City and County of San Francisco

Office of the Controller – City Services Auditor

SAN FRANCISCO PUBLIC UTILITIES COMMISSION:

Audit of Department Class One Power Sales to Modesto and Turlock Irrigation Districts in California

February 17, 2015

OFFICE OF THE CONTROLLER
CITY SERVICES AUDITOR

The City Services Auditor Division (CSA) was created in the Office of the Controller through an amendment to the Charter of the City and County of San Francisco (City) that was approved by voters in November 2003. Charter Appendix F grants CSA broad authority to:

- Report on the level and effectiveness of San Francisco's public services and benchmark the City to other public agencies and jurisdictions.
- Conduct financial and performance audits of city departments, contractors, and functions to assess efficiency and effectiveness of processes and services.
- Operate a whistleblower hotline and Web site and investigate reports of waste, fraud, and abuse of city resources.
- Ensure the financial integrity and improve the overall performance and efficiency of city government.

CSA may conduct financial audits, attestation engagements, and performance audits. Financial audits address the financial integrity of both city departments and contractors and provide reasonable assurance about whether financial statements are presented fairly in all material aspects in conformity with generally accepted accounting principles. Attestation engagements examine, review, or perform procedures on a broad range of subjects such as internal controls; compliance with requirements of specified laws, regulations, rules, contracts, or grants; and the reliability of performance measures. Performance audits focus primarily on assessment of city services and processes, providing recommendations to improve department operations.

CSA conducts audits in accordance with the Government Auditing Standards published by the U.S. Government Accountability Office. These standards require:

- Independence of audit staff and the audit organization.
- Objectivity of the auditors performing the work.
- Competent staff, including continuing professional education.
- Quality control procedures to provide reasonable assurance of compliance with the auditing standards.

For questions regarding the report, please contact Director of City Audits Tonia Lediju at Tonia.Lediju@sfgov.org or 415-554-5393 or CSA at 415-554-7469.

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Purpose of the Audit

The Office of the Controller's City Services Auditor Division (CSA) audited the power sales of the San Francisco Public Utilities Commission (SFPUC) to the Modesto Irrigation District (MID) and Turlock Irrigation District (TID) to determine whether MID or TID buys excessive Class 1 power from SFPUC. The audit evaluated SFPUC's energy load offers, internal controls over district practices of requesting and accepting power sales, general compliance with energy sales agreements, district monitoring of municipal and pumping users, and the methodologies MID and TID use to provide SFPUC information such as load forecasts and historical usage and whether those practices comply with the energy sales agreements.

Highlights

Over the two fiscal years audited, each district's need for Class 1 energy exceeded the quantity provided by SFPUC. However, MID's monthly purchases of Class 1 energy exceeded its usage for 2 of the 24 months reviewed. Further, the districts should strengthen their controls over classifying and monitoring Class 1 customers.

Specifically, the audit found that:

- In the aggregate, the two districts purchased less Class 1 energy from SFPUC than they were entitled to. However, MID's monthly transactions show excess purchases of $214,943 in Class 1 energy, which the district sold to non-Class 1 customers.
- The districts should strengthen the monitoring controls over their Class 1 customers to ensure that they still qualify for the Class 1 energy rate.
- TID did not verify 3 percent of its Class 1 customers sampled by the audit, increasing the risk that SFPUC is selling more Class 1 energy, at cost, to TID than it is eligible for in accordance with the energy sales agreement.
- The methodologies for Class 1 load documents that the districts provided to SFPUC are adequately supported.
- SFPUC's energy sales agreements with the districts do not include specific record retention guidelines. The districts should be required to retain records for periods that should be specified in their agreements. Also, SFPUC should ensure that districts retain adequate supporting documents relating to Class 1 energy purchases.

Recommendations

The report includes 11 recommendations for SFPUC to improve the process by which it sells Class 1 power to the districts. Specifically, SFPUC should:

- Further develop Class 1 energy monitoring activities by improving oversight requirements in the districts' energy sales agreements.
- Adhere to the energy sales agreement requirement by annually comparing MID's Class 1 energy purchases to the metered Class 1 load to determine if an adjustment is required to the subsequent Class 1 energy offers to MID.
- Require the districts to develop procedures to periodically review and monitor Class 1 customers to ensure that they still qualify for the Class 1 energy rate.

Copies of the full report may be obtained at:
Office of the Controller ● City Hall, Room 316 ● 1 Dr. Carlton B. Goodlett Place ● San Francisco, CA 94102 ● 415.554.7500
or on the Internet at http://www.sfgov.org/controller

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CITY AND COUNTY OF SAN FRANCISCO
OFFICE OF THE CONTROLLER

Ben Rosenfield
Controller

Todd Rydstrom
Deputy Controller

February 17, 2015

San Francisco Public Utilities Commission
525 Golden Gate Avenue
San Francisco, CA 94102

Mr. Harlan Kelly, Jr.
General Manager
San Francisco Public Utilities Commission
525 Golden Gate Avenue
San Francisco, CA 94102

Dear Commission President and Members and Mr. Kelly:

The Office of the Controller's City Services Auditor Division (CSA) presents its audit report of the San Francisco Public Utilities Commission (SFPUC) power sales to the Modesto Irrigation District (MID) and Turlock Irrigation District (TID) to determine whether MID or TID buys excessive Class 1 power from SFPUC. The audit objectives were to:

- Evaluate the energy load offers, requesting and accepting practices and determine if those practices comply with the energy sales agreements.
- Determine if MID and TID appropriately identify and monitor their municipal and pumping users under Class 1.
- Assess the methodology of MID and TID for providing SFPUC information such as load forecasts and historical usage and determine whether those practices comply with the energy sales agreements.
- Assess the gap between Class 1 total usage and Class 1 energy provided by SFPUC to determine whether MID or TID buys excessive Class 1 power.

The audit concluded that, for fiscal years 2011-12 and 2012-13, the total Class 1 energy SFPUC sold to the districts did not exceed the amount of Class 1 energy used by the districts' Class 1 energy users. However, MID's total monthly purchases of Class 1 energy for SFPUC exceeded the usage of its Class 1 energy for 2 of 24 months reviewed, and MID sold the excess to non-Class 1 customers. Further, the districts should improve their controls over Class 1 customers to ensure that only eligible customers receive Class 1 energy and that this is in accordance with their energy sales agreements.

The report includes 11 recommendations for SFPUC to improve its energy sales agreements with the districts. SFPUC and the districts' responses to the report are attached as appendices. CSA will work with SFPUC to follow up on the status of the recommendations made in this report.

CSA appreciates the assistance and cooperation of SFPUC, MID, and TID staff during the audit. For questions about the report, please contact me at Tonia.Lediju@sfgov.org or 415-554-5393 or CSA at 415-554-7469.

Respectfully,



Tonia Lediju
Director of City Audits

cc: Board of Supervisors
Budget Analyst
Citizens Audit Review Board
City Attorney
Civil Grand Jury
Mayor
Public Library

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GLOSSARY OF TERMS

City	City and County of San Francisco
City Attorney	Office of the City Attorney, City and County of San Francisco
Class 1 Demand	According to the agreement between the City and County of San Francisco and the Modesto Irrigation District, the amount, expressed in kilowatts, determined (pursuant to Section 7.3.2 hereof) each month by dividing Modesto's Class 1 Load for the month as determined by the product of the monthly system load factor for Modesto's total system load for such month and the number of hours in such month. According to the agreement between the City and County of San Francisco and the Turlock Irrigation District, the rate of use of electrical energy, in kilowatts (kW) or megawatts (MW), during any determination period.
Class 1 Energy	According to the agreement between the City and County of San Francisco and the Modesto Irrigation District, the energy in kilowatt-hours from the Hetch Hetchy Project in excess of the city municipal load that must be sold to the districts at cost pursuant to Section 9(l) of the Raker Act. According to the agreement between the City and County of San Francisco and the Turlock Irrigation District, the amount of "Available Energy" to be used by either the Turlock or Modesto districts, as the case may be, for purposes that qualify for service pursuant to Section 9(l) of the Raker Act and that is to be sold to them pursuant to Section 9(l) of the Raker Act at a price that actually reimburses the City for developing, maintaining, and transmitting such energy to them.
Class 1 Load	According to the agreement between the City and County of San Francisco and the Modesto Irrigation District, the amount of energy during a period of determination, as metered by the Modesto Irrigation District, that would have qualified for Class 1 energy service pursuant to Section 9(l) of the Raker Act.
Controller	Office of the Controller, City and County of San Francisco
CSA	Office of the Controller's City Services Auditor Division
districts	Modesto Irrigation District and Turlock Irrigation District
GAO	United States Government Accountability Office
GIS	Geographic Information System
kW	Kilowatt (1,000 watts). A unit of measure for the amount of electricity needed to operate given equipment.
kWh	Kilowatt-hour, the most commonly used unit of measure for the amount of electricity consumed over time. It equals one kilowatt of electricity supplied for one hour.

MID	Modesto Irrigation District
MW	Megawatt (1,000 kilowatts).
MWh	Megawatt-hour, a unit of measure for the amount of electricity consumed over time. It equals one megawatt of electricity supplied for one hour.
PG&E	Pacific Gas and Electric Company
SFPUC	San Francisco Public Utilities Commission
TID	Turlock Irrigation District

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INTRODUCTION

Audit Authority

This audit was conducted under the authority of the Charter of the City and County of San Francisco (City), Section 3.105 and Appendix F, which requires that the Office of the Controller's City Services Auditor Division (CSA) conduct periodic, comprehensive financial and performance audits of city departments, services, and activities. CSA conducted this audit under that authority and pursuant to its annual audit plan.

Background

Overview of SFPUC

The San Francisco Public Utilities Commission (SFPUC) is a department of the City that provides retail drinking water and wastewater services to San Francisco, wholesale water to three Bay Area counties, and green hydroelectric and solar power to San Francisco's municipal departments.

