

BOARD ACTION

Board of Directors Business and Finance Committee

February 10, 2009 Board Meeting

8-1

Subject

Authorize payment for calendar year 2009 charges from the State Water Project under terms of water supply contracts with the Department of Water Resources

Description

Board authorization is requested to pay Metropolitan's State Water Project (SWP) contractual obligations. Staff proposes authorization to pay up to \$561 million for calendar year 2009 SWP charges in light of potential supply conditions in 2009.

As reported to the Board in December, a preliminary Statement of Charges totaling \$708 million was issued by the Department of Water Resources (DWR) for the delivery of 1.7 million acre-feet (AF). Staff has developed the \$561 million request in light of DWR's methodology for preparing the Statement of Charges, new Delta Habitat Planning work and energy cost variables. The requested authorization corresponds to 1.1 million AF of SWP water delivery into Metropolitan's service area, including deliveries derived from the Table A allocation, groundwater pump-in programs, transfers and other water management actions. In the event less water is received, Metropolitan will pay the fixed charges plus the variable charges associated with the reduced amount. If additional water supplies become available, supplemental board authorization would be requested to pay additional variable energy charges necessary to move the increased amount of water.

Metropolitan's annual SWP charges are divided into two broad categories: fixed costs and variable energy costs. The fixed portion for infrastructure and operating costs are independent of any water the project delivers. The second portion is for variable energy costs that are based on available water supply, contractor requests and the price of energy. In October and November, presentations were made to the Audit and Ethics and the Business and Finance Committees during which the process used to prepare the charges was reviewed and the nature of the costs were described.

The fixed charges for 2009 total \$418 million and are shown in **Attachment 1**. The fixed charges include revised costs for the Delta Habitat Conservation and Conveyance Program (DHCCP) work recently approved by Metropolitan's Board. Fixed charges for 2009 also include debt repayment and costs required to operate and maintain infrastructure. **Attachment 2** identifies revised charges after addressing Metropolitan's questions and audit findings. **Attachment 3** compares charges contained in staff's recommendation with DWR's revised December Statement of Charges.

The variable charges for pumping 1.1 million AF in 2009 would be \$143 million. A number of factors affect SWP variable energy charges: the amount of water delivered into our service area, the amount of hydroelectric power generated by the SWP, the price of energy in the market and the outcome of energy rate litigation. In 2009, hydrologic conditions and Delta pumping restrictions to protect endangered species are expected to greatly influence the amount of water to be pumped. Dry hydrology translates to low SWP hydroelectric revenues and greater net costs for acquiring pumping energy. High volatility in energy costs is likely to continue as the natural gas market follows the price of oil. In addition, over the past decade the SWP has experienced increasing energy transmission costs.

Audit of the Statement of Charges

Metropolitan's independent outside auditor, Richardson and Company, has completed an annual audit of the initial 2009 Statement of Charges. The review of the December revisions will be incorporated into the annual audit of the 2010 Statement of Charges. The auditor determined that with the future correction of these audit findings, the charges comply with the terms and conditions of the SWP contract. **Attachment 4** summarizes the results of the audit.

Charges under Discussion

DWR has agreed to a reduction of \$38 million of the \$47 million identified by Metropolitan as charges in question. This reduction coupled with charges identified by Metropolitan's audit and DWR staff brings the total reduction in charges from the Preliminary Statement of Charges to \$56 million. Metropolitan is continuing to explore other actions to reduce cost.

Policy

Metropolitan Water District Administrative Code Section 5112: State Water Contract Payments

California Environmental Quality Act (CEQA)

CEQA determination for Options #1 and #2:

The proposed action is not defined as a project under CEQA because it involves continuing administrative activities, such as general policy and procedure making (Section 15378(b)(2) of the State CEQA Guidelines). In addition, the proposed action is not subject to CEQA because it involves other government fiscal activities, which do not involve any commitment to any specific project, which may result in a potentially significant physical impact on the environment (Section 15378(b)(4) of the State CEQA Guidelines).

The CEQA determination is: Determine that the proposed action is not subject to CEQA pursuant to Sections 15378(b)(2) and 15378(b)(4) of the State CEQA Guidelines.

Board Options

Option #1

Adopt the CEQA determination and authorize payments up to a total of \$561 million to the Department of Water Resources in CY 2009 for Metropolitan's SWP charges.

Fiscal Impact: Maximum payments in CY 2009 for Metropolitan's SWP expenses of up to a total of \$561 million for expected deliveries of 1.1 million acre-feet. Net calendar year payments should be lower because of credits, refunds, and adjustments that are not included in the annual charges. Payments will also vary with actual energy costs.

Business Analysis: Historically, Metropolitan's actual State Water Project costs have been less than DWR's estimated charges due to lower energy costs and available water. This request is \$91 million less than DWR's Statement of Charges estimate. This request represents charges that will be incurred for up to 1.1 million acre-feet derived from SWP allocations groundwater pump-in programs, water transfers, and other water management actions. If additional water supplies become available, supplemental requests would be made for board authorization to pay the additional energy costs for taking delivery of the water.

Option #2

Adopt the CEQA determination and authorize payments up to a total of \$652 million to the Department of Water Resources in CY 2009 for Metropolitan's SWP charges.

Fiscal Impact: Payments in CY 2009 up to a total of \$652 million for deliveries of up to 1,711,500 acre-feet **Business Analysis:** This option requests authorization to pay up to DWR's Statement of Charges prepared for Metropolitan's State Water Project expenses. It represents charges that would be incurred with a SWP allocation of up to 90 percent. Metropolitan would pay fixed charges plus the variable charges associated with only the water received. If actual deliveries are 1.1 million acre-feet or less, Metropolitan's payments would be same as in Option #1.

Staff Recommendation

Option #1

Stephen N. Arakawa Date

Manager, Water Resource Management

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Attachment 1 - Table 1 - Schedule of Fixed CY 2009 Charges

Attachment 2 – Table 2 – Comparison of the Preliminary Outlook and December's Billing for CY 2009 Charges

Attachment 3 – Figure 1 – Comparison of Staff's Recommendation with Revised CY 2009
Statement of Charges

Attachment 4 – Summary Report on the Audit of the CY 2009 Statement of Charges
BLA #6295

Table 1 – Schedule of Fixed CY 2009 Charges

	CY 2009 SOC (\$millions)
Off Aqueduct Power Facilities	96
Total Min OMP&R	177
Total Capital	145
Total Fixed SWP Charges	418

The fixed or core charges for 2009 total \$418 million and are shown in Table 1. These include the charges for capital, operations and maintenance and the fixed energy charges.

Table 2 - Comparison of the Preliminary Outlook and December's Billing for CY 2009 Charges									
(\$millions)									
	Preliminary								
	CY 2009 SOC	CY 2009 SOC	Change						
Total Power	\$ 330	\$ 330	-						
Total Min OMP&R	209	177	(32)						
Total Capital	169	145	(24)						
Total SWP Charges	\$ 708	\$ 652	(56)						

Noticeable differences are:

<u>\$32 million decrease in the Operations and Maintenance charges</u>. The decrease in Operations and Maintenance charges is due to revised estimates for the Delta Habitat Conservation and Conveyance Program environmental planning work, the PG&E Transmission rate case settlement, some auditor identified errors, as well as other adjustments.

\$24 million decrease in Capital charges. The decrease in Capital charges results from contractor objections to the tentative agreement on fishery mitigation and planned costs associated with the operation of the Delta pumps. Revision to DHCCP Program cost further reduced charges. DWR amended its General Bond resolution related to reserve account requirements and is now able to reduce the balance in its Debt Service Reserve account. The excess funds help reduce contractor capital payments and Metropolitan's 2009 capital payments declined \$18 million.

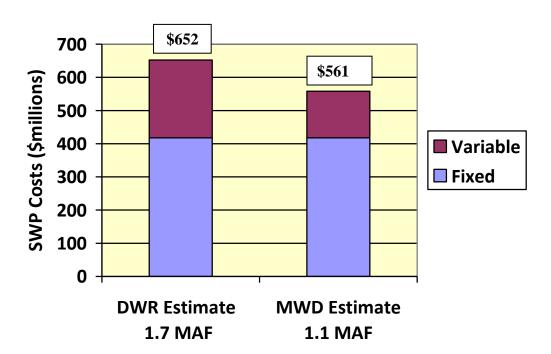


Figure 1 – Comparison of Staff's Recommendation with Revised CY 2009 Statement of Charges

The fixed or core charges for 2009 total \$418 million and are shown in Table 1. These include the charges for capital, operations and maintenance and the fixed energy charges. The variable component is based on DWR's estimate of delivering 1.7 million acre-feet and the higher prices for purchased energy. DWR's estimate of the variable energy charge for 1.7 million acre-feet is \$234. Combined, these charges are a total of \$652 million. In 2009, Metropolitan's water receipts are expected to be substantially less than 1.7 million acre-feet due to drought and environmental restrictions and purchased energy prices are also projected to be lower than DWR's estimate. Actual variable energy charges are expected to be substantially lower than included in the Statement of Charges.

At this time, expected SWP receipts are 1.1 million acre-feet. The cost to deliver 1.1 million acre-feet, representing SWP allocation, transfers, groundwater pump-in programs, and other water management actions, would be the core cost of \$418 million, plus an energy cost of \$143 million for a total of \$561 million. If additional supplies are available, the variable charges would increase at the rate of about \$15 million for each additional 100,000 acre-feet. In the event additional supplies become available, a supplementary request for additional funds would be made.

