

Introduction

On May 18, 2004, the Board of Supervisors adopted a motion directing the Budget Analyst to perform a management audit of the Public Utilities Commission (Motion No. M04-57), and on June 29, 2004, the Board of Supervisors adopted a motion directing the Budget Analyst to prioritize an analysis of sewer service charges, which were scheduled to take effect July 1, 2004, as part of the management audit of the Public Utilities Commission (Motion No. M04-77).

Purpose and Scope

The purpose of this management audit is to evaluate the economy, efficiency, and effectiveness of the Public Utilities Commission's programs, activities, and functions, and the Public Utilities Commission's compliance with applicable State and Federal laws, local ordinances, and City policies and procedures. The management audit will also assess (i) the appropriateness of established goals and objectives, (ii) strategies and plans to accomplish such goals and objectives, (iii) the degree to which such goals and objectives are being accomplished, and (iv) the appropriateness of controls established to provide reasonable assurance that such goals and objectives will be accomplished. The management audit includes a review of all of the divisions within the Public Utilities Commission.

The management audit will be conducted in four phases:

- Phase I is a review of the Clean Water Enterprise Fund's programs, activities, and functions, including a review of the sewer service charges.
- Phase II is a review of the Hetch Hetchy Enterprise Fund's programs, activities, and functions, including water and power operations, and power policy.
- Phase III is a review of the Water Enterprise Fund's programs, activities, and functions, including water supply, treatment, and distribution for regional and City customers.
- Phase IV is a review of the programs, activities, and functions of the Public Utilities Commission as a whole, including the Capital Improvement Program, administrative functions, and enterprise functions, such as asset management, that affect all three enterprise funds.

This report is Phase I of the management audit, which is a review of the Clean Water Enterprise Fund's programs, activities, and functions. The Phase I report includes a review of:

- Sewer service charges and the financial condition of the Clean Water Enterprise Fund.

- Clean Water Enterprise Fund budgetary and financial planning.
- Clean Water capital planning and the related public participation process.
- The Water Pollution Control Division's personnel administration and maintenance management.
- The interface between the Department of Public Works and the Clean Water Enterprise Fund's programs.
- The structural organization of Clean Water Enterprise Fund activities, divisions, and programs.

Audit Methodology

The management audit was conducted in accordance with *Governmental Auditing Standards, 2003 Revision*, issued by the Comptroller General of the United States, U.S. General Accounting Office. In accordance with these requirements and standard management audit practices, we performed the following management audit procedures:

- An entrance conference was held with the Acting General Manager and key members of the Public Utilities Commission management staff to present the audit work plan, discuss audit procedures and protocol, request certain background information, and respond to questions.
- A pre-audit survey was conducted to familiarize the management audit staff with the operations and records maintained by the Public Utilities Commission's various departments and divisions and to identify areas requiring additional review. As part of the survey phase, the management audit staff conducted interviews with executive and management staff throughout the organization.
- The management audit staff conducted field work to develop a more detailed understanding of selected departmental operations. Field work activities included additional interviews with selected managers, supervisor and line staff, representatives from other City and County departments, and members of community organizations and advisory committees. Additionally, the management audit staff reviewed (i) Federal, State, and local codes, laws, and regulations governing the functions and practices of the Clean Water Enterprise Fund; (ii) examined various documents, reports and work products prepared by the Public Utilities Commission; (iii) reviewed the Clean Water Enterprise Fund's audited financial statements; (iv) reviewed studies, reports, and assessments prepared by other consultants; (v) obtained and analyzed various data and financial reports, contracts, and agreements; and (vi) evaluated the effectiveness of the various tools used by the Public Utilities Commission management to oversee the activities of the organization.
- The management audit staff presented a draft report to the Public Utilities Commission management on September 10, 2004. This draft report analyzed the

information and data gathered during Phase I of the management audit and contained our initial findings, conclusions, and recommendations.