SFPUC'S mission is to provide customers with high-quality, efficient and reliable water, power, and sewer services in a manner that includes environmental and community interests and that sustains the resources entrusted to its care.

Overview of the Energy Sales Agreement

SFPUC sells power to other parties including the Modesto Irrigation District (MID) and Turlock Irrigation District (TID) through energy sales agreements, as required by the Raker Act. Under this federal law, the City was allowed to construct, operate, and maintain facilities for conveying water for domestic purposes through public lands in Yosemite National Park. This was allowed to not only provide a source of water for San Francisco but the eventual production of electricity from that facility.

The Raker Act requires the City, upon request, to sell or supply energy to MID and TID for the use of any land owner to pump subsurface water for drainage or irrigation or for the actual municipal public purposes of the districts. The energy sold or supplied is to be from excess energy that the City has that is not required for pumping the City's water supply or actual municipal public purposes. The energy is to be sold "at cost," and,

according to the energy sales agreements, the districts agree that no power sold to them under their agreements shall be resold to any private person or corporation. However, the districts have the right and option to sell power for resale if their total monthly load exceeds the amount of available energy taken in such a month.

Overview of MID

MID, located in California's Central Valley, provides electricity and irrigation and treats surface water for drinking. MID is an independent, publicly owned utility. MID provides benefits that include community ownership, control by a locally elected board of directors, and business operations on a not-for-profit basis.

In December 2013 MID provided electrical service to more than 115,000 accounts in an electrical service area that covers 560 square miles. Further, MID provided irrigation services to more than 3,100 active accounts in an irrigation service area spanning 101,700 acres.

Overview of TID

Established in 1887, TID was the first publicly owned irrigation district in the state and is one of only four in California today that also provides electric retail energy directly to homes, farms, and businesses. TID operates under the provisions of the California Water Code as a special district.

Since 1923 TID has provided safe, affordable, and reliable electricity to a growing retail customer base that now exceeds 98,000 residential, farm, business, industrial, and municipal accounts in an electric service area that encompasses 662 square miles in portions of Stanislaus, Merced, Tuolumne, and Mariposa counties.

TID provides irrigation water to more than 5,800 growers in a 307 square mile service area that incorporates 149,500 acres of Central Valley farmland. TID has been delivering irrigation water to growers since completing its gravity-fed water conveyance system of canals and laterals in 1900.

Class 1 Energy

<u>Class 1 Energy Distribution</u>

Class 1 is a term defined in the districts' energy sales agreements with SFPUC to refer to the energy that SFPUC must sell to the districts at cost, in accordance

with the Raker Act. The Raker Act states that this energy is to be sold to the districts to be used for their pumping[1] and municipal public purposes.

Each district is required to notify SFPUC of its requested monthly Class 1 energy and to supply SFPUC with supporting work papers used in calculating the energy amount. SFPUC relies on this data to determine the amount of Class 1 energy to sell to each district.

Each day SFPUC uses its scheduling system to determine the scheduled amount of Class 1 energy to be offered to each district during each hour of the following day. According to SFPUC, the districts are provided with these nonbinding offers and have the opportunity to accept or reject the amount of energy offered daily. According to SFPUC, these daily offers must either be accepted or rejected for the full amount.

Objectives

The objectives of this audit were to:

1. Evaluate the load offer, requesting and accepting practices and determine if those practices comply with the energy sales agreements.

2. Determine if MID and TID appropriately identify and monitor their municipal and pumping users under Class 1.

3. Assess the methodology of MID and TID for providing SFPUC information such as load forecasts and historical usage and determine if those practices comply with the energy sales agreements.

4. Assess the gap between Class 1 total usage and Class 1 energy provided by SFPUC to determine if MID or TID buys excessive Class 1 power.

[1] Pumping is the process of pumping subsurface water for drainage or irrigation purposes.

Scope and Methodology

The audit included SFPUC's power sales to MID and TID from July 1, 2011, through June 30, 2013. To perform the audit, the audit team:

- Interviewed key SFPUC, MID, and TID staff and managers to gain an understanding of processes related to power sales.
- Reviewed key documents, including the Raker Act and agreements between SFPUC and MID and SFPUC and TID, related to SFPUC's power sales to the districts.
- Reviewed both districts' Class 1 customer lists.
- Randomly selected 30 Class 1 customers each from MID and TID and verified that they were within the districts' service area maps.
- Compared MID and TID's Class 1 usage to the amount of Class 1 energy provided by SFPUC.
- Assessed MID and TID's methodology for providing SFPUC with information on load forecasts and historical usage.

Statement of Auditing Standards

This performance audit was conducted in accordance with generally accepted government auditing standards. These standards require planning and performing the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for the findings and conclusions based on the audit objectives. CSA believes that the evidence obtained provides a reasonable basis for the findings and conclusions based on the audit objectives.

AUDIT RESULTS

Summary

In total, the districts used far more Class 1 energy than the amount provided by SFPUC during the two fiscal years reviewed. However, CSA reviewed the districts' Class 1 energy purchases by month and determined that for 2 of 24 months reviewed, MID purchased more Class 1 energy than its Class 1 customers consumed. Further, although the districts' methodologies for their Class 1 load estimates are adequately supported, their processes for determining and monitoring Class 1 customers should be strengthened to ensure that each district's Class 1 customers are accurately designated as eligible for Class 1 energy. Lastly, SFPUC's energy sales agreements with the districts lack specific record retention guidelines.

Finding 1

SFPUC provides less than half of the Class 1 energy used in the districts, but MID bought more Class 1 energy than it used in two months and sold the excess to non-Class 1 customers.

For fiscal years 2011-12 and 2012-13, the total amount of Class 1 energy sold to the districts by SFPUC did not exceed the amount of Class 1 energy used by the districts' Class 1 energy customers. However, MID's total monthly purchases of Class 1 energy from SFPUC exceeded the usage of its Class 1 customers for 2 of 24 months reviewed, amounting to $214,943 more Class 1 energy purchased and, therefore, sold to non-Class 1 customers of MID.

Finding 1.1

In total, the districts' Class 1 energy used exceeds the amount of Class 1 energy provided by SFPUC.

The districts are not allowed to resell Class 1 energy unless their total monthly load exceeds the amount of Class 1 energy they received in that month.

The energy sales agreements state that each district agrees that no power sold to it under the agreement shall be resold to any private person or corporation. However, each district shall have the right and option to sell power for resale if its total monthly load exceeds its amount of available energy taken in that month.

Analysis of the districts' Class 1 customer energy usage found that SFPUC supplies the districts with less than

half of the Class 1 energy they need to satisfy their annual Class 1 customer usage. As shown in Exhibit 1, Class 1 energy supplied by SFPUC only accounted for 136,561 of 337,878 megawatt-hour (MWh), or about 40 percent of MID's total Class 1 energy usage and, as shown in Exhibit 2, 144,220 of 339,856 MWh, or about 42 percent of TID's total Class 1 energy usage during the sampled period.

Exhibits 1 and 2 show the Class 1 customer usage (in megawatt-hours) for MID and TID, respectively.

EXHIBIT 1 **Modesto Irrigation District Class 1 Customer Usage and Energy Provided by SFPUC, Fiscal Years 2011-12 and 2012-13**

Fiscal Year	Class 1 Energy Provided by SFPUC (MWh)[a]	Class 1 Energy Provided by SFPUC ($)[b]	MID Class 1 Customer Usage (MWh)	Percent of Class 1 Energy Provided by SFPUC
2011-12	77,938	$3,063,743	168,551	46%
2012-13	58,623	2,568,274	169,327	35%
Total	**136,561**	**$5,632,017**	**337,878**	**40%**

[a] MWh = megawatt-hour
[b] Based on SFPUC's flat rate for fiscal years 2011-12 and 2012-13

Source: Class 1 customer usage provided by MID. Class 1 energy sold provided by SFPUC.

EXHIBIT 2 **Turlock Irrigation District Class 1 Customer Usage and Energy Provided by SFPUC, Fiscal Years 2011-12 and 2012-13**

Fiscal Year	Class 1 Energy Provided by SFPUC (MWh)[a]	Class 1 Energy Provided by SFPUC ($)[b]	TID Class 1 Customer Usage (MWh)	Percent of Class 1 Energy Provided by SFPUC
2011-12	76,586	$2,715,740	163,983	47%
2012-13	67,634	2,678,983	175,873	38%
Total	**144,220**	**$5,394,723**	**339,856**	**42%**

[a] MWh = megawatt-hour
[b] Based on SFPUC's flat rate for fiscal years 2011-12 and 2012-13

Source: Class 1 customer usage provided by TID. Class 1 energy sold provided by SFPUC.

During several months SFPUC supplied the districts with no Class 1 energy, which further reduced the percentage of Class 1 energy the districts purchased from SFPUC. In fiscal year 2011-12 SFPUC's Class 1 energy sales to the districts made up 47 percent of TID's total Class 1 usage for the year and 46 percent of MID's. In fiscal year 2012-13 SFPUC's Class 1 energy sales to the districts made up only 35 percent of MID's total Class 1 usage and 38 percent of TID's.