THE METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA

SUMMARY REPORT ON THE AUDIT OF THE 2009 STATEMENT OF CHARGES

THE METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA

SUMMARY REPORT ON THE AUDIT OF THE 2009 STATEMENT OF CHARGES

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INDEPENDENT AUDITOR'S REPORT

The Metropolitan Water District of Southern California Los Angeles, California

We have audited the accompanying 2009 Statement of Charges submitted to the Metropolitan Water District of Southern California (Metropolitan) by the State of California Department of Water Resources (Department). This Statement of Charges is the responsibility of the Department's management. Our responsibility is to express an opinion on this Statement of Charges based on our audit.

Except as described in the following paragraph, we conducted our audit in accordance with generally accepted auditing standards. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the Statement of Charges is free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts in the Statement of Charges. An audit also includes assessing the accounting practices used and significant estimates made by the Department's management for conformity with our understanding of Metropolitan's Water Supply Contract. The audit also includes evaluating the overall Statement of Charges presentation. We believe that our audit provides a reasonable basis for our opinion.

In conformity with the requirements of Metropolitan's Water Supply Contract with the Department, a significant portion of the Statement of Charges is based on current estimates of future costs which are not susceptible to audit verification. The Statement is also based on interpretations made by the Department's management relating to various provisions of the Water Supply Contract. Many of these interpretations are the subject of ongoing negotiations. In addition, Metropolitan's contract provides that any overpayment or underpayment, by reason of error in computation or other causes, shall be adjusted in the next succeeding year. Accordingly, the Statement of Charges issued to Metropolitan is a tentative billing which is subject to adjustment when final costs are known and when resolution of unsettled issues such as described in our reports and others are agreed upon.

In our opinion, except for the effects of such adjustments, if any, as might have been determined to be necessary if the matters described in the preceding paragraph were susceptible to audit verification, the 2009 Statement of Charges referred to in the first paragraph is fairly presented, in all material respects, in conformity with the provisions of Metropolitan's Water Supply Contract as we understand them.

This report is intended solely for the information and use of Metropolitan and the Department and is not intended to be and should not be used by anyone other than these specified parties.

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THE METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA 2009 STATEMENT OF CHARGES

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	Variable 1/	Minimum	Capital	Total
WATER SUPPLY CONTRACT				
Transportation Charge	\$ 240,700,015	\$151,928,317	\$ 60,674,996	2/ \$453,303,328
Off-Aqueduct Power				
Facilities Charge 1/		95,870,096		95,870,096
Delta Water Charge		37,192,593	29,659,402	66,851,995
East Branch Enlargement		6,664,332	30,918,616	37,582,948
Water System Revenue Bond Surcharge			36,495,874	36,495,874
Tehachapi Second Afterbay Facilities			4,157,709	4,157,709
DEVIL CANYON – CASTAIC CO	<u>ONTRACT</u>			
Operations and maintenance – Article 17(b)		7,361,019		7,361,019
Debt service on bonds				
– Article 17(a)			6,854,487	6,854,487
			TOTAL 3/	\$708,477,456

The accompanying report is an integral part of our presentation of the Statement of Charges.

- 1/ Based on a water delivery schedule of 1,711,500 acre-feet.
- 2/ Amounts typically reflect Urban Rate Reduction credits in the transportation charge and the Delta Water Charge as stated under Article 51 of the Monterey Amendment. However, the Department will not include these credits in the 2009 Statement of Charges until a study of the amount of credits that could be given is completed.
- 3/ Metropolitan pays the capital cost component in semi-annual payments and the minimum and variable cost components in monthly payments.

Note: The Department issued a revised 2009 Statement of Charges in December 2008. The amounts above do not reflect this revision. See page 3 for a comparison of these amounts to the December 2008 revision.

THE METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA COMPARISON OF THE 2009 STATEMENT OF CHARGES TO THE DECEMBER REVISION OF THE 2009 STATEMENT OF CHARGES (IN MILLIONS)

		Tr	ansporta	tion	Charge			D	elta Wa	ter (Charge	Eas	st Branch	Enla	rgement	,	Water		
					Off-											S	ystem		
				Αc	queduct											R	evenue		
	 Capital	M	inimum	M	inimum	_\	⁷ ariable	(Capital	Mi	inimum		Capital	Mi	inimum	I	Bonds	_	Total
2009 Statement of Charges dated July 1, 2008	\$ 71.7	\$	159.3	\$	95.9	\$	240.7	\$	29.6	\$	37.2	\$	30.9	\$	6.7	\$	36.5	\$	708.5
Revisions to estimated costs and error corrections	 (18.0)		(32.2)		(0.1)	_	2.8		(4.7)		(3.9)		(0.6)		0.3			. <u>—</u>	(56.4)
2009 Statement of Charges dated December 24, 2008	\$ 53.7	\$	127.1	\$	95.8	\$	243.5	\$	24.9	\$	33.3	\$	30.3	\$	7.0	\$	36.5	\$	652.1

THE METROPOLITAN WATER DISTRICT OF SOUTHERN CALIFORNIA COMPARISON OF THE 2008 AND 2009 STATEMENTS OF CHARGES (IN MILLIONS)

			Transporta	tion	Charge		D	elta Wa	ter C	harge	East Br	anch	Enlarg	ement	V	Vater		
				(Off-										S	ystem		
				Αq	ueduct										Re	evenue		
	C	apital	Minimum	Mi	nimum	Variable	C	apital	Mi	nimum	Capi	tal	Mini	mum	В	onds		Total
2008 Statement of Charges dated December 20, 2007	\$	60.7	\$ 118.4	\$	94.7	\$ 193.4	\$	21.4	\$	28.5	\$ 3	31.8	\$	3.7	\$	31.6	\$	584.2
Increase (decrease) due to changes in:																		
Estimated costs		0.4	35.7		(2.4)	30.9		5.5		8.2				0.8				79.1
Past cost adjustments		(0.1)	5.2			8.9				0.7	((1.6)		2.2				15.3
Change in debt service		3.8			4.8							0.7				4.9		14.2
Recovery generation						(3.8)		(0.6)		(0.2)								(4.6)
Allocations among contractors					(1.2)	11.3												10.1
Rebates under the Monterey Amendment		6.9						3.3									_	10.2
NET CHANGE		11.0	40.9		1.2	47.3		8.2		8.7	((0.9)		3.0		4.9		124.3
2009 Statement of Charges dated																		
July 1, 2008	\$	71.7	\$ 159.3	\$	95.9	\$ 240.7	\$	29.6	\$	37.2	\$ 3	0.9	\$	6.7	\$	36.5	\$	708.5

Comparison of the 2008 and 2009 Statements of Charges

As shown on the previous page, Metropolitan's 2009 charges increased by \$124.3 million compared to the December rebill of the 2008 Statement of Charges. The more significant of these changes are the result of the following items:

TRANSPORTATION CAPITAL: The increase of \$11 million in the transportation capital component is primarily due to the following:

Decrease in rate management rebates under the Monterey Amendment:

\$ 6.9 million

Rate management credits are unavailable in 2009, increasing charges by \$6.9 million

Change in debt service costs:

3.8 million

Financing for the Tehachapi Second Afterbay was completed, increasing annual charges \$4.0 million Refinancing for Devil Canyon Castaic debt lowered charges (0.2 million)

Other unidentified changes

0.3 million

TOTAL CHANGE IN TRANSPORTATION CAPITAL COMPONENT \$ 11.0 million

TRANSPORTATION MINIMUM: The increase in the transportation minimum component of \$40.9 million is the result of a \$35.7 million increase in cost estimates and a \$5.2 million decrease in the past cost adjustment. The net increase is due primarily to the following increases and decreases:

Changes in estimated costs:

<u>Inclusion of costs for the Delta Habitat Conservation and Conveyance Program charges</u> \$ 19.4 million

The Department included estimated costs totaling \$40 million for the Delta Habitat Conservation and Conveyance Program, which is in addition to the \$128 million of costs that are included in the Delta Water Charge.

Updated O&M cost estimates for 2008 and 2009

10.3 million

Cost estimates for 2008 and 2009 increased by \$12.7 million as a result of the Department updating its O&M cost estimates using revised cost projections. The costs were higher due to an increase in the average of the last three years' general O&M costs which is the basis for the estimate.

Update of estimated water gains and losses and reservoir storage level changes

6.5 million

The Department's estimate of water gains and losses and reservoir storage changes for 2008 and 2009 increased by \$8.4 million due primarily to expected higher 2008 year-end reservoir storage. The Department estimates the reservoir levels at Perris and Castaic will increase by 20,200 and 35,300 acre-feet, respectively, which results in an increase of \$6.7 million. In addition, the 2009 estimate of water gains and losses and reservoir storage changes increased by \$1.7 million because of an increase in projected energy rates.

Revision of transmission cost estimates for 2008 and 2009

6.3 million

The estimated transmission costs for 2008 increased by \$3.3 million from the prior year estimates and the 2009 estimated transmission costs were higher by \$10.9 million compared to 2008 due to anticipated changes to the PG&E rate structure.

Increase in estimated 2008 and 2009 costs for major O&M activities

0.7 million

The Department increased the estimates for planned major O&M activities by \$2.9 million for the entire Project. The cost increase is due to a combination of project deferrals, completions and changes in priorities.