- The management audit staff held an exit conference with the General Manager and key members of the Public Utilities Commission's management staff on September 17, 2004, to discuss the draft report. During the period between delivery of the draft report and the exit conference, the Public Utilities Commission was able to request clarification of the findings and recommendations, and provided additional information related to the findings. Based on the additional information provided, the management audit staff prepared a final report. The Public Utilities Commission has provided a written response to the Budget Analyst's Phase I Clean Water Enterprise Fund management audit report, which is appended to this report.

Overview of the Clean Water Enterprise Fund

The Clean Water Enterprise Fund is responsible for collecting and treating waste water. In San Francisco, clean water functions include both sewer collection and wastewater treatment. Additionally, the storm water system is combined with the sewer system, so that storm water flows into the sewer through street drains and is treated in the wastewater treatment plants.

The sewer service charge, paid by the City's residents and businesses, provides revenues for the operation and maintenance of the City's sewer system and wastewater treatment plants. The Clean Water Enterprise Fund also receives some revenues from charges for services to special districts, property rentals, recoveries from other City agencies, interest earned on cash accounts, and other miscellaneous sources.

Most of the Clean Water Enterprise Fund functions, programs, and activities were transferred from the Department of Public Works to the Public Utilities Commission between 1996 and 1997. The Public Utilities Commission assumed ownership and management of clean water system facilities, including the sewer system and the wastewater treatment plants. The Public Utilities Commission also assumed responsibility for (i) the industrial waste program, which became the Pretreatment, Pollution Prevention, and Storm Water Program of the Bureau of Environmental and Regulatory Management, (ii) clean water planning functions, and (iii) the wastewater laboratories.

Organization of the Clean Water Enterprise Fund Within the Public Utilities Commission

Currently, clean water functions, programs, and activities are not consolidated into one division within the Public Utilities Commission. The Assistant General Manager for Operations is responsible for (i) the sewer operations and wastewater treatment plant maintenance and operations, under the Water Pollution Control Division, (ii) the Bureau of Environmental and Regulatory Management's Pretreatment, Pollution Prevention, and Storm Water Program, and (iii) the Water Quality Bureau's Southeast and Oceanside