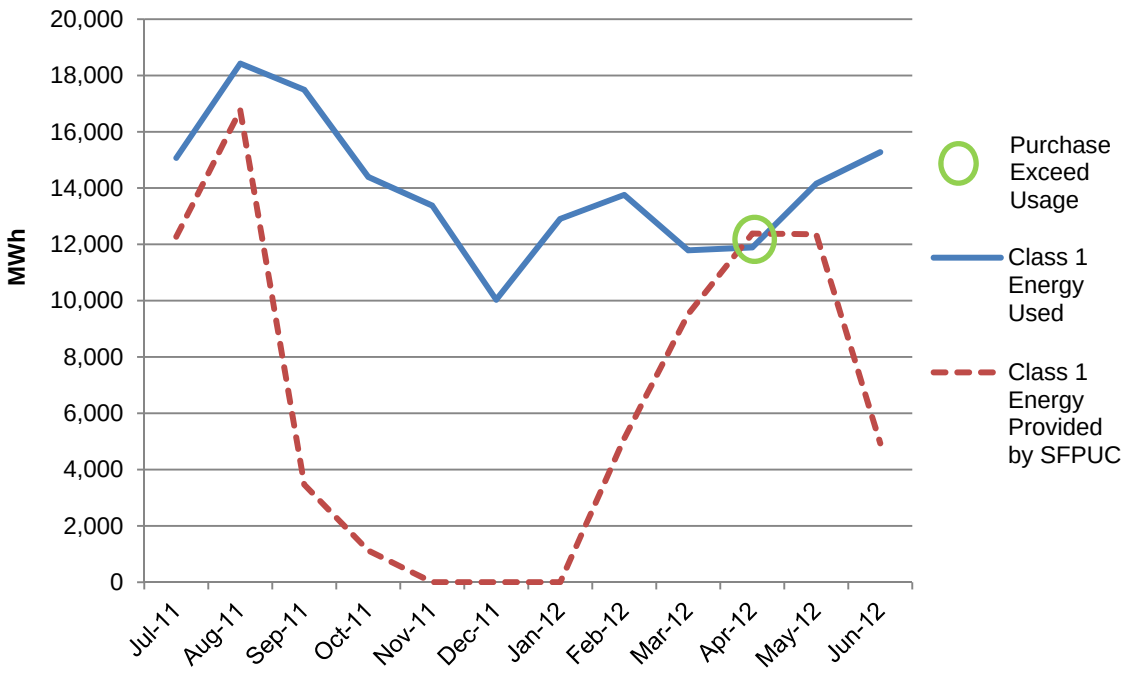
Finding 1.2

The monthly Class 1 purchases of MID sometimes exceed the usage of its Class 1 customers.

MID received more Class 1 energy than its Class 1 customers' load in 2 of the 24 months sampled.

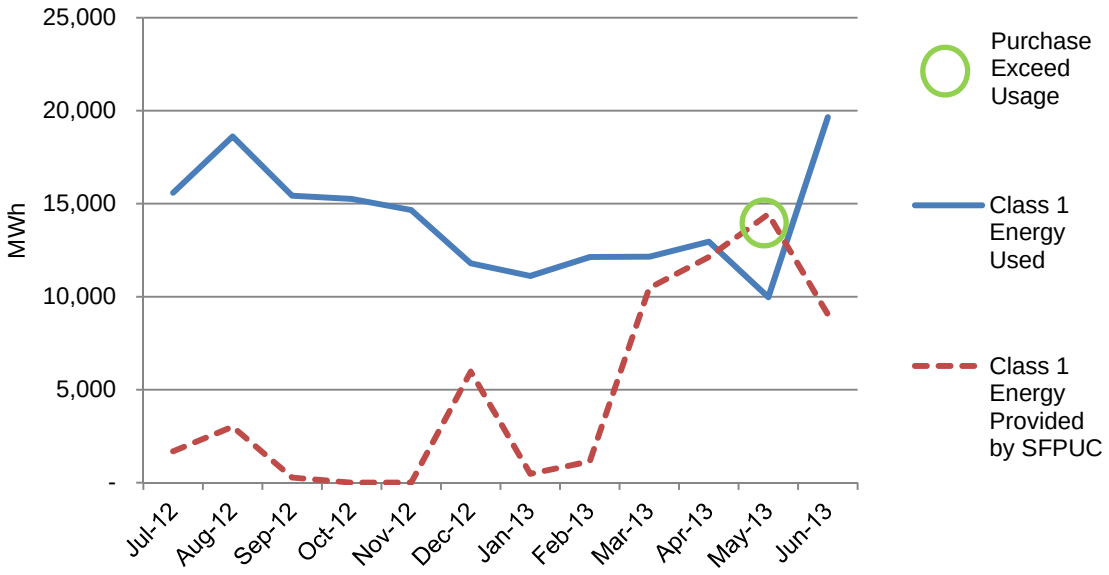
MID received from SFPUC 4,957 MWh more of Class 1 energy than its load for 2 of 24 months reviewed by the audit, resulting in an excessive purchase of energy totaling $214,943 for the two months. Exhibits 3 and 4 show MID's Class 1 customer usage and the amount of Class 1 energy received by the district in July 2011 through June 2013.

EXHIBIT 3 **Modesto Irrigation District's Class 1 Energy Usage Fiscal Year 2011-12**



Source: Auditor's analysis of data provided by SFPUC and Class 1 billed usage reports provided by the district.

EXHIBIT 4 **Modesto Irrigation District's Class 1 Energy Usage Fiscal Year 2012-13**



Source: Auditor's analysis of data provided by SFPUC and Class 1 billed usage reports provided by the district.

For 2 of the 24 months, MID received 26,819 MWh in Class 1 energy, but only used 21,862 MWh.Therefore, MID received 4,957 MWh (18 percent) more energy than needed, which amounted to nearly $215,000. Exhibit 5 shows the breakdown of MID's energy received and used, along with the purchase rate for the 2 months.

EXHIBIT 5 **Sample Months in Which Modesto Irrigation District Received Class 1 Energy in Excess of Its Class 1 Customers' Use**

Month	Excessive Class 1 (MWh)	Class 1 Rate ($/MWh)	Total Excessive Purchase Value
April 2012	494	$39.31	$19,419
May 2013	4,463	43.81	195,524
Total	**4,957**		**$214,943**

Source: Class 1 customer usage provided by MID. Class 1 energy sold provided by SFPUC.

The districts' energy sales agreements lack adequate details regarding how SFPUC should monitor energy sales to the districts.

CSA could not determine the amount that MID earned, if any, during the two months in question because MID does not separate energy purchased from SFPUC from other energy. Also, MID's energy rates vary by customer type and usage.[2] Therefore, CSA cannot determine the rates and amounts that MID charged for SFPUC's energy to non-Class 1 customers.

The districts' energy sales agreements are mostly silent on details regarding how SFPUC should best monitor its sales of energy to the districts. The lack of monitoring instructions makes it unclear if MID's energy purchases during the periods identified comply with its energy sales agreement because there are no criteria to hold MID accountable for any overpurchases of energy. Further, both SFPUC and MID failed to review MID's Class 1 load, despite the provision in MID's agreement that states that the:

> *Parties will annually compare Modesto's Estimated Class 1 Energy to the metered Class 1 Load to determine if an adjustment is required to the subsequent development of Modesto's Estimated Class 1 Energy.*

According to the Office of the City Attorney (City Attorney), this review should be performed so SFPUC may reduce the subsequent supply of Class 1 energy offered to the district if MID has received more Class 1 energy than its Class 1 load. If an annual review is performed and, if necessary, the amount of Class 1 energy offered is reduced in subsequent periods, then this allows for compliance with the energy sales agreement.

According to SFPUC, it relies on MID's calculation of its annual escalation/de-escalation factor, which adjusts the Class 1 energy request for the subsequent year. However, this procedure does not specifically compare MID's monthly purchased Class 1 energy to the metered Class 1 load, as required by the agreement.

According to MID, the energy it received from SFPUC could not be tracked and was used to fulfill the district's

[2] For example, pumping customers and residential customers are charged different rates.

load. MID also stated that it did not store excess energy or reimburse SFPUC for any excess amounts purchased. This indicates that the excess energy that MID received from SFPUC was sold to the district's retail customers, which is only allowable when MID's load exceeds that amount of Class 1 energy taken from SFPUC. This further indicates that the district did not comply with the energy sales agreement's prohibition of selling energy to private persons or corporations.

Recommendations

The San Francisco Public Utilities Commission should:

1. Further develop Class 1 energy monitoring activities by improving oversight requirements in the districts' new energy sales agreements.

2. Adhere to the energy sales agreement requirement by annually reconciling the Modesto Irrigation District's Class 1 energy purchases to the metered Class 1 load to determine whether an adjustment is required to the subsequent Class 1 energy offers to Modesto Irrigation District.

Finding 2

The districts should strengthen the monitoring controls over their Class 1 customers to ensure that they qualify for the Class 1 energy rate.

Neither district adequately monitors its Class 1 customers. Failure to actively monitor Class 1 customers could result in ineligible Class 1 customers being sold Class 1 energy.

Both districts maintain monthly lists that identify each customer's service locations that receive Class 1 energy. CSA calculated that, during the sampled months, MID and TID had 2,274 and 3,440 unique meters on their Class 1 reports, respectively.

According to MID, staff generates a monthly report of all new residential accounts and reviews it for accuracy to ensure that customers have been assigned the correct Class 1 code.[3] However, MID states that it did not periodically verify that its Class 1 customer list was

[3] MID assigns each Class 1 account a code that corresponds to a group of Class 1 customers that are eligible to receive Class 1 energy rates.

accurate. Once on the Class 1 list, a customer's meter location remains there without future review to ensure that the metered energy usage has not been changed to a non-Class 1 purpose.[4]

According to TID, it reviews its Class 1 customer list to ensure accuracy. However, TID stated that it does no ongoing analysis or verification of users designated as Class 1 to determine if the designation is accurate.

Therefore, the districts do not adequately monitor Class 1 customer locations after they have been classified as Class 1. The districts cannot verify that Class 1 customers remain eligible solely by reviewing their monthly Class 1 customer report.

Meters that are modified for non-Class 1 purposes and that are not reported could allow customers to receive Class 1 energy for activities that no longer qualify for Class 1 energy. According to TID, it is possible but illegal for customers to alter a pump, and procedures and city ordinances exist that customers have to follow to modify a pump. MID indicated that it relies on customers self-reporting by either contacting MID or the city for any changes that may occur to a Class 1 metered location.

TID automatically designates some meters as Class 1.