Revisions to Municipal Water Quality Investigation (MWQI) program costs

0.5 million

Metropolitan's charges increased by \$0.5 million as a result of revisions to the costs of the MWQI program for 2007 through 2009.

Reduction of estimated 2009 costs for the Lodi Powerplant

(1.3 million)

Estimated planning costs for the proposed Lodi Powerplant were reduced \$2 million.

Reduction in Bay Delta Conservation Plan Costs

(1.4 million)

Estimated costs for the Bay Delta Conservation Plan were included in the 2008 Statement of Charges. However, no amounts were included in the 2009 Statement of Charges.

Change in State Government charges

(2.0 million)

Estimated State Government charges from other State agencies decreased \$3.6 million.

Decrease in technology improvement cost estimates for 2008 and 2009

(3.3 million)

Technology improvement estimates decreased by \$7.3 million related primarily to the following:

Technology improvement costs erroneously twice, overstating Metropolitan's charges by \$3.4 million.

\$8.1 million

Redesign and technology upgrade cost increases

Energy operation support cost decreases

3.0 million (4.6 million)

Aqueduct control system and centralized operations migration project

(13.5 million)

cost decreases

Total change in estimated costs 35.7 million

Change in past cost adjustments:

Revisions to actual water gains, losses and reservoir storage changes for 2006 and 2007

11.6 million

The Department's estimate of water gains and losses and reservoir storage changes for 2006 and 2007 were updated to reflect actual amounts. This change resulted in a \$12.2 million increase in costs. This increase was due to water data reflecting larger reservoir fills at Castaic than what was used last year. In 2007, the Department lowered Castaic reservoir for maintenance. The refill of approximately 108,000 acre-feet occurred too late in the year to be reflected in the 2008 charges.

MWQI Program costs were posted twice in the billing system

5.9 million

2005 correction of credits recorded in error in O&M cost centers

3.2 million

In the prior year, the Department incorrectly recorded \$4.9 million in credits to the transportation minimum component as a result of problems with the computerized assessment process. This error was corrected.

Impact of additional year of interest on prior over and underpayments

3.2 million

Update of 2005 through 2007 MWQI program costs

0.6 million

Update of 2007 transmission costs to actual

(1.2 million)

2006 correction of cost center allocation error

(3.7 million)

In our prior year audit, we noted the Department had incorrectly converted ten cost centers such that they were being allocated statewide instead of to Delta Facilities reaches. This error resulted in \$8.0 million in costs being incorrectly billed through the transportation minimum component. The correction was made in the 2009 Statement of Charges.

Adjustments of 2007 costs from estimates to actual

(6.1 million)

The Department overestimated the transportation minimum costs for 2007 in the prior year. The Department revised the estimates to actual amounts.

Revisions to 2007 and prior costs

(9.5 million)

The 2008 Statement of Charges included a \$9.5 million overpayment on Attachment 4B, which causes a decrease when compared to the 2009 Statement of Charges.

Other unidentified changes

1.2 million

Total change in past cost adjustments

5.2 million

TOTAL CHANGE IN TRANSPORTATION MINIMUM COMPONENT \$ 40.9 million

OFF-AQUEDUCT MINIMUM: The \$1.2 million increase in Metropolitan's off-aqueduct minimum component is due primarily to the following:

Change in debt service costs:

\$ 4.8 million

Scheduled debt service costs increased by \$7.0 million between 2008 and 2009 to finance major facilities improvements including the Reid Gardner No. 4 Powerplant.

Allocations among contractors:

(1.2 million)

Increases in other contractor water deliveries of 96,000 acre-feet resulted in a decrease in costs allocated to Metropolitan of \$1.2 million.

Change in estimated costs:

(2.4 million)

O&M costs at Reid Gardner decreased by \$7 million due to an anticipated outage in 2009 for maintenance. Estimated fuel costs decreased by \$0.6 million due to the plant using natural gas instead of diesel to operate. These decreases were offset by a \$4 million increase in coal costs because of an \$8.69 per-ton increase in estimated coal costs.

TOTAL CHANGE IN OFF-AQUEDUCT MINIMUM COMPONENT \$1.2 million-

TRANSPORTATION VARIABLE: The variable component increased by \$47.3 million between 2008 and 2009. This increase results from the following:

Changes in allocations among contractors:

Metropolitan's water deliveries south of the Tehachapis were increased

\$ 11.3 million

The major factor contributing to the increase in Metropolitan's share of energy costs is that the Department shifted 79,382 acre-feet of Metropolitan's deliveries from Semitropic storage over the Tehachapis to East Branch reaches, which increased Metropolitan's variable charges by \$10.5 million.

Changes in estimated costs:

Increased net power cost estimates for 2009

30.9 million

The increase in the Department's net power costs consists of the following:

Increase in power costs	\$43.9 million
Increase in power sales	(5.4 million)
Decrease in transmission costs	(0.3 million)
	38.2 million

In determining the variable charges for 2009, the Department prepared the power cost study assuming the delivery of 2.05 million acre-feet of water, even though contractor delivery requests were 3.68 million acre-feet. This approach was discussed with the Energy Subcommittee of the State Water Contractors and was intended to calculate a mill rate per kilowatt-hour that was more realistic than a mill rate that would have resulted from using 3.68 million acre-feet. The resulting rate was 43.28 mills per kilowatt-hour, which is an increase of 4.49 mills per kilowatt-hour compared to the 2008 rate of 38.79 mills. The mill rate increased due to:

Increases in costs for long-term purchase energy	46%
Increases in costs for short-term purchased energy	5%

These cost increases were partially offset by:

Increases	ın	Hyatt-Thermalito	and	other	SWP	recovery	generation	
credits								6%
Increases	in s	sales of energy						6%

The purchased energy increased primarily because of an increase in the rate for short-term power purchases.

Changes in the past cost adjustment:

Revision of 2007 from estimated to actual power costs

(19.5 million)

The 2007 variable charges decreased as a result of an adjustment of the 2007 payment amount to actual, and a decrease as a result of the actual power sales being higher than the amount estimated in the prior year. These increases were partially offset by an increase in power purchases and a reduction in the amount of energy required by the pumping plants. In addition, Metropolitan's actual water deliveries for 2007 were 497,118 acre-feet less than the amount estimated in the prior year.

Revision of 2008 estimated power costs

30.3 million

The 2008 charges increase because Metropolitan underpaid for this year, primarily as a result of the Department shifting 247,682 acre-feet of Metropolitan's water deliveries to storage north of the Tehachapis in last year's estimate of 2008 charges, whereas the deliveries are now assumed to be taken south of the Tehachapis.

Additional year of interest in calculation of overpayment on Attachment 4C

(1.4 million)

Other unidentified changes

(0.5 million)

Total change in past cost adjustments

8.9 million

Changes in recovery generation credits:

(3.8 million)

Recovery generation credits increased primarily because of increased deliveries to Metropolitan on the East Branch, which was partially offset by a decrease of deliveries through the West Branch.

TOTAL CHANGE IN TRANSPORTATION VARIABLE COMPONENT \$ 47.3 million

DELTA WATER CHARGE CAPITAL: The increase of \$8.2 million in the Delta Water Charge capital component is primarily due to the following:

Changes in estimated costs:

Increase in estimated capital project costs for 2008 through 2013

\$5.8 million

Estimated conservation-related costs increased due primarily to the following:

Inclusion of Four Pumps Agreement, amendment four, costs for mitigation projects, including land purchases. Metropolitan and the other contractors have informed the Department that they do not support this proposed amendment Hyatt-Thermalito Units 2, 4 and 6 refurbishment costs were removed

\$ 4.7 million

Hyatt-Thermalito Units 2, 4 and 6 refurbishment costs were removed from the conservation replacement charge.

0.6 million

Engineering cost estimates increased significantly, which we determined to be an error.

0.6 million

Increased cost estimates for projects under the "Settlement Agreement for Licensing of the Oroville Facilities", especially in 2009 and 2010

0.2 million

Increase in Delta facilities projects, primarily due to the inclusion of cost estimates for the Sherman and Twitchell Island fishscreens

0.1 million

Temporary Barriers Program costs were removed in the 2009 Statement of Charges

(0.4 million)

Actual 2007 costs were lower than estimated

(0.3 million)

Delta Facilities were \$3.0 million less than budgeted and costs of \$5.4 million for the temporary barriers program moved to the minimum component. Also, FERC relicensing costs and Oroville Field Division O&M Center facilities expansion were \$1.6 million less than estimated.

Total change in estimated costs

5.5 million

Changes in the capital credit for Hyatt-Thermalito:

(0.6 million)

Debt services costs totaling \$29.5 million related to the issuance of debt to fund the costs of the refurbishment of Units 2, 4 and 6 at the Hyatt-Thermalito Powerplant were added.

Decrease in rate management rebates under the Monterey Amendment:

3.3 million

TOTAL CHANGE IN DELTA WATER CHARGE CAPITAL COMPONENT

DELTA WATER CHARGE MINIMUM: The increase of \$8.7 million in the Delta Water Charge minimum component is primarily due to the following:

Changes in estimated costs:

Inclusion of costs for the Delta Habitat Conservation and Conveyance Program charges

\$ 3.7 million

Estimated costs for the Delta Habitat Conservation and Conveyance Program, totaling \$128 million, represent 100% of the planning costs for this program. The Department and the contractors are anticipating that the Central Valley Water Project contractors will pay 50% of these costs. The reduction will be reflected in the rebill.

