)(2) eligible sources were replaced.

The above analysis clearly demonstrates that under the most conservative planning assumption where more than 6,200 MW of Rule 1304 eligible sources are approved and permitted in the same year, the SCAQMD's internal bank of offsets would not be debited to an extent that would inhibit electrical generators or other types of emission sources and facilities from accessing this bank and proceeding with planned projects.

Q. How does this relate to planning for future capacity needs in the Western LA Basin?

A. As explained above, Rule 1304 would allow for the redevelopment of older, less efficient electric generation facilities, as it was designed to do. New, more efficient generation can not only provide for Western LA Basin capacity needs, but would also allow older, less efficient units to be shut down, reducing emissions and other environmental impacts, and allowing for the retirement of OTC generation. Thus, Rule 1304 provides a pathway for the state to address capacity needs while at the same time meeting or advancing other environmental goals, including the retirement of OTC generation and the reduction of air emissions in the LA Basin.

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Q. Does this conclude your testimony?

A. Yes.

Exhibit A

Statement of Qualifications

STEPHEN M. O'KANE, Manager of Sustainability and Environmental and Regulatory Compliance, AES Southland

PROFESSIONAL EXPERIENCE:

THE AES CORPORATION

Manager of Sustainability and Environmental and Regulatory Compliance, AES Southland,

Long Beach California

Responsible for environmental management, corporate social responsibilities, public relations and regulatory compliance for the AES Southland generating facilities: AES Huntington Beach, AES Alamitos, AES Redondo Beach

Vice-President, Permitting and Regulatory Affairs, AES Southland Development, LLC

Responsible for preparing, submitting and managing permit and certification applications for the replacement generation projects at the AES Huntington Beach, AES Alamitos, AES Redondo Beach facilities.

LEVELTON CONSULTANTS LTD.

Manager, Environment and Energy Richmond, BC, Canada

Principal of the firm and Manager of a professional engineering and scientific consulting group in the fields of environmental and air quality impact assessment, air emissions management, environmental and health risk assessment, emission testing, emission inventory development and environmental permitting and approvals for the energy sector..

CH2M HILL INC.

Air Quality Practice Leader and Operations Leader Sacramento, California

As the Air Quality Practice Leader for the Western United States led the technical discipline for air quality modeling, impact assessment, permitting and inventory development and provided expert advice and consulting services as an air quality specialist. Led the Operations Group located in the Sacramento office with a primary focus on consulting services for power plant permitting and licensing in California and the Western US.

EDUCATION and LICENSES:

M.S., Atmospheric Science, University of British Columbia, Vancouver, Canada	1997
B. S., Atmospheric Science, University of British Columbia, Vancouver, Canada	1993