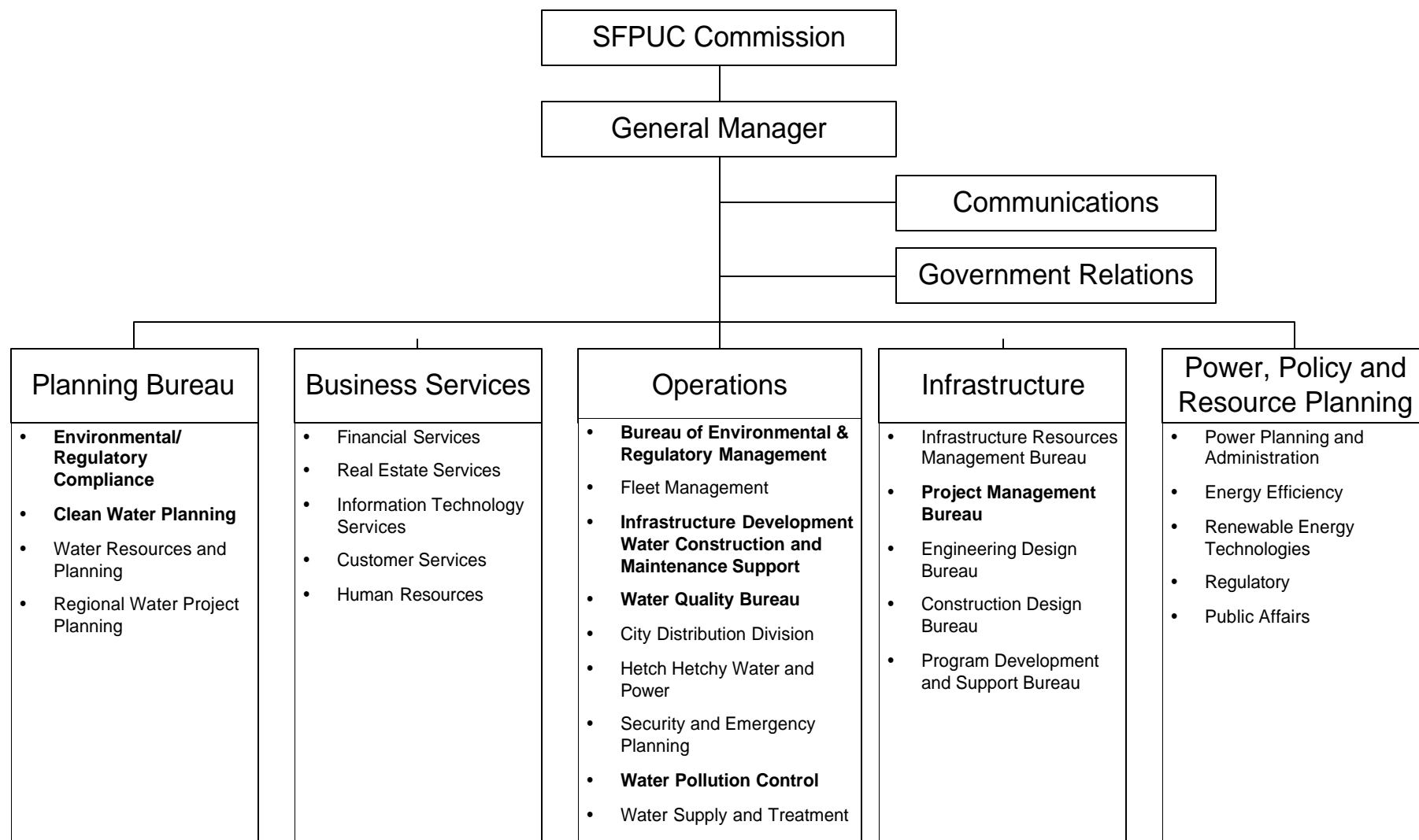
Water Pollution Control Plant Laboratories. The Infrastructure Development, Water Construction, and Maintenance Support function and the Infrastructure Project Management Bureau have some engineering staff with responsibility for clean water programs and the Planning Bureau has staff responsible for some clean water planning and environmental and regulatory compliance activities.

The Department of Public Works has continued to be responsible for hydraulic engineering functions for the Clean Water Enterprise Fund, and for street and sewer repairs.

Exhibit I on the following page is the Public Utilities Commission organization chart, as of August 17, 2004. The recently appointed General Manager has appointed new senior personnel, including a Deputy General Manager, to assist her in coordinating activities across the existing divisions on key issues. The public announcement of a new management structure for the Department is imminent.

SAN FRANCISCO PUBLIC UTILITIES COMMISSION

General Managers Organization Chart



Clean Water Enterprise Fund Revenues and Expenditures

In FY 2004-2005, the Clean Water Enterprise Fund operating budget is \$141,094,980 and total budget, including capital projects is \$190,379,812. The FY 2004-2005 Clean Water Enterprise Fund operating budget is shown in Table 1.

Table 1

FY 2004-2005 Clean Water Enterprise Fund Operating Budget

FY 2004-2005 Clean Water Enterprise Fund	
<u>Clean Water Enterprise Fund Revenues</u>	
San Francisco sewer service charges	\$141,564,420
Special district sewer charges	4,000,000
Interest earned	2,876,179
Property rentals	427,000
Bond proceeds	33,870,250
Interdepartmental recoveries	4,995,300
Unallocated expenditure recoveries	89,000
Use of fund balance	2,361,381
General fund	<u>196,282</u>
Total Clean Water Enterprise Fund Revenues	\$190,379,812
<u>Expenditures</u>	
Salaries and mandatory fringe benefits	\$37,091,663
Citywide overhead	2,093,863
Non personal services	8,828,659
Materials and supplies	8,626,131
Equipment	735,741
Debt service	37,351,062
Services of other departments	43,724,861
Annual Projects	672,000
Continuing Projects	<u>1,971,000</u>
Subtotal, operating expenditures	\$141,094,980
SE Community	196,282
Repair & replacement	15,218,300
Capital	<u>33,870,250</u>
Total Clean Water Enterprise Fund Expenditures	\$190,379,812