Increased O&M cost estimates for 2011 to 2035

2.5 million

The Department increased the Delta and San Luis facilities extraordinary O&M cost estimates by \$156.8 million.

Increase in estimated 2008 through 2010 costs for major O&M activities

1.6 million

O&M project costs increased for Gianelli butterfly valve replacement and aqueduct canal liner repairs at San Luis.

Update of 2007 costs from estimates to actual

0.3 million

Actual costs increased by \$5.4 million for temporary barriers that were budgeted as capital costs and included in the capital component of the Delta Water Charge in the prior year, while actual costs were included in the minimum component of the 2009 Delta Water Charge. In addition, an increase of \$3.5 million is due to prior year estimates exceeding actual costs.

Updated O&M costs estimated for 2008 through 2010

0.1 million

O&M cost estimates increased as a result of a \$54.6 million increase in the average of historical costs for the last three years, upon which these estimates are based, including a 5% escalation factor.

Change in technology improvement cost estimates for 2008 through 2010

0.1 million

The Department erroneously reflected technology improvement costs twice, resulting in \$4.4 million of costs being double counted.

Removal of Bay Delta Conservation Plan costs

(0.2 million)

Costs decreased by \$5.9 million due to the Department crediting the Delta Water Charge for 2007 and 2008 Bay Delta Conservation Plan estimated charges that were included in the transportation minimum component in Attachment 9, instead of being billed through the Delta Water Charge.

Other unidentified changes

0.1 million

Total change in estimated costs

8.2 million

Changes in past cost adjustments:

Reclassification of 2005 and 2006 Gianelli Pumping and Generating Plant Costs

0.6 million

Energy costs associated with the Gianelli Pumping and Generating Plant were not coded correctly in the billing system, resulting in costs totaling \$19 million being incorrectly excluded from prior Statements of Charges.

2006 correction of cost center allocation error

0.2 million

Correction of a prior year error which the Department incorrectly converted ten cost centers such that they were being allocated statewide, including the Oroville Division, instead of to Delta Facilities reaches.

2005 correction of credits recorded in error in O&M cost centers

0.1 million

In our prior year the Department incorrectly recorded \$1.2 million in credits to the Delta Water Charge minimum component as a result of problems with the computerized assessment process. This error was corrected.

Other unidentified changes

(0.2 million)

Total change in past cost adjustments

0.7 million

Changes in the operating credit for Hyatt-Thermalito:

(0.2 million)

Oroville power revenues increased due to increased estimates for O&M and FERC relicensing costs, which are recorded as a credit in the Delta Water Charge and a charge in the variable component. In addition, for 2035 a \$5.0 million input error resulted in a \$0.1 million overstatement.

TOTAL CHANGE IN DELTA WATER CHARGE MINIMUM COMPONENT \$ 8.7 million

EAST BRANCH ENLARGEMENT MINIMUM: The East Branch Enlargement minimum component increased by \$3.0 million between 2008 and 2009 due to the following:

Changes in past cost adjustment:

\$ 2.2 million

Costs increased primarily due to an increase from estimated to actual costs of \$1.2 million for 2007 and an increase in cost estimates of \$0.7 million for 2008. The inclusion of interest on these underpayments results in an additional increase of \$0.3 million.

Change in estimated minimum costs:

0.8 million

TOTAL CHANGE IN EAST BRANCH ENLARGEMENT MINIMUM COMPONENT

\$ 3.0 million

WATER SYSTEM REVENUE BOND SURCHARGE: The Water System Revenue Bond Surcharge increased by \$4.9 million as a result of the following:

Change in debt service costs:

\$4.9 million

Surcharge increased due to the inclusion of estimated debt service payments totaling \$12 million for 2009 for Series AE as well as an increase in scheduled debt service payments for Series Z of \$1.3 million.

TOTAL CHANGE IN WATER SYSTEM REVENUE BOND SURCHARGE \$4.9 million

Future Potential Refunds and Adjustments

Metropolitan's estimated 2009 charges of \$708 million do not include certain credits, refunds and adjustments that are expected in 2009 as part of the Department's normal accounting and billing process. The refunds below are expected to reduce Metropolitan's 2009 billings by approximately \$39.5 million for the following items:

	Estimated Refund Date		
Cover – Off-Aqueduct July – December 2007 January – June 2008	April 2009 October 2009	\$ 3,285,000 3,929,000	\$ 7,214,000
Cover – Water System Revenue Bond (WSRB) January 2008 July 2008	April 2009 October 2009	6,697,000 6,697,000	13,394,000
Cover – East Branch Enlargement (EBE) March 2008 September 2008	April 2009 October 2009	3,025,000 3,025,000	6,050,000
Cover – Tehachapi Second Afterbay March 2008 September 2008	April 2009 October 2009	19,000 20,000	39,000
Federal Securities Earnings January – June 2009 July – December 2009	September 2009 March 2009	256,000 256,000	512,000
SMIF Interest – Off-Aqueduct January – June 2009 July – December 2009	September 2009 March 2009	915,000 915,000	1,830,000
SMIF Interest – WSRB January – June 2009 July – December 2009	September 2009 March 2009	1,000,000 1,000,000	2,000,000
SMIF Interest – EBE January – June 2009 July – December 2009	September 2009 March 2009	324,000 324,000	648,000
SMIF Interest – Reserve Account January – June 2009 July – December 2009	September 2009 March 2009	1,908,000 1,908,000	3,816,000
Devil Canyon and Tehachapi Second Afterbay 2008 EBE debt service 2008 Tehachapi debt service	May 2009 May 2009	3,863,000 168,000	4,031,000
TOTAL ESTIMATED REFUND			\$ 39,534,000

In addition, the 2009 variable and off-aqueduct charges may be reduced further if 2009 costs are determined to be overstated during the year. Also, amounts described in this section are in addition to the other credits, refunds and adjustments related to audit findings that are summarized on page 22.

UNRESOLVED ISSUES RELATED TO THE 2009 STATEMENT OF CHARGES

During our audit, we encountered a number of issues related to the calculation of various components of the 2009 Statement of Charges that need to be addressed by the Department. Some of these issues result in errors in the Statement of Charges.

Rebill of the 2009 Statement of Charges. The Department has identified several adjustments to the original 2009 Statement of Charges that are expected to be reflected in a rebill in December 2008. The rebill will reflect actual Series AE Water System Revenue Bond debt service amounts, remove Delta Habitat Conservation and Conveyance Program (DHCCP) charges previously included in the Delta Water Rate calculation, reduce DHCCP estimates included in the transportation minimum component, eliminate MWQI costs billed twice and correct the amount billed through the Statement of Charges, include the PG&E rate settlement adjustment in the variable charges and reduce the transportation and conservation components for amounts originally included, remove \$200 million of estimated costs included in the Delta Water Charge for the projects anticipated by the Four Pumps Agreement proposed Fourth Amendment, add Bay Delta Conservation Plan charges, increase the transportation replacement charges to reflect actual costs for 2007, reduce technology improvement cost estimates incorrectly included twice in the original Statement of Charges and apply Springing Amendment credits totaling \$30 million to the transportation capital charges.

Reallocation of Recreation Costs. In December of 2005, Metropolitan filed a claim with the State Victim Compensation and Government Claims Board that included, among other things, a contention that the Department inappropriately included, in Metropolitan's bills, charges for the recreation and fish and wildlife enhancement portion of facilities financed with Water System Revenue Bonds. As a partial solution for funding recreation debt service costs, the Department revised the recreation allocation percentage for certain Delta facilities costs from 14% to 3.3% for minimum and 3.4% for capital, which shifted additional costs retroactively to Metropolitan and the other contractors. The Department believes this change better reflects the purpose of these facilities and their recreation and fish and wildlife enhancement cost structure. In addition, the Department secured a \$29.6 million loan from the Pooled Money Investment Account (PMIA) to fund the remaining financed recreation costs. The Department has pledged revenues from the State Water Facilities Capital Account and all amounts remaining, if any, after the Water Contractor rate reduction credits. Future recreation capital costs will be funded from the Capital Facilities Account and reimbursements from the General Fund. However, the Department projects that this account will be in a deficit position by 2010.

Accounting System Upgrade. Since the implementation of the new SAP/CARA computerized accounting system in 2000, the Department has been unable to produce a Water System Revenue Bond Surcharge calculation. As a result, the Department has billed the contractors the estimated WSRB Surcharge amounts that were included in the 2000 Statement of Charges, Attachment 3, which was calculated in 1999. In addition, effective July 1, 2006, the Department converted from the SAP Legacy system to SAP Next Wave in order to upgrade to a more updated computerized accounting system. The Department determined that the system was not functioning properly at the time the 2008 Statement of Charges was prepared and computed certain components outside of the CARA system. The Department indicated that the SAP system was not used to prepare the 2009 Statement of Charges for certain components due to time constraints. In the 2009 Statement of Charges we also noted a change in the method of including fish replacement charges in the contractors' variable component. The system problems also delayed producing the B–Tables, which summarize project costs.