TID assumes that new customers who purchase land with existing Class 1 pumping locations will continue to use the pumps for Class 1 pumping uses. As a result, previously designated Class 1 pumps keep this designation without the districts confirming the new owner's intentions for the pumps. MID's customer service procedures regarding Class 1 codes state that the Class 1 code would usually remain with the service when a tenant change occurs. CSA asked MID for its criteria for determining whether a Class 1 code remains with the service after a tenant change, but a response had not been received as of this report's issuance date.

According to the U.S. Government Accountability Office (GAO) Standards for Internal Control in the Federal Government,[5] monitoring internal controls should

[4] According to MID, Class 1 customer accounts are not designated as Class 1, their individual meter locations are. Class 1 customers can have meters on their account that do not qualify for Class 1 energy.

[5] Standards for Internal Control in the Federal Government, U.S. Government Accountability Office, September 2014, http://www.gao.gov.

generally be designed to assure that ongoing monitoring occurs in the course of normal operations. Monitoring includes regular management and supervisory activities. Failure to adequately manage its Class 1 customer list could cause a district to purchase incorrect amounts of Class 1 energy from SFPUC and, in turn, not comply with its energy sales agreement by selling Class 1 energy to ineligible customers.

Recommendations

The San Francisco Public Utilities Commission should:

3. Require the districts to develop procedures to periodically review and monitor Class 1 customers to ensure that they still qualify for the Class 1 energy rate.

4. Require the districts to inquire with new land owners who have purchased land with existing Class 1 services and document the purpose of land use to ensure that the use qualifies as Class 1.

Finding 3

TID did not verify the service area location of one Class 1 customer.

TID did not follow its procedure for verifying whether a customer is within its service area, increasing the risk of providing Class 1 energy to ineligible customers.

One ineligible TID customer was identified as receiving Class 1 energy.

Of 30 Class 1 customers selected for an audit sample, one TID customer (3 percent) was classified as a Class 1 customer receiving power although the customer was located outside the irrigation service area. Therefore, TID was receiving energy, at cost, from SFPUC for a customer that did not qualify for Class 1 energy. CSA calculates that the ineligible customer used 102,277 kWh[6] of electricity during the two-year audit period, of which SFPUC provided 56,317 kWh (or a multiplied equivalent of 60.48 MWh[7]) for a total cost of $2,268.[8] According to TID, this customer account was opened in May 2007.

[6] A kilowatt-hour (kWh) is the most commonly used unit of measure telling for electricity consumed over time. It is one kilowatt of electricity supplied for one hour.

[7] According to the agreement between the City and TID, energy is multiplied by a factor of 1.074 to account for losses between the point of utilization and point of delivery.

[8] Based on SFPUC's flat rate for fiscal years 2011-12 and 2012-13.

TID agreed that the identified customer should not receive Class 1 power.

TID agreed that the identified customer should not receive Class 1 power. According to TID, its newly hired customer service representative decided to consider the customer as Class 1 and a there may have been errors in the second review of this because TID did not have its geographic information system (GIS) in place to accurately verify coordinates.

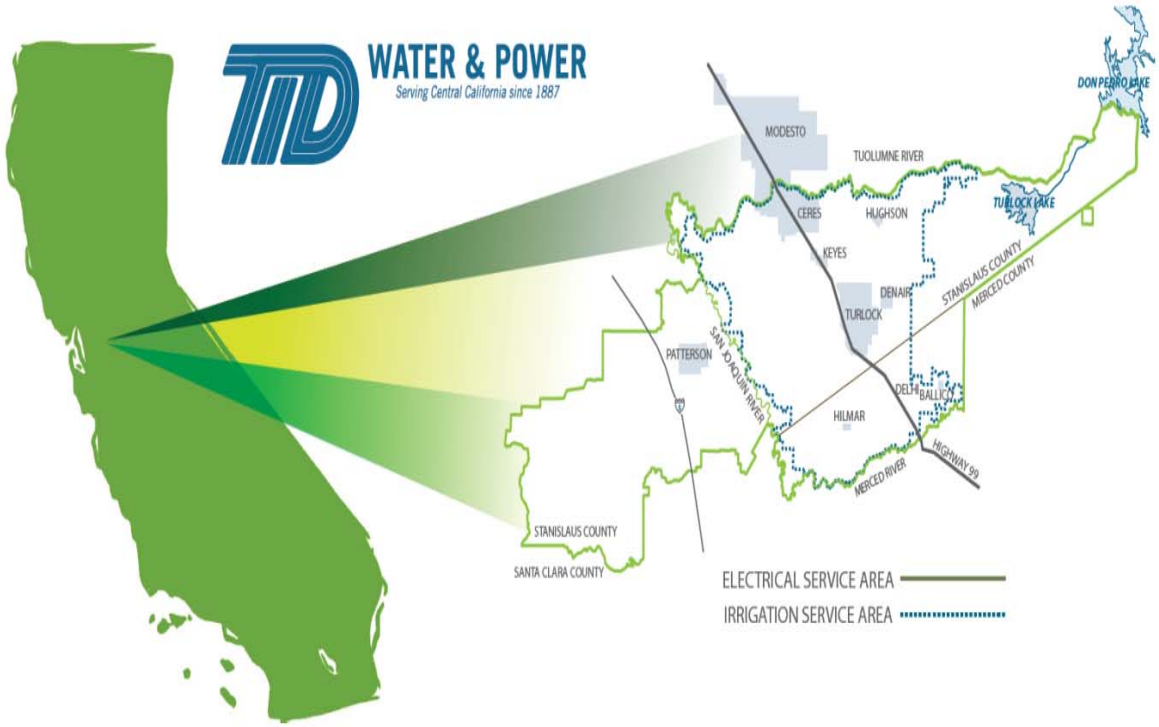
TID has a process for determining whether customers are within its service area.

According to TID, its process for determining whether a customer falls within its boundaries involves:

- Using the address provided to determine if a customer is within the boundaries.
- When the customer is near a boundary:
  - Most of the north and south boundaries are based on the Tuolumne River and Stanislaus River and, therefore, it is usually simple to determine the service area.
  - East and west boundaries are more complicated because there are fewer geologic markers.
- When questions arise about boundaries, TID relies first on its GIS, which includes latitude and longitude coordinates and mapping features.
- For some cases, TID must visit the site to determine which utility should serve a customer. This can occur when the boundary between electric service areas runs through a property.

Exhibit 6 shows TID's electrical and irrigation service areas.

EXHIBIT 6 **Turlock Irrigation District Service Areas**



Source: TID.

In response to the ineligible Class 1 customer discovered by the audit, TID stated that it would immediately:

- Review all customers currently qualifying for Class 1 under pumping loads to assure they are within district boundaries.
- Remove any customer outside district boundaries and send information to SFPUC so that a true-up of unqualified kilowatt-hours may be performed according to the contract.
- Annually review all Class 1 pumping customer locations to certify their inclusion within district boundaries.

Customers outside TID's boundaries do not qualify as Class 1 customers.

The energy sales agreement includes guidance on where customers must be located to be eligible for Class 1 energy, as follows:

> *That the said grantee[9] shall, upon request, sell or supply to said irrigation districts, and also to the municipalities within either or both said irrigation districts, for the use of any land owner or owners therein for pumping subsurface water for drainage or irrigation, or for the actual municipal public purposes of said municipalities (which purposes shall not include sale to private persons or corporations) any excess of electrical energy which may be generated, and which may be so beneficially used by said irrigation districts or municipalities…*

TID's electrical and irrigation service area map illustrates boundaries for customers who are eligible for receiving electrical, irrigation service, or both services. TID stated that all of its Class 1 customers must be within its irrigation service area to be classified as Class 1 power customers, regardless of receiving electric or irrigation service. Therefore, customers outside TID's irrigation service area do not qualify as Class 1 customers and should be excluded from TID's Class 1 list for the purposes of purchasing energy from SFPUC at cost.

Recommendations

The San Francisco Public Utilities Commission should:

5. Follow up with the Turlock Irrigation District to ensure that the ineligible customer is removed from the Class 1 customer list and to determine whether to pursue the recovery of the cost of the energy provided to the ineligible customer.

6. Request the Turlock Irrigation District to review all of its Class 1 customers from the commencement of the agreement (April 2005) to ensure that they are within the district boundaries and report to the San Francisco Public Utilities Commission any Class 1 customers identified to be outside the district boundaries and the associated costs of the Class 1 energy provided to those ineligible Class 1 customers.

7. Require the Turlock Irrigation District to certify

[9] City and County of San Francisco

locations when determining the eligibility of new Class 1 customers to ensure accuracy.

Finding 4

CSA was unable to precisely determine whether all sampled MID Class 1 customers are within the district's boundary.

Based on CSA's interview with MID, it has a process for determining whether customers are within its boundaries. However, MID did not provide the GIS locations of the 30 selected Class 1 customers, so CSA could not precisely determine whether they were within the district's boundary. Further, MID provided CSA with a district boundary map without additional information, such as GIS coordinates, so the map was insufficient to determine district boundaries. Last, of the 30 Class 1 customers sampled, one MID customer (3 percent) is located outside the district based on the address provided.

MID has a process for determining whether customers are in its service area.

According to MID, its procedures for determining that a Class 1 applicant is within its district boundaries involves:

- MID's engineering personnel using a GIS to verify whether the location is within the boundaries.
- If a customer is near a boundary, MID's surveyor goes to the location, using its GIS coordinates, to determine whether it is within the boundary. If the location is confirmed to be within the boundary, the customer service unit establishes the account and power service is turned on. A MID supervisor reviews all surveyor decisions that customers are within boundaries.
- According to MID, if the location is not within the district, MID does not provide power service and the customer's power is either provided by another entity such as TID or Pacific Gas and Electric Company (PG&E).