Source: FY 2004-2005 Annual Appropriation Ordinance

Proposition E and Sewer Service Charge Increases

In FY 2004-2005, the Public Utilities Commission adopted new sewer service charges, resulting in an 11 percent increase in revenues. The FY 2004-2005 sewer service charge increase was the first increase since FY 1996-97. In November of 1998, San Francisco voters approved Proposition H, which prohibited sewer service charge increases until July 1, 2006. In November of 2002, San Francisco voters approved Proposition E, which authorized the Public Utilities Commission to increase sewer service charges, subject to approval or disapproval by the Board of Supervisors within 30 days of submission. Pursuant to Proposition E, if the Board of Supervisors fails to approve or disapprove proposed increases to the sewer service charges, the sewer service charge becomes effective without further Board of Supervisors action. The Board of Supervisors did not act on the proposed FY 2004-2005 sewer service charge increase, and therefore, the sewer service charge increase became effective without Board of Supervisors action on July 15, 2004.

Proposition E established a Rate Fairness Board to oversee the sewer service charges and required the Public Utilities Commission to retain an outside consultant every five years to assist the Public Utilities Commission with setting rates.

Proposition E also authorized the Public Utilities Commission to issue revenue bonds to fund capital improvements to clean water facilities and services, upon a two-thirds vote of the Board of Supervisors. The Public Utilities Commission has implemented a planning process to develop a Clean Water Master Plan. The Clean Water Enterprise Fund has significant capital needs. The Clean Water Master Plan is expected to be completed in the fall of 2007 with construction of clean water capital improvement projects to begin sometime between 2009 and 2011. The resulting clean water capital improvement program could cost between \$1 billion and \$2 billion. Department staff have identified approximately \$100 million to \$150 million in interim capital improvement projects that will be required prior to construction of the Clean Water Master Plan projects.

Sewer service charges, Clean Water Enterprise Fund debt management and financial planning, and planning for clean water capital needs are discussed in detail in this management audit report.

Key Issues Not Addressed in Phase I of the Management Audit

Issues that Cross the Public Utilities Commission as a Whole

In the management audit review of the Clean Water Enterprise Fund, we identified several issues that will be addressed in detail in later phases of the management audit.

Centralization or Decentralization of Planning and Business Services

Currently, the planning and business services support for the Clean Water, Hetch Hetchy, and the Water Enterprise Funds are centralized within the Public Utilities Commission Administration. Costs for planning and business services support are allocated to the three enterprise funds through an annual cost allocation plan. The management audit will evaluate the effectiveness and efficiency of continuing to provide planning and business services support centrally or decentralizing some of these functions to the business enterprises. Centralization and decentralization of planning and business services will be discussed in the Phase IV management audit report.

Charging for Services Between Divisions Within the Public Utilities Commission

During Phase I, the management audit staff noted deficiencies in the tracking of costs between divisions within the Public Utilities Commission. For example, the Water Quality Bureau's Southeast and Oceanside Water Pollution Control Plant Laboratories provide services to the Bureau of Environmental and Regulatory Management's Pretreatment, Pollution Control, and Storm Water Program, but do not track the costs of providing such services and do not charge for such services. Because the divisions within the Public Utilities Commission do not consistently charge for services provided to other divisions, the costs for these services are hidden, weakening control over expenditures. The management audit staff will assess tracking of costs, charging for services, and expenditure controls between Public Utilities Commission divisions during the management audit, and will discuss these issues in the Phase IV management audit report.

Maintenance Practices and Management of Assets

Currently, the programs funded by the Clean Water, Hetch Hetchy, and Water Enterprise Funds have separate maintenance policies and procedures and maintenance management practices specific to each program. The Public Utilities Commission has not implemented standard policies and procedures and maintenance management practices across the three programs to ensure consistent quality and effectiveness in facility maintenance.