<u>Springing Amendment</u>. On April 1, 2002, the Department amended provisions of the General Bond Resolution relating to the Debt Service Reserve Account, reducing the Reserve Account Requirement. Initial analysis by the Department's Fiscal Services Office indicates that the total reduction is approximately \$72 million. The Department and contractors have agreed that refunds of excess debt service reserve will offset DHCCP charges.

<u>Variable Component Billings</u>. Since the implementation of SAP, the Department has had difficulty calculating the water table redistribution entries that reallocate costs between the minimum, variable and Delta Water Charge components for water gains and losses and changes in reservoir storage within the SAP system. We were able to recalculate the Department's downstream allocation, except that the Department did not use the most current summary of annual water quantities conveyed through each pumping and power recovery plant of project transportation facilities in the calculation of the downstream allocation. In addition, we noted significant inconsistencies between Table B–3, which reports the actual energy related costs for each pumping and recovery plants, with the costs allocated to the contractors on Table B–12.

Replacement Fund Balance. During our audit of the 2009 Statement of Charges, we noted that the conservation portion of the Replacement Fund has not been replenished for Hyatt-Thermalito refurbishment costs collected through the variable component.

<u>Delta Fish Agreement Amendment Four.</u> An agreement was signed between the Department and the Department of Fish and Game (DFG) on December 30, 1986 to provide payments to offset fish losses caused by operations in the Delta. The Department is currently negotiating to amend the 1986 Agreement for a fourth time; however, the contractors have informed the Department that they are unable to support the proposed amendment and will oppose efforts by the Department to fund the activities described in the

amendment. In the Delta Water Charge component of the 2009 Statement of Charges, the Department included \$200 million to pay for new projects and for the acquisition of mitigation lands.

East Branch Enlargement. During April 1986, Metropolitan and the Department entered into Amendment No. 19, known as the East Branch Enlargement Amendment, to the basic Water Service Contract which established the basis for repayment of the costs of enlarging the East Branch of the California Aqueduct. The Enlargement work was in addition to the Mojave Division modification to correct the basic capacity deficiency. The methodology used by the Department to allocate costs to the Enlargement and the modification is still considered an interim or temporary approach that has not been officially accepted by the contractors. The Department has indicated that consideration will be given to Metropolitan's concerns while developing the revised East Branch Enlargement allocation methodology.

TABLE A

Summary of Settled Audit Findings Resulting in Changes to the 2009 Statement of Charges

Throughout the year, we worked with Metropolitan's representatives and the Department to resolve audit exceptions. The following is a brief summary of the items resolved during 2008 which affected the 2009 Statement of Charges. A more detailed description of these items starts on page 23.

	Effect on Metropolitan's 2009 Costs
Items	Increase (Decrease)
Previously Reported Findings	
1. Delta facilities costs totaling \$5,727,000, incorrectly distributed statewide is prior year, were properly billed through the conservation minimum charges. (to page 23)	
 A \$1,726,000 payment received from the Los Angeles Department of Water Power (LADWP) for a portion of the operating costs of the Angeles Tunnel credited to the contractors. (Refer to page 24) 	
3. The final year-end allocation of 2005 off-aqueduct costs included the most cu water delivery and cost information, reducing charges to contractors by an estir \$2.1 million (Refer to page 24).	
4. The 2007 debt service amount for Devil Canyon Second Afterbay was corre (Refer to page 24)	ected. (295,000)
5. Estimated FERC costs for 2006 were adjusted to actual amounts in computing t year historical average used in the Delta Water Rate calculation. (Refer to page	
6. The Rate Reduction Credit included in the rebill of the 2008 Statement of Ch properly included the Department's adjustment to remove the permanent transferentitlement water from the 2005 and 2006 credits. (Refer to page 24)	•
7. Lake Perris mitigation cost projections totaling \$797,000 were properly rem from the contractors' bills. (Refer to pages 24 and 25)	noved (47,000)
8. Credits were recorded to reflect payments totaling \$1,207,000 from the USB reimbursement of Suisun Marsh costs. (Refer to page 25)	R for (37,000)
9. Credits totaling \$49,000 for wheeling water transactions were recorded in the accounting system. (Refer to page 25)	e cost (9,000)
10. Coastal Branch Reach 33A charges included in the 2007 variable component corrected. (Refer to page 25)	were (1,000)
 Oroville flood control charges for 1999 through 2006 totaling \$275,000 properly recorded and included in the Delta Water Rate calculation. (Refer to 25) 	

	Effect on
	Metropolitan's
	2009 Costs
Items	Increase (Decrease)
12. Cost and water delivery information used in the computation of the 2004 off-aqueduct charges were corrected. (Refer to page 25)	\$ 36,000
13. A credit entry incorrectly posted to the transportation minimum charges due to a data conversion error has been removed. (Refer to page 25)	201,000
14. Transportation replacement cost estimates totaling \$975,000 for the Dos Amigos Pumping Plant were properly included in the computation of the transportation replacement charges. (Refer to page 26)	404,000
15. The 2008 variable fish replacement charge, which was omitted in the prior year, was included in the computation of the variable component. (Refer to page 26)	1,346,000
16. Credits totaling \$6,437,000 have been properly removed from the computation of the Delta Water Rate and transportation minimum charges. (Refer to page 26)	3,423,000
NET BENEFIT	\$ (1,983,000)

TABLE B

Summary of Audit Findings Projected to Result in Changes to the 2010 Statement of Charges

Throughout our examination, we worked with Department and Metropolitan representatives to resolve findings which arose during our audit of the 2009 Statement of Charges. We will work with the Department to ensure the correction of these findings in the 2010 Statement of Charges. The items are discussed in detail starting on page 26 of this report. The items are summarized as follows:

	Effect on Metropolitan's 2010 Costs
Items	Increase (Decrease)
New Findings	
1. The downstream reallocation of costs totaling \$10,034,000 was not reflected variable component calculation. (Refer to page 26)	in the \$ (8,027,000)
2. Costs totaling \$8,538,000 for Gorman Creek Improvement Channel emergrepairs were included in the transportation minimum component instead of transportation capital component. (Refer to page 26)	
3. MWQI costs for 1999 through 2004 were incorrectly posted twice in the b system. (Refer to page 26)	illing (5,853,000)
4. Variable energy charges, billed outside of the SAP accounting system overstated by approximately \$324,000 for 2006 and by \$5,663,000 for 2007 is 2009 Statement of Charges. (Refer to page 27)	
5. Technology improvement cost estimates of \$15,589,000 were included twice in Delta Water Charge and estimates of \$8,055,000 were included twice in transportation minimum charges. (Refer to page 27)	
6. Special engineering cost estimates for 2008 through 2013 were overstate \$63,928,000 in the calculation of the Delta Water Charge capital and transpor capital components. (Refer to page 27)	
7. Deliveries of 5,000 acre-feet taken from storage in the San Joaquin Valley billed as if they were delivered from the Delta. (Refer to page 27)	were (73,000)
8. The fish replacement charge unit rate computed for 2008 was used for calculated the 2009 charge, resulting in a \$90,000 overstatement of the variable composite (Refer to page 27)	
9. Oroville revenues included in the Delta Water Rate calculation for 203 overstated by \$4,960,000 as a result of an input error. (Refer to page 27)	5 are 44,000
10. Costs totaling \$111,000 for Division of Environmental Services relocation incorrectly omitted from the transportation minimum component. (Refer to page	
11. MWQI charges billed through the Statement of Charges were overstated. (Repage 27)	fer to 73,000

Items

Effect on Metropolitan's
2010 Costs
Increase (Decrease)

Previously	Reported	Findings
I ICVIOUSIV	Kebortea	Tillulligs

Previously Reported Findings	
12. Hyatt-Thermalito operating costs for 1998, 1999, 2004, 2005, 2006 and 2007, included in the computation of the variable charges, were overstated \$6,771,000 and credits for Hyatt-Thermalito operating costs included in the Delta Water Charge were overstated by \$9,408,000. (Refer to page 28)	\$ (5,561,000)
13. Water table redistribution entries for 2006 and 2007 to allocate costs between the minimum and variable charges were calculated using outdated water information. (Refer to page 28)	(4,716,000)
14. Coastal Extension debt service charges were erroneously included in the 2008 and 2009 variable components instead of the Coastal Branch Reach 33A charges. (Refer to page 28)	(1,846,000)
15. Delta cross channel pilot study costs and other Delta-related costs totaling \$2,961,000 have been allocated statewide instead of through the Delta Water Charge. (Refer to page 28)	(1,817,000)
16. Adjustments related to 2008 and 2009 Thermalito Diversion Dam Powerplant capital cost repayment amounts totaling \$1,426,000 were erroneously included twice in the variable component. (Refer to page 28)	(1,140,000)
17. Metropolitan's November and December 2006 variable payments totaling \$940,000 were improperly excluded from the 2006 payment amount and the 2007 payment is understated by \$5,000 on Attachment 4C. (Refer to page 28)	(1,081,000)
18. Peaking credits totaling \$1,884,000 for 1998 and 1999 were excluded from the computation of the variable component. (Refer to pages 28 and 29)	(1,080,000)
19. Hyatt-Thermalito Units 1, 3 and 5 refurbishment costs included in the variable component appear to be overstated by \$1,190,000 due to the use of outdated costs. (Refer to page 29)	(952,000)
20. Final energy costs for 1998 were not recorded or were recorded incorrectly in the bills. (Refer to page 29)	(906,000)
21. Credits totaling \$2,606,000 for wheeling water transactions were not recorded in the cost accounting system. (Refer to page 29)	(566,000)
22. The Los Angeles Department of Water and Power (LADWP) peaking credit was excluded from the computation of the 2005 variable component. (Refer to page 29)	(470,000)
23. Costs totaling \$73.6 million, partially allocated to recreation prior to the implementation of SAP, were billed entirely to the conservation minimum component. (Refer to pages 29 and 30)	(345,000)
24. Costs incurred at the Oroville facilities associated with FERC relicensing for 1999 to 2007, were excluded or misstated in the transportation variable charges and the Delta Water Charge. (Refer to page 30)	(310,000)