CSA is unable to precisely determine MID's Class 1

Although MID provided addresses for the sampled Class 1 customers and the audit was able to identify

boundary areas.

customers within MID's boundaries, the audit was unable to precisely determine whether MID's Class 1 customers located near its boundaries were within the district's boundaries due to a lack of GIS locations for Class 1 customers in MID's records and MID's service boundaries. MID stated that GIS coordinates are not stored in its system. For example, latitude and longitude coordinates are not stored in its customer data system. Therefore, GIS coordinates are not easily accessible, and MID stated that it does not have the capacity to look up customers' GPS coordinates.

Of the 30 Class 1 customers sampled for the audit, the address of one customer (3 percent) appeared to be located outside the area in which only MID provides electrical services. MID divides its district into a traditional electric service area, in which only MID provides electrical service, and an expansion service area, in which electrical service is provided by MID and PG&E. MID confirmed that Class 1 customers must be in the area in which only MID provides electrical services.

The service point in question is for a street light, served by the City of Riverbank, with a start date of April 26, 2006. Riverbank is a municipality that is in MID's expansion service area. MID stated that its policy has been not to include customers in the expansion area as Class 1 customers. CSA tested the location of Class 1 customers based on the district's traditional service area.

However, according to SFPUC, there is no definition of Class 1 customers related to service areas in the MID's contract. SFPUC believes that qualified Class 1 customers can be located within MID's expansion territory. Nevertheless, MID stated that it will remove this customer from the Class 1 list.

Also, based on a review of MID's Class 1 customer list for June 2013, CSA counted 63 customers with City of Riverbank service points listed. According to MID, aside from the one customer identified by CSA, to MID's knowledge, there are no other Class 1 customers in its expansion territory.

CSA calculated that the customer identified in the expansion area used 1,530 kWh of energy during the two-year audit period, of which SFPUC provided 579 kWh (or a multiplied equivalent of 0.61 MWh[10]) for a total cost of $25.[11]

MID has three service areas and confirmed that all its Class 1 customers are within the area in which only MID provides electrical services. However, some Class 1 customers are outside the irrigation service boundary.

Exhibit 7 shows MID's service area. The map includes three boundary/service areas:

- Irrigation service boundary
- Area in which only MID provides electric service (traditional area)
- Area in which both MID and PG&E provide electric service (expansion area)

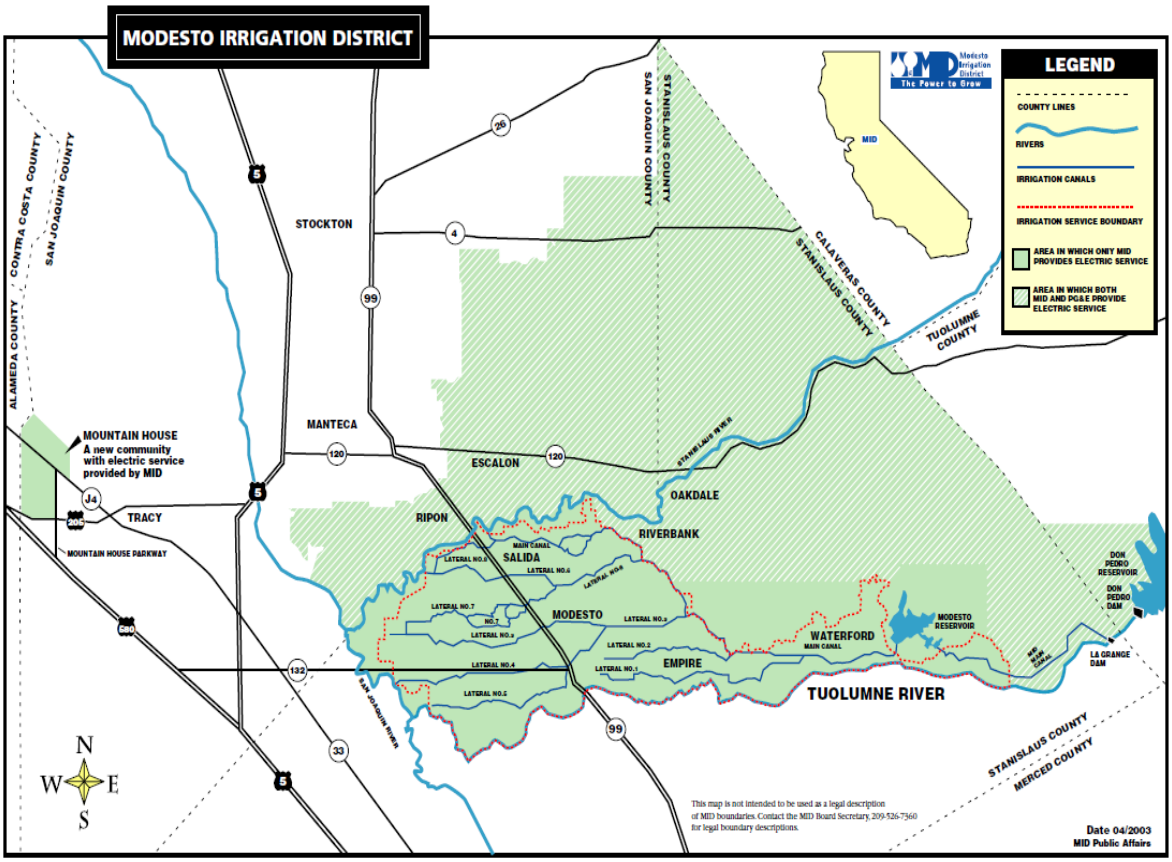
According to MID, Class 1 customers must be in the solid green boundary of MID's map, indicating the "area in which only MID provides electrical services."

However, according to the City Attorney, Class 1 customers should be within the irrigation service boundary, which is smaller than the area in which only MID provides electrical services. The audit's test of a sample of 30 Class 1 customers found that 2 (7 percent) have addresses in Waterford and appear to be outside the allowable service area (irrigation service boundary).

[10] According to the agreement between the City and MID, energy is multiplied by a factor of 1.054 at the point of utilization to account for losses between the point of utilization and point of delivery.

[11] Based on SFPUC's flat rate (per MWh) for fiscal years 2011-12 and 2012-13.

EXHIBIT 7 **Modesto Irrigation District Service Area***



*Note: MID's service area map includes boundaries for electrical and irrigation services.

Source: MID.

According to MID's procedure for classifying and reporting Class 1 power usage, three primary uses qualify MID for Class 1 power:

- Pumping of subsurface water
- Uses by the Modesto Irrigation District
- Uses by municipalities

Further, according to MID's Class 1 Power Eligible Services and Code Assignment, the City of Riverbank,[12] qualifies for Class 1 because the city limits include land that is within MID's irrigation district boundaries. However, as stated by MID, its policy excludes Class 1 services in the expansion territory (i.e., area in which both MID and PG&E provide electric service).

[12] Class 1 Power Eligible Services and Code Assignment: Code 23, City of Riverbank

Recommendations

The San Francisco Public Utilities Commission should:

8. Request the Office of the City Attorney to confirm its interpretation of the energy sales agreements regarding boundaries for classifying Class 1 customers and, based on the interpretation, have the Modesto Irrigation District and Turlock Irrigation District clearly define service boundaries for Class 1 customers.

9. If it is determined by the Office of the City Attorney that an identified customer does not qualify for Class 1 energy, then require the Modesto Irrigation District to remove that customer from the Class 1 list and to agree to an approach for recovering the cost of the energy provided to the ineligible customer.

10. Request the Modesto Irrigation District to review all of its Class 1 customers to ensure that they are within the allowable district boundaries and to agree to an approach for recovering the cost of the energy provided to any identified ineligible customers.

Finding 5

The districts' methodologies for their Class 1 load estimates are adequately supported.

MID and TID's methodologies for Class 1 load estimates are adequate.

Based on a review of a sample of Class 1 load estimate documents that the districts provide to SFPUC, the audit determined that the districts' methodologies for calculating such documents are adequate.

Each year, each district is required to provide SFPUC with work papers to support its calculations according to its respective energy sales agreement. The audit determined that the districts' Class 1 energy requests were especially important because, according to SFPUC personnel, SFPUC uses this information to determine the amount of Class 1 energy that is offered to the districts.

According to its energy sales agreement, when TID makes a monthly request, it must provide SFPUC with its requested monthly Class 1 energy based on the same months of prior years, estimate any increases in

qualifying loads,[13] and use prudent utility practice.

According to TID, it used a simple average, based on the same months from the prior three years, to determine its requested Class 1 energy for the year, and the audit verified that this is true.

According to MID's energy sales agreement, each year MID is required to provide SFPUC with its estimated monthly Class 1 energy, which shall not exceed the product of its metered Class 1 load for the previous year and its Class 1 energy escalation factor.[14] MID provided supporting documentation that the audit used to determine that MID correctly calculated its energy escalation factor and estimated monthly Class 1 energy.

The districts' ability to provide SFPUC with accurate documentation is essential. It allows the districts to verify that they comply with legal requirements in the energy sales agreements and allows SFPUC to offer the districts the correct amount of Class 1 energy.

Finding 6 — **SFPUC's energy sales agreements with the districts lack specific record retention guidelines.**

The energy sales agreements lack record retention guidelines.

SFPUC's energy sales agreements with MID and TID do not specify document retention periods. This absence could lead to the districts or SFPUC not maintaining necessary documents. During the audit, CSA requested Class 1 customer service documents for a sample of Class 1 customers from TID. CSA planned to review these documents as part of the audit survey phase. However, TID initially stated that it had paperwork for its customers from the past two years, but paperwork older than that was sporadic. TID later clarified that it was certain that it had meter cards (customer service documents) from the last two years and had previously disposed of meter cards after 10 years because of its record retention policy, but was now keeping these documents indefinitely. Further, CSA requested Class 1

[13] "Qualifying loads" refers to qualifying Class 1 energy used by TID or its customers in accordance with the Raker Act, Section 9(l).

[14] The Class 1 Energy Escalation Factor is defined as the factor that is determined for any year by dividing the 12 months ending September 30th immediately before the year of determination by the Annual Class 1 Load for the second 12 months ending September 30th immediately before the year of determination.

support documentation from MID, which replied that it could not provide the requested documents for one of the 36 months requested because they could not be located.