Also, the Public Utilities Commission Administration has recently initiated a planning process across the three business enterprise funds to develop and implement a department-wide asset management program, identifying historic and future costs of physical assets and the risk from asset failure. Although each of the three business enterprise funds uses the computer maintenance management system, Maximo, each enterprise fund has employed different levels of functionality for Maximo.

This management audit report addresses the maintenance policies and procedures and maintenance management practices of the Clean Water Enterprise Fund's Water Pollution Control Division in Section 7 of this Phase I report. The management audit will assess the Hetch Hetchy and Water Enterprise Funds' maintenance policies and

procedures and maintenance management practices in Phases II and III of the management audit, and will assess and discuss maintenance practices and asset management across the Public Utilities Commission as a whole in Phase IV of the management audit.

Security Assessment and Planning

The Water Pollution Control Division's security arrangements for the Southeast and Oceanside Water Pollution Control Plants include monitoring cameras, perimeter fencing at the Southeast Water Pollution Control Plant¹, and an electronic access system to enter the premises. The Water Pollution Control Division has (a) developed a security contingency plan, using a security planning and assessment tool approved by the Federal Environmental Protection Agency, and (b) hired the services of an outside consultant, the C.H. Guernsey Company, to conduct a security walk through and prepare a draft report regarding the Water Pollution Control Division's security needs. The Water Pollution Control Division's security committee, which consists of maintenance and operations supervisors and staff, is currently reviewing the consultant's draft report, and will develop proposals regarding the Water Pollution Control Division's security needs for the FY 2005-2006 budget.

The Budget Analyst will review the Public Utilities Commission's security assessment and security plans during Phase IV of the management audit.

Southeast Community Childcare Facilities

The Department provides property management services for four city-owned childcare facilities: the E.P. Mills Facility, California Association for Health, Education, Employment, and Dignity, Inc. (CAHEED), Martin Luther King Childcare, and Sojourner Truth Childcare Center. A review of these facilities is out of the scope of this audit. However, based on observation, these four facilities appear to have deferred maintenance issues. Department staff indicated that the Department's annual budget only includes funds for general maintenance of these facilities and that it is the tenants' responsibility to secure funding for major improvements. However, the Budget Analyst questions whether the tenants have sufficient ability to secure funding for major improvements and notes the potential liability for the City. The Budget Analyst recommends that the Public Utilities Commission further explore this issue.

Clean Water Enterprise Fund Accomplishments

The management audit team invited the Public Utilities Commission to submit written statements of the Clean Water Enterprise Fund accomplishments that it perceives have occurred in recent years. The accomplishments provided are as follows:

¹ Because of the location and design of the Oceanside Water Pollution Control Plant, perimeter fencing is not necessary.

- Mercury Permit Program: San Francisco is the first large California municipality to implement a permit program that involves the installation of amalgam separators in dental offices to remove mercury from the City's sewer system. The Department identified wastewater from dental offices as a significant source of mercury into the City's wastewater treatment system. In just eight months since the beginning of the permit program, 98 percent of all dental offices in the City have installed separator equipment to keep mercury out of the City's sewer system. The program has drawn positive media attention and placed the Department in a utility leadership position.
- Water Pollution Control Division Awards: The Water Pollution Control Division has won a number of awards, including those awarded by the California Association of Sanitation Agencies (2004 Special Merit Award for Regional Cooperation), the Federal Environmental Protection Agency (2004 National Operations and Maintenance Excellence Award), California Water Environment Association (2003 Large Treatment Plant of the Year Award), Association of Metropolitan Sewerage Agencies (Peak Performance Awards between 1999 and 2003), and the American Public Works Association (2001 Award of Merit).

Acknowledgements

We would like to thank the management and staff of the Public Utilities Commission for their cooperation during Phase I of this management audit. We hope the findings contained in this report provide a useful tool for the new General Manager as she improves the operations of the Clean Water Enterprise Fund during her tenure.