Items	Mo	Effect on etropolitan's 2010 Costs ease (Decrease)
25. Lake Perris mitigation project costs for 2005 to 2007 totaling \$3,400,000 were allocated to the contractors instead of to the recreation purpose. (Refer to page 30)	\$	(212,000)
26. The adjustment to the 2007 rate management credit to correct errors in previous credits was understated by \$79,000. (Refer to page 30)		(79,000)
27. Hyatt-Thermalito operating costs, included as a credit in the Delta Water Charge, were understated \$2,968,000 for 2008 and overstated by \$637,000 for 2009. (Refer to page 30)		(73,000)
28. Recovery generation credits for San Luis, Devil Canyon and Warne Powerplants for 1998 were misstated by \$396,000. (Refer to pages 30 and 31)		(22,000)
29. Power costs were understated and recovery generation credits were overstated by \$267,000 due to an incorrect 2002 Alamo mill rate and the use of an outdated 1999 San Luis amount. (Refer to page 31)		(10,000)
30. Gianelli Pumping Plant replacement costs totaling \$167,000 were improperly included in the calculation of the Delta Water Charge. (Refer to page 31)		(8,000)
31. Payments received from the USBR totaling \$166,000 for San Luis were not recorded in the accounting system. (Refer to page 31)		(7,000)
32. Power costs and revenues, transmission, station service and peaking costs totaling \$31,747,000 for 1999 through 2005 were not recorded or were recorded incorrectly in the accounting system. (Refer to page 31)		61,000
33. Minimum transmission costs for 2006 and 2007 were understated by \$207,000 and station service charges for 2006 were overstated by \$36,000. (Refer to page 31)		111,000
34. Debt service amounts for the Tehachapi Second Afterbay were understated by \$1,367,000 for 2008 and overstated by \$1,038,000 for 2009 in the calculation of the variable component. (Refer to page 31)		263,000
35. The 2007, 2008 and 2009 recovery generation amounts for Alamo and Mojave Siphon included in the variable component calculation are understated by \$7,149,000. (Refer to page 32)		432,000
36. Outdated debt service amounts were used to determine the Devil Canyon Second Afterbay charges for 2004, 2005 and 2008 in the variable component. (Refer to page 32)		542,000
37. Incorrect wheeling credits, contractor payments and water amounts, and an error in the calculation of the present value of water resulted in an \$823,000 understatement to the variable fish replacement charge. (Refer to page 32)		659,000
38. Replacement costs for 2005 through 2007 used to calculate the variable replacement charge were understated by \$2,465,000 due to the use of outdated cost information. (Refer to page 32)		2,176,000
NET BENEFIT	\$ (47,595,000)

TABLE C

Summary of Audit Findings Resulting in Credits, Refunds and Adjustments

Audit findings affect not only the Statement of Charges but also the amounts of credits, refunds and adjustments the Department issues to Metropolitan. The following is a brief summary of the items found during our audit that affect credits, refunds and adjustments. A more detailed description of these items starts on page 32.

Items	Effect on Metropolitan's 2010 Costs Increase (Decrease)
Previously Reported Findings	
1. Incorrect costs were used to compute the 1992 WSRB Surcharge and an inconsistent project purpose split was used to compute the 1990 to 1993 WSRB Surcharge. (Refer to page 32)	
2. Certain Coastal Branch capital cost repayment amounts were excluded from the computation of the 2000 WSRB Surcharge. (Refer to page 32)	(632,000)
NET BENEFIT	\$ (1,287,000)

DISCUSSION OF OUR SERVICES, AUDIT FINDINGS AND GENERAL COMMENTS

In conformity with the contract between The Metropolitan Water District of Southern California (Metropolitan) and Richardson & Company, we have audited the 2009 Statement of Charges submitted to Metropolitan by the State of California Department of Water Resources (Department).

Scope of the Assignment. The primary service we perform for Metropolitan is the audit of the annual Statement of Charges under Metropolitan's Water Service Contract with the Department. In addition to our audit work, we perform special projects as requested by Metropolitan's staff in areas such as investigating financial and accounting matters, disputes over Department policy and in negotiating contract amendments and administrative changes in the Department's management of the State Water Project. We also participate with Metropolitan in water contractor meetings that serve as a forum for resolving accounting, billing and budgeting issues, including meetings of the State Water Contractor (SWC) Audit-Finance Committee and progress meetings with Metropolitan staff to discuss audit findings.

Reporting. The more significant findings and results of our audit, special projects work and participation in meetings are presented in two reports prepared after the completion of our annual audit: a comprehensive report that serves as a working document between the auditors, Department and Metropolitan staff and a summary report that is provided to Metropolitan's Board of Directors and management addressing the results of our audit.

<u>Audit Findings</u>. Our goal is to provide Metropolitan with a thorough audit. The engagement is divided into forty-four separate areas and fieldwork is completed primarily from April through October. Computer auditing techniques are used to test posting, mathematical accuracy and select samples from data files. The following are the more significant findings of our audit. The changes reflected in the 2009 Statement of Charges are summarized in Table A on pages 17–18, those projected to be reflected in the 2010 Statement of Charges are summarized in Table B on pages 19–21 and those that will affect credits, refunds and adjustments are summarized in Table C on page 22.

Findings Resulting in Changes to the 2009 Statement of Charges:

• The allocation of ten conservation cost centers was changed upon a system conversion, which resulted in \$5,727,000 being incorrectly billed through the transportation minimum component instead of through the Delta Water Charge. The Department has corrected this error and Metropolitan's transportation minimum charge decreased by \$3,723,000, while the Delta Water Charge increased by \$180,000 in the 2009 Statement of Charges. (TABLE A, Item 1)

- The Department did not record a credit in the cost accounting system for payments totaling \$1,726,000 received from the Los Angeles Department of Water and Power (LADWP) for operation and maintenance costs for the Angeles Tunnel in the 2008 Statement of Charges. This credit was properly recorded in the 2009 Statement of Charges, which resulted in a decrease of \$1,605,000 to Metropolitan's transportation minimum component. (TABLE A, Item 2)
- The preliminary year-end allocation of 2005 off-aqueduct costs prepared in November 2006 did not include the most current O&M, transmission and fuel costs for Reid Gardener or the latest water delivery information. An updated summary of 2005 charges prepared by the accounting department in June 2007 indicated an additional decrease in costs of \$2.1 million. The Department issued a study reflecting the updated cost and water amounts, resulting in a refund to Metropolitan of approximately \$1.6 million. (TABLE A, Item 3)
- Our comparison of the debt service costs included in the Devil Canyon Second Afterbay Charge to the debt service schedule indicated that 2007 costs, overstated in the prior year by \$369,000, have been corrected for the 2009 Statement of Charges. The correction resulted in a decrease to Metropolitan's variable component of \$295,000. (TABLE A, Item 4)
- To project future minimum costs used in the computation of the Delta Water Rate, the Department averages the most recent three years of actual conservation minimum costs. The amount is then reduced by actual extraordinary costs incurred in those years and estimates for extraordinary costs expected to occur in the Statement of Charges year are added to the average. During our review of this calculation in the 2008 Statement of Charges, we noted that the amount of FERC costs reversed for 2006 were understated by \$4,192,000, to arrive at the adjusted 2006 costs included in the escalated three-year average. This error was corrected and results in the decrease of Metropolitan's Delta Water Charge by \$134,000 in the 2009 Statement of Charges. (TABLE A, Item 5)
- The Department corrected the allocations for 2005 and 2006 rate management credits as a part of the calculation of the 2008 credits, resulting in an increase of \$130,000. (TABLE A, Item 6)
- The Department included future estimates of \$797,000 for recreation and fish and wildlife projects at Perris Reservoir, such as sand for swim beach expansion, an ADA fish site, marina repair, and an irrigation system for park vegetation in the 2008 Statement of Charges. The reservoir level was lowered to address public safety concerns related to the stability of Perris Dam in the event of a major earthquake. These expenditures were to facilitate easy access for park users to the water for recreation, and maintain and enhance wildlife habitat and have no apparent water supply purpose. These costs were being allocated as 94.3% to the water supply Project purpose, rather than 100% to the recreation Project purpose. The Department excluded all

future estimates related to these projects from the 2009 Statement of Charges, which reduces Metropolitan's 2009 and future transportation capital components by \$47,000 per year. (TABLE A, Item 7)