SFPUC has an established records retention policy. According the policy, its purpose is to:

- Ensure retention of records and information necessary for the efficient transaction of SFPUC's business.
- Comply with applicable laws and regulations such as the Sunshine Act.
- Provide a method of identifying and maintaining records that would otherwise be subject to destruction, when it is known or reasonably anticipated that they will be needed for audit, investigation, or litigation proceedings.
- Provide for the destruction of records that do not need to be maintained under the Schedule[15] or Legal Hold,[16] thereby reducing storage costs, clutter, and improving SFPUC's ability to find and make available and accessible relevant records when needed.

According to SFPUC's departmental policy, documents related to both audit and regulatory compliance are to be retained indefinitely. However, the districts' contracts do not state the duration that documents are to be retained, only that, upon request, parties are to deliver any and all documents reasonably required to implement the energy sales agreement.

Failure to have retention guidelines for the districts could cause the districts not to retain all necessary records, which could interfere with the evaluation of compliance with their respective energy sales agreements.

[15] "Schedule" refers to SFPUC's record retention schedule which shows record-type categories and retention periods by functional area for documents that SFPUC prepares and received in the regular course of its business.

[16] "Legal Hold" refers to SFPUC's preservation of all relevant records in the event of a pending, threatened, or reasonably foreseeable lawsuit, investigation, or audit.

Recommendation

11. The San Francisco Public Utilities Commission should establish document retention guidelines for the districts to adhere to and amend contract agreements to reflect terms.

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APPENDIX A: DEPARTMENT RESPONSE

San Francisco Water Power Sewer
Services of the San Francisco Public Utilities Commission

Assurance & Internal Controls
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T 415.554.3155
F 415.554.3161
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November 21, 2014

Tonia Lediju, Audit Director
Office of the Controller, City Services Auditor Division
City Hall, Room 476
One Dr. Carlton B. Goodlett Place
San Francisco, CA 94102

Subject: Management's Response to CSA Audit Report
SFPUC: Audit of Department Class One Power Sales to Modesto and Turlock Irrigation Districts in California

Dear Ms. Lediju,

Thank you for providing us the opportunity to review the draft report and recommendations contained in, '*Audit of Department Class One Power Sales to Modesto and Turlock Irrigation Districts in California*,' as prepared by the Controller's Office, City Services Auditor.

Our energy sales agreements with Modesto Irrigation District and Turlock Irrigation District are expiring in the near-term. The recommendations made will provide best practice guidance for upcoming discussions for renewal and we will seek to incorporate them, where applicable; and implement immediately for those possible. The department will also ensure adequate monitoring procedures are in place internally and will collaborate with both districts to accomplish adherence.

Attached are our responses to the recommendations contained in the draft report. If you have any questions or need additional information, please do not hesitate to contact me at (415) 554-1600.

Sincerely,

Harlan L. Kelly, Jr.
General Manager

cc: Michael Carlin, Deputy General Manager
Barbara Hale, Assistant General Manager, Power Enterprise
Steve Ritchie, Assistant General Manager, Water Enterprise
Todd L. Rydstrom, AGM Business Services & Chief Financial Officer
Nancy L. Hom, Director, Assurance & Internal Controls

Edwin M. Lee
Mayor
Ann Moller Caen
President
Francesca Vietor
Vice President
Vince Courtney
Commissioner
Anson Moran
Commissioner
Harlan L. Kelly, Jr.
General Manager

For each recommendation, the responsible agency should indicate whether it concurs, does not concur, or partially concurs. If it concurs with the recommendation, it should indicate the expected implementation date and implementation plan. If the responsible agency does not concur or partially concurs, it should provide an explanation and an alternate plan of action to address the identified issue.

RECOMMENDATIONS AND RESPONSES

Recommendation	Response
The San Francisco Public Utilities Commission should:	
1. Further develop Class 1 energy monitoring activities by improving oversight requirements in the districts' new energy sales agreements.	**Concur.** The SFPUC will consider additional oversight requirements to improve Class 1 energy monitoring in future agreements. We remain open to collaboration with the Districts on monitoring and oversight.
2. Adhere to the energy sales agreement requirement by annually reconciling the Modesto Irrigation District's Class 1 energy purchases to the metered Class 1 load to determine whether an adjustment is required to the subsequent Class 1 energy offers to Modesto Irrigation District.	**Concur.** The SFPUC, MID and TID are bound by the current Long Term Energy Sales Agreement (LTESA) and Long Term Power Sales Agreement (LTPSA), respectively (collectively referred to as "the Agreements"). If an adjustment is warranted, the SFPUC will proceed in a manner consistent with the Agreements. These findings will also inform SFPUC staff in ensuring the City has appropriate safeguards in place in the new agreements to be negotiated early next year.
3. Require the districts to develop procedures to periodically review and monitor Class 1 customers to ensure that they still qualify for the Class 1 energy rate.	**Concur.** The SFPUC will introduce provisions to require regular review of customers for Class 1 eligibility into the upcoming negotiations with the Districts.
4. Require the districts to inquire with new land owners who have purchased land with existing Class 1 services and document the purpose of land use to ensure that the use qualifies as Class 1.	**Concur.** See Response for Recommendation 3.

Recommendation	Response
5. Follow up with the Turlock Irrigation District to ensure that the ineligible customer is removed from the Class 1 customer list and to determine whether to pursue the recovery of the cost of the energy provided to the ineligible customer.	**Concur**. The SFPUC will contact TID and request removal of the ineligible Class 1 customer. The SFPUC will review the data to determine the dollar impact of the sales to the ineligible customer and then determine how to proceed. These findings will also inform SFPUC staff in ensuring the City has appropriate safeguards in place in the new agreements to be negotiated early next year.
6. Request the Turlock Irrigation District to review all of its Class 1 customers from the commencement of the agreement (April 2005) to ensure that they are within the district boundaries and report to the San Francisco Public Utilities Commission any Class 1 customers identified to be outside the district boundaries and the associated costs of the Class 1 energy provided to those ineligible Class 1 customers.	**Concur.** The SFPUC will request this review be performed by TID. These findings will also inform SFPUC staff in ensuring the City has appropriate safeguards in place in the new agreements to be negotiated early next year.
7. Remind the Turlock Irrigation District to certify locations when determining the eligibility of new Class 1 customers to ensure accuracy.	**Concur**. The SFPUC will remind TID of the Class 1 customer eligibility requirements and request that they better monitor their Class 1 customer list. The SFPUC will include monitoring and enforcement language for consideration in the upcoming negotiations.
8. Request the Office of the City Attorney to confirm its interpretation of the energy sales agreements regarding boundaries for classifying Class 1 customers and, based on the interpretation, have the Modesto Irrigation District and Turlock Irrigation District clearly define service boundaries for Class 1 customers.	**Partially Concur**. The SFPUC will directly address the evaluation of boundaries in the upcoming renewal discussions for the energy sales agreement with both MID and TID, and request clear definition of service boundaries for Class 1 eligible customers.

Recommendation	Response
9. If it is determined by the Office of the City Attorney that an identified customer does not qualify for Class 1 energy, then require the Modesto Irrigation District to remove that customer from the Class 1 list and to agree to an approach for recovering the cost of the energy provided to the ineligible customer.	**Partially Concur.** If it is determined that the identified customer does not qualify for Class 1 power, the SFPUC will request that MID remove the ineligible customer from the service list. The SFPUC will review the data to determine the dollar impact of the sales to the ineligible customer and then determine how to proceed. These findings will also inform SFPUC staff in ensuring the City has appropriate safeguards in place in the new agreements to be negotiated early next year.
10. Request the Modesto Irrigation District to review all of its Class 1 customers to ensure that they are within the allowable district boundaries and to agree to an approach for recovering the cost of the energy provided to any identified ineligible customers.	**Partially Concur.** See Response for Recommendation 6 which has similar application to TID. The SFPUC will review the data to determine the dollar impact of the sales to the ineligible customer and then determine how to proceed.
11. Establish document retention guidelines for the districts to adhere to and amend contract agreements to reflect terms.	**Concur.** The SFPUC will propose explicit document retention requirements for consideration in the upcoming negotiations. Although the Agreements do not specifically define a document retention requirement, sections within the Agreements imply indefinite retention timelines by requiring that the Districts provide certain information upon request.

APPENDIX B:
TURLOCK IRRIGATION DISTRICT RESPONSE

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September 12, 2014

Tonia Lediju
Director of City Audits
City Hall, Room 476
1 Dr. Carlton B. Goodlett Place
San Francisco, CA 94102

Re: Response to Audit of Department Class One Power Sales to Modesto and Turlock Irrigation Districts in California (Draft Audit Report)

Dear Ms. Lediju:

Thank you for providing Turlock Irrigation District (TID) with an opportunity to comment on the Draft Audit Report. While we appreciate the opportunity to comment on the report it must be noted that the business relationship between City and County of San Francisco (CCSF) and TID is memorialized by the terms and provisions of the Amended and Restated Long Term Power Sales Agreement between The City and County of San Francisco and the Turlock Irrigation District (LTPSA). Therefore our comments are made solely as a courtesy to assist in clarifying the audit report and should not be interpreted as amending the LTPSA, nor should any comments or lack of any comment be considered concurrence or assent with any component of or statement within the audit report.

As a general comment, the audit in several sections states that TID is prohibited from selling the energy to private persons or corporations, which is incorrect. TID has agreed within the LTPSA that no Power sold under the LTPSA shall be resold to any private person or corporation for purposes *contrary to the provisions of the Raker Act,* and that TID has the right and option to sell the power for resale if TID's total monthly load exceeds its amount of Available Energy taken in such month. For example, irrigation pumping is a qualified use of Class 1 power, which may be done by a private person or corporation.

As a point of clarification in Finding 1, the statement that "the districts used far more Class 1 energy than the amount provided" should be clarified to say that the qualified load far exceeded the energy supplied.

As noted in Finding 3, TID agrees that one customer out of the sample of thirty was found to be outside the TID irrigation service area. That customer has been removed from the monthly report submitted to CCSF of Qualified Energy. However, we are doubtful that the removal of this customer would have altered the quantity of Class 1 energy offered by CCSF to TID nor TID's ability to properly use the power

in accordance with the LTPSA, considering, as stated in the audit, the TID's qualified load far surpasses the amount of Class 1 energy supplied.

TID is pleased that you concluded that our methodology for our Class 1 load is adequately supported.

In Findings 2, 3, and 6 it appears the Draft Audit Report is suggesting changes to the obligations placed on TID under the LTPSA. As noted above both parties' obligations are defined by the LTPSA, and should CCSF wish to amend those terms the appropriate forum would be to discuss these changes directly with TID.

While we have provided several comments on the Draft Audit Report, we reserve the right to make additional comments, to object, or to challenge any audit findings or content in the future.

Sincerely,

Casey Hashimoto

Casey Hashimoto, P.E.
General Manager

APPENDIX C:
MODESTO IRRIGATION DISTRICT RESPONSE



1231 Eleventh St.
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(209) 526-7373

September 17, 2014

Tonia Lediju
Director of City Audits
City and County of San Francisco
City Hall, Room 476
1 Dr. Carlton B. Goodlett Place
San Francisco, CA

RE: Draft Report, San Francisco Public Utilities Commission: Audit of Department Class 1 Power Sales to Modesto and Turlock Irrigation Districts in California dated July XX, 2014

Dear Ms. Lediju:

Thank you for providing Modesto Irrigation District (MID) with the Draft Report, San Francisco Public Utilities Commission: Audit of Department Class 1 Power Sales to Modesto and Turlock Irrigation Districts in California dated July, 2014 (Draft Report) and submitted to MID on September 3, 2014. MID has had limited time to review the Draft Report but provides the following comments to the City and County of San Francisco (CCSF) that underscore the audit staff's unreliable approach to the audit; errors and inaccuracies contained in this Draft Report; and resulting, flawed findings. After review of this Draft Report, MID is certain that it has not violated the Raker Act (that Act of Congress, 38 Stat. 242 (1913)) or the Long Term Energy Sales Agreement between City and County of San Francisco and Modesto Irrigation District (LTESA), executed March 26, 2008, which are the controlling documents in the transaction of Class 1 Energy. MID's comments provided in this response are a courtesy to CCSF and do not create any implied or explicit changes to existing agreements between MID and CCSF as Parties to the LTESA.

GENERAL COMMENTS

MID and CCSF have been Parties in the purchase of Class 1 Energy for a many years that have included periodic audits over that time. MID supports these audits as a way to ensure on-going conformance with controlling documents in the purchase of Class 1 Energy. This year CCSF's audit went far beyond the scope of the audit rights granted CCSF in the LTESA, and was conducted in a manner best characterized as a fishing expedition. The scope of the audit was not clearly established nor clearly communicated and continued to creep over time. This audit went well outside the Parties' normal business practices or the terms of the Parties' mutually governing documents for Class 1 Energy transactions.

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The audit team assigned to perform the audit was unprepared and lacked the necessary knowledge of the LTESA or of basic electric system operation or resource planning. Examples of this include: 1) CCSF audit staff's request for a copy of the LTESA, a document that they should have reviewed prior to the outset of the audit; 2) CCSF audit staff questions regarding MID's "other sources of Class One Power", a product construct unique between MID and CCSF; and 3) lack of knowledge regarding the real world challenges of matching delivery of Class 1 wholesale energy with retail usage. The CCSF audit team's approach, reflected in the Draft Report, shows that they were auditing to contract standards that do not exist under the terms of the current LTESA.

Nevertheless, MID cooperated fully with CCSF's audit team, making every effort to provide required background information and to repeatedly respond to the same questions and requests for information. MID staff took valuable time away from their daily activities and went above and beyond the requirements of the LTESA to educate CCSF audit staff and provide timely responses. These extraordinary efforts include: (1) at least one on-site meeting; (2) at least two telephone conferences; (3) innumerable telephone calls; (4) more than 40 emails; and (5) hundreds of hours over a four month period researching and confirming that provided data was appropriate and complete.

Unfortunately, the audit team's lack of contextual knowledge has resulted in a demonstrably unreliable Draft Report. The Draft Report contains a number of mis-statements, a mis-understanding of clearly identified and publicly available procedures the Parties have incorporated into their business practices over many years, and severely flawed findings based on CCSF audit staff mis-understanding of both Raker and LTESA documents. The purpose of this letter is not to provide a complete, documented narrative response to each of the statements in the Draft Report with which MID disagrees. Further, MID's failure to challenge a specific finding or recommendation does not mean that MID is in agreement with such finding or recommendation.

The Draft Report erroneously draws legal conclusions regarding federal law, and also has little relationship to any evaluation of MID's adherence to the requirements outlined in the Raker Act. As the LTESA wisely contemplates, and what the CCSF audit staff obviously did not understand, is that CCSF and MID can only *estimate* each month's Class 1 Energy generation and usage. MID is not in automatic breach of the LTESA, much less the Raker Act, for routine consequences of estimations that ultimately get trued up on an ongoing, annual basis. After review of findings in this Draft Report, MID soundly rejects any notion that it has violated any aspect of the Raker Act or breached the LTESA. Any recommendations contained in the Draft Report should be used only for possible consideration as part of a new power sales contract that balances the benefits and burdens of requirements undertaken by the Parties.

SPECIFIC COMMENTS ON DRAFT REPORT FINDINGS

Below are but a few specific examples of the Draft Report's flaws and errors:

Summary Section:

The statement in the opening line of the Summary reads, "In total, the districts used far more Class 1 Energy than the amount provided by SFPUC during the two fiscal years reviewed."
This statement is false, and underscores the CCSF audit staff's misunderstanding of the fundamental issues being audited. MID believes that CCSF audit staff meant to say that MID's Class One Load exceeded the Class One Energy delivered by CCSF during the two fiscal years reviewed

Additionally, in another statement, "MID purchased more Class 1 Energy than their Class 1 customers consumed....."
This statement is likewise false, and MID's more detailed review is covered in response to Finding #1 below. In fact, MID's Class 1 eligible customers actually consumed far less Class 1 Energy than the total amount of energy they were entitled to consume for Class 1 eligible purposes.

Finding #1: This finding contains two sub-findings discussed below:

Finding 1.1 is materially flawed, and a purely arbitrary determination by CCSF audit staff for the following reasons: 1) It is undisputed that CCSF provides less than half of MID's Class 1 Load requirements on annual basis; 2) There is nothing in the Raker Act that establishes a monthly (or any shorter period) true-up between MID's requested Class 1 Energy and Class 1 Load prior to the beginning of a particular month (Notwithstanding this lack of monthly true-up, MID supplies a monthly Class 1 Load report to CCSF for review); and 3) The LTESA accommodates the inherent difficulties in exactly matching estimated CCSF Class 1 generation and estimated MID Class 1 load on a short term basis by virtue of true-up on a longer term, annual basis.

Finding 1.2 is also in error. First, the statement on page 10 second paragraph that states, *"Further, both parties failed to review MID's Class 1 Load, despite the provision in MID's agreement that states that the:*

> *Parties will annually compare Modesto's Estimated Class 1 Energy to the metered Class 1 Load to determine if an adjustment is required to the subsequent development of Modesto's Estimated Class 1 Energy."*

This statement is false. This is one more instance where the CCSF audit staff made findings with respect to contract terms that simply do not exist, rather than what actually is required by contract between the Parties. In conformance with Section 7.3 of the LTESA, MID annually compares the Class 1 delivered energy and load. From this data the Class 1 escalation/de-escalation factor is calculated, and used in order to adjust the Class 1 Energy request for the following year. Backup data used in this calculation is also provided to CCSF as part of the annual energy request.

Therefore, finding 1.2 is an incorrect conclusion based on the flawed assumptions, reasoning and conclusions of Finding 1.1. Accordingly, MID rejects the finding 1.2 in its entirety and considers CCSF's claim of excessive energy purchases totaling $214,943.00 baseless. Furthermore, if SFPUC believed there were billing errors, there are LTESA provisions to resolve disagreements concerning billing available to MID and CCSF. The Class 1 Energy audit process is not the appropriate forum to create or resolve billing disputes.

Finding #2:

This finding is severely flawed, and a statement used as part of this finding is false. On page 13 of the Draft Report the second paragraph states that, *"CSA contacted MID for its criteria for determining if a Class 1 code remains with the service after a tenant change. A response has not been received as of this report's issuance date."*

This statement is false. MID provided copies of its Class 1 criteria policy to CCSF audit staff during the on-site meeting of April 22, 2014, and again by email on May 23, 2014. In addition, Amy Burrow of MID sent an email response on July 18, 2014 to Mr. Joseph Towner's question of July 16, 2014 pointing him back to the previously provided criteria.

The following statement on page 13 is also in error, *"MID indicated that they rely on customers self-reporting by either contacting MID or the city for any changes that may occur to their Class 1 metered location".*

This statement does not accurately relay the information that MID staff delivered at length to CCSF auditors. MID's policies and procedures were explained and produced to the CCSF audit staff on multiple occasions. Neither the Raker Act nor the LTESA establish detailed criteria in the maintenance of a Class 1 customer list. Finding #2 appears to be based upon the CCSF audit staff's personal interpretation and not one based upon the Parties' legal or contractual requirements. MID has found over many years that Class 1 customer account changes are very infrequent due to their very nature. Once installed, municipal loads (i.e. schools, streetlights, city halls), subsurface water pump loads, and MID internal load, generally do not move or change except for major changes in account owner, land use or electrical facilities purpose, which is handled as part of standard account and service change procedures. Moreover, MID has published electric service rules that a customer must follow prior to modifying the use originally specified in application for any electric service. Tampering with an electrical service to change the purpose of electrical use is subject to shut off if the customer has made modifications to the service without prior notification to the District.