- During our prior year audit, we determined that credits were not recorded in the cost accounting system for payments received from the USBR for Suisun Marsh totaling \$1,207,000. These payments have been recorded, resulting in a decrease in Metropolitan's 2009 Delta Water Charge of \$37,000. (TABLE A, Item 8)
- We noted 2004 water deliveries totaling 19,538 acre-feet for the wheeling of non-entitlement water that were not billed and credited to the contractors in previous Statements of Charges have now been properly billed and credited, resulting in a decrease in the power costs allocated to the water contractors. The estimated impact of this correction on Metropolitan's 2009 Statement of Charges is a reduction of \$9,000. (TABLE A, Item 9)
- In a prior year audit, we reported that the Department included an incorrect Coastal Branch Extension debt service amount of \$3,241,000. All but \$1,000 was corrected for the 2008 Statement of Charges. This remaining overbilling was corrected for 2009, resulting in a reduction to Metropolitan's transportation variable charge of \$1,000. (TABLE A, Item 10)
- In our prior year audit, we noted that the Department did not prepare entries to allocate Oroville flood control costs to the contractors, so costs for 1999 through 2006, totaling \$275,000, were excluded from the 2008 Statement of Charges, resulting in an understatement to Metropolitan's Delta Water Charge of \$8,000. The Department has recorded these amounts in the 2009 Statements of Charges. (TABLE A, Item 11)
- We reviewed the Department's revised final year-end allocation of 2004 off-aqueduct costs and determined that the updated costs and water delivery information was used, which corrected errors we reported in our prior year report. The correction of the cost and water information resulted in an additional charge to Metropolitan of \$36,000. (TABLE A, Item 12)
- During our prior year testing, we noted that, due to a data conversion error, a credit entry totaling \$309,000 was incorrectly posted to an expense account that is included in the billings to the contractors. We determined that this error was corrected, resulting in a \$201,000 increase in Metropolitan's transportation minimum component in the 2009 Statement of Charges. (TABLE A, Item 13)

- In the 2008 Statement of Charges, the Department's calculation of the transportation replacement charges excluded \$975,000 of estimated replacement costs for 2007 and 2008 related to the Dos Amigos Pumping Plant. The estimates for Dos Amigos were properly included in the 2009 Statement of Charges, which results in a \$404,000 increase in Metropolitan's transportation variable component. (TABLE A, Item 14)
- The fish replacement charge, omitted from the 2008 Statement of Charges has been included in the 2009 Statement of Charges, which results in an increase to Metropolitan's variable charges by \$1,346,000. (TABLE A, Item 15)
- An error noted in our prior year audit, in which credits totaling \$7,025,000 were posted in error as a result of problems with the computerized assessment process has been corrected. As a result, Metropolitan's conservation and transportation minimum components increased by \$43,000 and \$3,380,000, respectively, in the 2009 Statement of Charges. (TABLE A, Item 16)

Findings Projected to Result in Changes to the 2010 Statement of Charges:

New Findings

- Although the Department is now utilizing the SAP system to calculate the downstream distribution that reallocates costs between the minimum and variable components for water gains and losses and changes in reservoir storage, because the Department billed the variable component outside of the SAP system in the 2009 Statement of Charges for the years 2006 and 2007, the entries to record the downstream distribution of costs calculated by SAP were not included in the contractors' variable charges, as they were for the minimum component, resulting in an overstatement of Metropolitan's variable component by \$8,027,000. (TABLE B, Item 1)
- The Department included \$8,538,000 of estimated and actual costs for Gorman Creek Improvement Channel emergency repairs in the 2009 Statement of Charges. The Department considers the inclusion of these costs in the transportation minimum component proper because they believe that the repair work is to bring the facility back to normal conditions and is not a betterment. However, these repairs appear to meet the qualifications for capitalization under the Department's capitalization policy. The inclusion of these costs in the transportation minimum component overstates Metropolitan's transportation minimum component by \$7,692,000 and understates the transportation capital component by \$483,000 in the 2009 Statement of Charges. (TABLE B, Item 2)
- MWQI costs for 1999 through 2004 were included twice in the billing system, resulting in an overbilling to Metropolitan's transportation minimum charge of \$5,853,000 in the 2009 Statement of Charges. (TABLE B, Item 3)

- The variable calculated component for 2006 and 2007 was not calculated using the power costs and sales from the SAP accounting system. We estimate that the variable charges are overstated by \$5,987,000, resulting in an overbilling of \$4,789,000 to Metropolitan's transportation variable component in the 2009 Statement of Charges. (TABLE B, Item 4)
- When compiling the 2008 and 2009 estimates for technology improvement projects, the Department included certain estimates in the 2009 Statement of Charges twice. This error overstated Metropolitan's Delta Water Charge and transportation minimum components by \$123,000 and \$3,438,000, respectively. (TABLE B, Item 5)
- Special engineering cost estimates for 2008 through 2013 were overstated by \$63,928,000 in the calculation of the 2009 Statement of Charges, resulting in an overstatement of the Delta Water Charge capital and transportation capital components by \$454,000 and \$789,000, respectively. (TABLE B, Item 6)
- Metropolitan's 2007 variable calculated component erroneously treated the delivery of 5,000 acre-feet of water taken from storage in the San Joaquin Valley as if the water had been delivered from the Delta through the Banks Pumping Plant. This error overstates Metropolitan's 2007 calculated component by \$73,000 in the 2009 Statement of Charges. (TABLE B, Item 7)
- Although the Department prepared a 2009 fish replacement charge calculation, the unit rate calculated for the re-bill of the 2008 Statement of Charges was used for 2008 and 2009, which overstates Metropolitan's 2009 variable charge by \$72,000. (TABLE B, Item 8)
- Oroville revenues in the Delta Water Rate calculation for 2035 were overstated by \$4,960,000 as a result of an input error, resulting in a \$44,000 understatement in Metropolitan's 2009 Delta Water Charge. (TABLE B, Item 9)
- Costs for relocating the Division of Environmental Services for 2006 and 2007 totaling \$111,000 was not properly allocated in the cost accounting system, resulting in these costs not being included in the 2009 Statement of Charges. As a result, Metropolitan's transportation minimum component is understated by \$72,000. (TABLE B, Item 10)
- A portion of the MWQI costs are billed by the Department and a portion are billed by the State Water Contractors Association (SWCA). A SWCA consultant has determined that the Department incorrectly allocated these costs between the annual Statement of Charges and the SWCA in the 2009 Statement of Charges. The Department has prepared a revised allocation and, as a result, Metropolitan's transportation minimum component will increase by \$73,000 in the 2010 Statement of Charges. (TABLE B, Item 11)

Previously Reported Findings:

- The 1998, 1999 and 2004 to 2007 Hyatt-Thermalito O&M costs included in the variable component are overstated by \$6,771,000 and the credits included in the computation of the Delta Water Charge are overstated by \$9,408,000 due to the Department not using actual O&M costs. The effect of these errors was to overstate Metropolitan's variable and minimum components by \$5,832,000 and \$87,000, respectively, and to understate Metropolitan's Delta Water Charge by \$358,000 in the 2009 Statement of Charges. (TABLE B, Item 12)
- For the 2009 Statement of Charges, the Department calculated the water table redistribution entries that reallocate costs between the minimum and variable components for water gains and losses and changes in reservoir storage within the SAP system. We recalculated the downstream distribution of costs for 2006 and 2007, and noted discrepancies that appear to be attributable to the Department not using the most current summary of annual water quantities conveyed through each pumping and power recovery plant. The impact of this error on Metropolitan's 2009 Statement of Charges was to overstate the minimum component by \$5,256,000 and understate the Delta Water Charge component by \$540,000, respectively. (TABLE B, Item 13)
- A discrepancy of \$1,153,000 for 2008 and \$1,154,000 for 2009 because an incorrect amount was used for the Coastal Branch energy charge. As a result, Metropolitan's variable component in the 2009 Statement of Charges was overstated by \$1,846,000. (TABLE B, Item 14)
- Costs totaling \$2,961,000 for Delta related projects that were allocated statewide instead of to the Delta reaches. The incorrect allocation of costs results in a \$108,000 understatement of Metropolitan's Delta Water Charge and a \$1,925,000 overstatement to Metropolitan' transportation minimum component in the 2009 Statement of Charges. (TABLE B, Item 15)
- It appears that the Thermalito Diversion Dam amounts are included in the variable charges twice for 2007 and 2008, which overstates Metropolitan's variable component by \$1,140,000 in the 2009 Statement of Charges. (TABLE B, Item 16)
- Metropolitan's 2006 variable payment included in Attachment 4C of the 2009 Statement of Charges did not include payments totaling \$940,000. In addition, the payment for 2007 is understated by \$5,000. These errors overstate Metropolitan's transportation variable charges by \$1,081,000, including interest on the underpayment. (TABLE B, Item 17)
- The Department calculated a peaking charge for 1998 of \$351,000 and for 1999 of \$1,533,000, but the Department had not reduced the system power costs by these amounts. If these peaking charges were included in the calculation of the variable charge, Metropolitan's transportation variable and transportation minimum components would be reduced by \$967,000 and \$113,000,

respectively. In addition, we noted errors in the calculation of the 1998 and 1999 peaking service costs that understates these costs by \$408,000. (TABLE B, Item 18)