Finding #4:

This finding is in error. MID's retail electrical service territory is legally defined by the California Public Utilities Code. MID delivered to CCSF audit staff the established internal policy regulating eligibility for Class 1 Energy based on this State Law and the Raker Act. All Class 1 Energy accounts at MID are based on this internal policy. While MID considers its internal policy to be sound, MID also agrees there is always room for improving internal reporting systems and controls to preclude human error. For example, MID has found that, despite significant numbers of newly installed subsurface pumping added

over the past several years due to California's drought, it appears MID has not added any of these to our eligible Class 1 customer list. This leads MID staff to conclude that, in fact, MID has actually been significantly under-reporting eligible Class 1 load. Class 1 account administration has historically been a manual process due to the relatively small number of MID accounts receiving Class 1 Energy. MID is open to the consideration of new concepts that can improve accuracy and minimize overall administrative costs.

Finding #6:

This finding is flawed. Neither the Raker Act nor the LTESA prescribe document retention guidelines or policy requirements. MID has an established document retention policy patterned after guidelines issued by the National Association of Regulatory Utility Commissioners (NARUC) as an electric utility that engages in both wholesale and retail electric energy transactions.

CCSF Finding Recommendations:

MID has reviewed CCSF Audit staff's recommendations and concludes that none are ripe at this time for response. The recommendations generally fall into two categories:

1) *Recommendations that suggest provisions that CCSF Audit Staff believes MID should have been subject to*. Recognizing that the LTESA will expire by its terms next year, CCSF may choose to seek such provisions through future negotiations of a successor transaction; however, these provisions should not form the basis of an audit of the CURRENT contract terms.
2) *Recommendations requesting legal interpretation of Raker Act provisions*. CCSF audit staff should have sought the legal interpretations it required in order to form the basis of its findings and conclusions regarding MID's compliance therewith, prior to conduction the audit or publishing audit findings on such matters.

CONCLUSION

Given the time expended, the level of interaction that MID staff experienced, and review of the Draft Report itself, it is clear that CCSF audit staff was uninformed of critical, operational aspects of both the Raker Act and LTESA, as well as having a basic misunderstanding of the day-to-day policies and procedures required of both CCSF and MID as operating electric utilities. MID is certain no violation of either Raker Act or LTESA has occurred.

As stated at the outset of this response, MID appreciates the opportunity to participate in an audit of our operations, as an audit gives reason for MID to consider those internal processes and controls that can be improved, and appreciates the opportunity to provide comments on this Draft Report. MID reserves the right to challenge the findings and recommendations incorporated in this Draft Report or any other findings or recommendations that may be contained in the final report. We trust that our comments will be given consideration as MID and CCSF have participated as Parties in electrical trading of Class 1 Energy for many years, and have many other critical partnerships under the Raker Act.

If you have any questions please direct them to Ed O'Brien (email edo@mid.org), Electric Resources Department, Modesto Irrigation District.

Sincerely,

Gregory E Salyer

Gregory Salyer
Assistant General Manager, Electric Resources
Modesto Irrigation District

Cc:
Irella Blackwood, Audit Manager, CCSF
Roger VanHoy, General Manager, MID
Barbara Hale, Assistant General Manager, SFPUC

APPENDIX D: AUDITOR COMMENTS ON TURLOCK IRRIGATION DISTRICT RESPONSE

The Office of the Controller's City Services Auditor Division (CSA) acknowledges the written response of the Turlock Irrigation District (TID) to the draft audit report. To provide clarity and perspective, CSA is commenting on TID's response. Although TID disagrees with general comments in the audit report, CSA affirms that the audit report is factual and well-supported.

General Comments

TID's response states that CSA is incorrect in stating that the district is prohibited from selling energy to private persons or corporations.

CSA acknowledges that there are instances in which the district may sell energy to private persons or corporations, including when TID's monthly load exceeds its amount of Available Energy taken in a month. The audit report does not indicate that TID is operating in violation of the Raker Act or the LTESA by selling energy to private persons or corporations. CSA's statement in the report that TID is prohibited from selling energy to these entities refers only to the sale of Class 1 energy. Discussions with the district and SFPUC make it clear that Class 1 energy cannot be isolated from the district's total energy supply, which is why a concern would arise only if it was determined that TID's monthly loads did not exceed its amount of Available Energy in a given month.

The evidence obtained during the audit provides a reasonable basis for the findings and conclusions based on the audit objectives. CSA is pleased that the San Francisco Public Utilities Commission (SFPUC) will use the audit report's findings and recommendations to assist in its efforts to improve the Long Term Power Sales Agreement. CSA looks forward to working with SFPUC to follow up on the status of the recommendations made in this report.

APPENDIX E: AUDITOR COMMENTS ON MODESTO IRRIGATION DISTRICT RESPONSE

The Office of the Controller's City Services Auditor Division (CSA) acknowledges the written response of the Modesto Irrigation District (MID) to the draft audit report. To provide clarity and perspective, CSA is commenting on MID's response. Although MID disagrees with findings 1, 2, 4, and 6, CSA affirms that the audit report is factual and well-supported.

Finding 1.1

MID's response states that the finding is materially flawed because, among other reasons, the Raker Act does not establish a monthly true-up between MID's requested Class 1 Energy and Class 1 Load before the beginning of a particular month. CSA agrees that the Raker Act does not establish such monitoring activities; therefore, CSA developed an appropriate finding and a recommendation that SFPUC:

> Further develop Class 1 energy monitoring activities by improving oversight requirements in the districts' new energy sales agreements.

CSA believes this recommendation to enhance oversight requirements in the districts' new energy sales agreements will improve monitoring controls.

Finding 1.2

MID's response states that the finding is in error and that CSA's statement that MID and SFPUC failed to review MID's Class 1 load is false. MID also states that the audit team made findings with respect to contract terms that do not exist.

CSA disagrees with MID's assertion that the finding is in error. CSA's quality control process includes an independent review of all findings and supporting documentation to ensure that documented facts are correct before report publication. CSA determined that MID did not adhere to the following Long Term Energy Sales Agreement (LTESA) contract provision (7.3.5):

> Parties will annually compare Modesto's Estimated Class 1 Energy to the metered Class 1 Load to determine if an adjustment is required to the subsequent development of Modesto's Estimated Class 1 Energy.

Based on its review, CSA found that this provision was not adhered to because both parties failed to identify that MID had overpurchased Class 1 energy during the two months noted.

Finding 2

MID's response states that the finding is severely flawed and that a statement used as part of the finding is false. Specifically, MID believes that the following statement is false:

> CSA contacted MID for its criteria for determining if a Class 1 code remains with the service after a tenant change. A response has not been received as of this report's issuance.

MID continues to state that it provided Class 1 criteria policy to CSA audit staff in addition to providing an e-mail response on July 18, 2014, pointing CSA back to the previously provided criteria.

CSA reviewed MID's Class 1 criteria policy and did not identify information regarding the Class 1 determination process *for new land owners who purchase land with existing Class 1 pumps*. According to MID's Class 1 criteria policy, "On a pumping service, the Class 1 Power code would usually remain with the service when a tenant change takes place."

To determine that new land owners are properly vetted before they are allowed to have a Class 1 code remain on their pump(s), CSA e-mailed MID and asked it to specify how this determination is made. MID responded that, "MID uses the policy provided (Class 1 criteria policy) to qualify class 1 service points" in an e-mail dated July 18, 2014. This response was not useful because CSA had read MID's policy, which did not adequately describe the process such that CSA could understand how new land owners are properly vetted. To obtain the needed clarification, CSA called MID personnel several times but was unsuccessful in receiving a response before the draft audit report was completed.

Finding 4

MID's response states that all Class 1 Energy accounts at MID are based on its internal policy regulating eligibility for Class 1 Energy based on the California Public Utilities Code and state law. However, MID acknowledged that its internal reporting systems and controls could be improved to preclude human error. Further, MID responded that significant numbers of subsurface pumps were added in the past several years, but were not added to the eligible Class 1 customer list, so the eligible Class 1 load has been underreported. MID stated that it was open to new concepts to improve accuracy and minimize costs.

As the audit report states, CSA could not precisely determine whether sampled MID Class 1 customers located near the district's boundaries were within the district due to the lack of geographic information system (GIS) locations in MID's records. According to MID, GIS coordinates are not stored in its customer data system and, therefore, are not easily accessible, and MID does not have the capacity to obtain this information.

CSA stands by its conclusion that, as a result of MID's acknowledgment that it has underreported the eligible Class 1 load, MID needs its customers' GIS locations to clearly identify eligible Class 1 customers.

Finding 6

MID's response states that the finding is flawed and that neither the Raker Act nor the LTESA prescribes document retention guidelines or policy requirements. MID also states that it has an established retention policy.

CSA agrees that neither the Raker Act nor LTESA prescribes document retention guidelines or policy requirements. In fact, MID's statement supports CSA's finding titled "SFPUC's energy sales agreements with the districts do not include record retention guidelines." MID's acknowledgment that it has a retention policy that is not agreed upon in the LTESA further supports CSA's concern that MID does not retain all documents for an agreed-upon period. As stated in the finding:

> Failure to have retention guidelines for the districts could result in the districts not retaining all necessary records, which could interfere with the evaluation of compliance with their respective energy sales agreements.

An agreed-upon policy must be established in the LTESA so all parties involved are subject to a uniform retention policy.

The evidence obtained during the audit provides a reasonable basis for the findings and conclusions based on the audit objectives. CSA is pleased that the San Francisco Public Utilities Commission (SFPUC) will use the audit report's findings and recommendations to assist in its efforts to improve the Long Term Power Sales Agreement. CSA looks forward to working with SFPUC to follow up on the status of the recommendations made in this report.