- In the rebill of the 2007 Statement of Charges, the Department included an adjustment to reflect the reclassification of Hyatt-Thermalito Units 1, 3 and 5 refurbishment costs from the conservation replacement charge to the variable component. We noted differences between the amounts included in the variable component and the amounts in SAP totaling \$1,190,000 for 1999 through 2006. The use of incorrect costs results in an overstatement to the variable component of \$952,000 in Metropolitan's 2009 Statement of Charges. (TABLE B, Item 19)
- During our reconciliation of the final 1998 energy, transmission and station service costs, we noted that power costs are overstated by \$2,659,000, power sales are understated by \$501,000, transmission costs are understated by \$293,000, station service costs are overstated by \$95,000 and Coastal Branch power costs are understated by \$680,000 due to the use of outdated information. These errors resulted in an overstatement of Metropolitan's variable component by \$1,048,000 and an understatement of the minimum component by \$142,000 in the 2009 Statement of Charges. (TABLE B, Item 20)
- We continued to note that 2004 wheeling transactions with an estimated cost of \$230,000 were not yet billed and credited to the contractors because the contracts have not been finalized and provided to accounting staff. In addition, wheeling transactions for 2004 and 2007 totaling \$2,376,000 that have been billed and collected were not credited to the accounting system. The estimated impact of these unrecorded transactions on Metropolitan's 2009 Statement of Charges is an overstatement of \$566,000. (TABLE B, Item 21)
- We noted in a previous audit that LADWP paid \$587,000 to the Department in 2005 for interruption and curtailment of capacity as well as for peaking capacity foregone by the Department at the Castaic Powerplant that was not properly recorded in the accounting system. Although this credit has been properly recorded in the accounting system, because the Department did not use SAP to bill the variable charges, this item remains an error and results in an overstatement of \$470,000 to Metropolitan's variable component in the 2009 Statement of Charges. (TABLE B, Item 22)
- Upon conversion to a new system in 1999, the Department revised the allocation of certain
 conservation costs from 1999 to 2002, including Bay-Delta environmental protection studies,
 compliance monitoring, environmental protection support, planning model development, Delta
 facilities planning and Bay-Delta proceedings, such that they were allocated on a statewide basis
 and billed to the contractors mostly through the transportation minimum component; whereas in
 the previous system, these costs were being allocated to a Delta facilities reach and were billed to

the contractors through the Delta Water Charge, after the allocation to the recreation Project purpose. As a result of this change, \$73,570,000 of minimum costs and \$5,701,000 of capital costs from 1999 through 2007 are being allocated entirely to the contractors, instead of a portion being allocated to the recreation Project purpose, which results in the overstatement of Metropolitan's 2009 and future Delta Water Charge by \$92,000 each year and the overstatement of 2001 through 2008 Statements of Charges by \$253,000. (TABLE B, Item 23)

- FERC relicensing costs of approximately \$522,000 for 1999, \$907,000 for 2005 and \$2,044,000 for 2006 were excluded from the variable component and the Delta Water Charge. In addition, FERC relicensing costs for 2000 through 2004 and 2007 are overstated by \$3,408,000 due to the use of outdated costs. As a result, Metropolitan's variable charge is overstated by \$328,000 and the Delta Water Charge component is understated by \$18,000 in the 2009 Statement of Charges. (TABLE B, Item 24)
- Metropolitan's transportation capital component in the 2009 and future years Statements of Charges includes \$212,000 per year for repayment of financed Perris Reservoir recreation-related capital costs. The Department incurred \$3,400,000 of costs in 2005 through 2007 for recreation and fish and wildlife projects at Perris Reservoir that are being allocated 94.3% to the water supply Project purpose and 5.7% for recreation, rather than 100% to the recreation Project purpose. As a result, Metropolitan's 2009 and future transportation capital components are overstated by \$212,000 per year. (TABLE B, Item 25)
- In previous audits, we reported that the Department had recalculated the credits for 1997 through 2004 because they had incorrectly used a Table B–15 that had been adjusted for the changes related to the permanent transfer of entitlement water. This recalculation resulted in an additional credit of \$803,000 for Metropolitan, of which \$606,000 was included in the 2005 rate reduction credit and \$119,000 plus interest was included in the 2007 rate reduction credit. The remaining \$79,000 was improperly excluded from the 2005 rate reduction credit due to an error in the Department's reallocation computation. (TABLE B, Item 26)
- The credit for Hyatt-Thermalito included in the Delta Water Rate computation was \$2,968,000 less than the charges in the variable component for 2008 and was \$637,000 greater for 2009. These misstatements result in an overstatement of Metropolitan's Delta Water Charge by \$73,000 in the 2009 Statement of Charges. (TABLE B, Item 27)
- The value of recovery generation for the San Luis and Warne Powerplants for 1998 was understated by \$457,000 and \$14,000, respectively, and the Devil Canyon recovery generation is overstated by \$75,000, due to the use of outdated information. The effect to Metropolitan is to

overstate the transportation variable and understate the transportation minimum components by \$28,000 and \$6,000, respectively, in the 2009 Statement of Charges. (TABLE B, Item 28)

- The Department used an outdated mill rate when valuing the recovery generation at the Alamo Powerplant, resulting in the value of recovery generation for the Alamo Powerplant for 2002 being overstated by \$97,000. In addition, we noted that the value of recovery generation for the San Luis Powerplant for 1999 was overstated by \$170,000. The effect to Metropolitan of these errors was an overstatement of the transportation variable component of \$10,000 in the 2009 Statement of Charges. (TABLE B, Item 29)
- Due to the incorrect coding of cost centers, actual replacement costs totaling \$167,000 for the Gianelli Pumping and Generating Plant have been improperly included in the 2009 Delta Water Charge, instead of being paid from the conservation replacement fund, which results in the overstatement of Metropolitan's 2009 Delta Water Charge by \$8,000. (TABLE B, Item 30)
- In the preparation of the 2009 Statement of Charges, the Department did not record the credits in the cost accounting system for payments received from the USBR in 2006 totaling \$166,000 for San Luis capital costs. Because the contractors are charged initially for 100% of the costs until reimbursement is received from the USBR, Metropolitan's transportation capital and Delta Water Charge capital components were overstated by \$5,000 and \$2,000, respectively, as a result of these payments not being posted. (TABLE B, Item 31)
- Power costs totaling \$14,848,000 and sales totaling \$2,676,000 for 1999 through 2005, were not recorded or were recorded incorrectly in the accounting system. In addition, transmission costs totaling \$14,042,000 and station service costs totaling \$181,000 for 1999 to 2001, and 2003 to 2005 were not recorded properly in the accounting system. These errors result in an understatement of Metropolitan's variable component by \$3,529,000 and an overstatement to the minimum component of \$3,468,000 in the 2009 Statement of Charges. (TABLE B, Item 32)
- Minimum transmission charges were understated by \$207,000 and the 2006 minimum station service charges were overstated by \$36,000, resulting in an underbilling of \$111,000 to Metropolitan's transportation minimum component in the 2009 Statement of Charges. (TABLE B, Item 33)
- The Tehachapi Second Afterbay charge for debt service allocated to the power benefit included in the 2008 and 2009 variable charges was understated by \$1,367,000 for 2008 and overstated by \$1,038,000 for 2009. As a result, Metropolitan's transportation variable component in the 2009 Statement of Charges is understated by \$263,000. (TABLE B, Item 34)

- The Department calculated the 2008 and 2009 recovery generation credits for Alamo and Mojave Siphon using incorrect mill rates, understating the value of recovery generation for 2008 by \$4,999,000 and understating the value of recovery generation for 2009 by \$1,641,000. In addition, the recovery generation credit for 2007 was understated by \$509,000 due to the use of outdated amounts. As a result, Metropolitan's transportation variable component was understated by \$34,000, the transportation minimum component is understated by \$467,000 and Delta Water Charge minimum component was overstated by \$69,000 in the 2009 Statement of Charges. (TABLE B, Item 35)
- The Devil Canyon Second Afterbay Charges for debt service were understated by \$1,669,000 for 2004, \$370,000 for 2005, and \$593,000 for 2008 due to the use of an outdated debt service schedule. As a result, Metropolitan's variable charges in the 2009 Statement of Charges were understated by \$542,000. (Table B, Item 36)
- Actual contractor payment and water delivery amounts were not used in calculating the fish
 replacement charges and wheeling credits were outdated or excluded from the computation. In
 addition, the present value of water was incorrect due to an error in the formula calculating the
 amount. As a result, Metropolitan's variable component included in the 2009 Statement of
 Charges is understated by \$659,000. (TABLE B, Item 37)
- The Department's calculation of replacement costs used to calculate the variable replacement charges for 2005 through 2007 do not reflect the most current historical cost information, and thus were understated by \$2,465,000, resulting in a \$2,176,000 understatement to Metropolitan's transportation variable component in the 2009 Statement of Charges. (TABLE B, Item 38)

Findings Resulting in Credits, Refunds and Adjustments:

- There was an inconsistency in the application of the recreation Project purpose split between two components of the WSRB Surcharge computation. The error resulted in the overstatement of the WSRB Surcharge in the 1990 through 1993 Statements of Charges totaling \$933,000, of which Metropolitan's share is \$555,000. In addition, as noted in prior year, certain costs were excluded from the computation of the 1992 Surcharge, which results in an overstatement of Metropolitan's 1992 Surcharge of approximately \$100,000. (TABLE C, Item 1)
- The Department excluded \$19,644,000 of Coastal Branch capital costs that were recovered through the transportation variable component from the computation of the 2000 Surcharge, which results in these costs being billed to the contractors twice, resulting in an overstatement of Metropolitan's 2000 Surcharge by \$632,000. (TABLE C, Item 2)