Insured Ratings: Fitch: AAA Moody's: Aaa Standard & Poor's: AAA (See "Ratings" herein)

\$286,945,000 PUBLIC FACILITIES FINANCING AUTHORITY OF THE CITY OF SAN DIEGO SUBORDINATED WATER REVENUE BONDS, SERIES 2002

(Payable Solely From Subordinated Installment Payments Secured By Net System Revenues of the Water Utility Fund)

Dated: Delivery Date

Due: August 1,

as shown on the inside front cover

The Series 2002 Bonds are issuable as fully registered bonds and when initially issued will be registered in the name of Cede & Co., as nominee of The Depository Trust Company, New York, New York ("DTC"). Purchases of the Series 2002 Bonds will be made in book-entry form only, in denominations of \$5,000 or any integral multiple thereof, through brokers and dealers who are, or who act through, DTC Participants. Beneficial owners of the Series 2002 Bonds will not be entitled to receive physical delivery of bond certificates so long as DTC or a successor securities depository acts as the securities depository with respect to the Series 2002 Bonds. So long as DTC or its nominee is the registered owner of the Series 2002 Bonds, reference herein to Bondholders or registered owners shall mean Cede & Co., as aforesaid, and payments of principal of and interest on the Series 2002 Bonds will be made directly to DTC by Wells Fargo Bank, National Association, as Trustee. Disbursement of such payments to DTC Participants is the responsibility of DTC and disbursement of such payments to the Beneficial Owners is the responsibility of DTC Participants. Interest on the Series 2002 Bonds is payable on February 1 and August 1 of each year, commencing February 1, 2003.

The Series 2002 Bonds are subject to optional and mandatory redemption prior to maturity as described herein.

Proceeds of the Series 2002 Bonds are to be applied to (i) finance the upgrade and expansion of the infrastructure of the Water System of the City of San Diego (the "City"), (ii) fund a debt service reserve fund securing the Series 2002 Bonds, (iii) prepay, on an advance refunding basis, a portion of the Series 1998 Certificates (as defined herein) and (iv) pay certain costs of issuance of the Series 2002 Bonds.

The payment of principal of and interest on the Series 2002 Bonds when due will be guaranteed by a municipal bond insurance policy to be issued by MBIA Insurance Corporation simultaneously with the delivery of the Series 2002 Bonds.

MBIA

The Series 2002 Bonds are limited obligations of the Public Facilities Financing Authority of the City of San Diego (the "Authority") secured by and payable solely from Revenues. Revenues include the (1) 2002 Subordinated Installment Payments to be made by the City to the Authority (as more fully described herein) and (2) amounts on deposit in the funds and accounts established under the Indenture described herein (other than amounts on deposit in the Rebate Fund). The 2002 Subordinated Installment Payments are secured by and payable solely from Net System Revenues (as defined herein) pursuant to a 2002 Supplement to the Master Installment Purchase Agreement, dated as of October 1, 2002 (the "2002 Supplement"), between the San Diego Facilities and Equipment Leasing Corporation (the "Corporation") and the City. The Corporation has assigned its rights under the 2002 Supplement to the Authority. The pledge of and right of payment from Net System Revenues securing the 2002 Subordinated Installment Payments (which, in turn, secure the Series 2002 Bonds) is subordinated to the pledge of and right of payment from Net System Revenues securing the Installment Payments represented by the Series 1998 Certificates and any other Parity Obligations issued from time to time in accordance with the Installment Purchase Agreement. See "SECURITY FOR THE SERIES 2002 BONDS."

The obligation of the City to make 2002 Subordinated Installment Payments does not constitute an obligation of the City for which the City is obligated to levy or pledge any form of taxation or for which the City has levied or pledged any form of taxation. Neither the pledge made by the Authority nor the obligation of the City to make 2002 Subordinated Installment Payments creates a legal or equitable pledge, charge, lien or encumbrance upon any of the City's property, or upon its income, receipts or revenues other than Net System Revenues. The Authority has no taxing power.

THIS COVER PAGE CONTAINS CERTAIN INFORMATION FOR GENERAL REFERENCE ONLY. IT IS NOT A SUMMARY OF THE ISSUE. INVESTORS ARE ADVISED TO READ THE ENTIRE OFFICIAL STATEMENT TO OBTAIN INFORMATION ESSENTIAL TO MAKING AN INFORMED DECISION.

MATURITY SCHEDULE (See inside front cover)

In the opinion of Orrick, Herrington & Sutcliffe LLP, Los Angeles, California and Webster & Anderson, Oakland, California, Co-Bond Counsel, based upon an analysis of existing laws, regulations, rulings and court decisions, and assuming, among other matters, the accuracy of certain representations and compliance with certain covenants, interest on the Series 2002 Bonds is excluded from gross income for federal income tax purposes under Section 103 of the Internal Revenue Code of 1986 and is exempt from State of California personal income taxes. In the further opinion of Co-Bond Counsel, interest on the Series 2002 Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes, although Co-Bond Counsel observe that such interest is included in adjusted current earnings when calculating corporate alternative minimum taxable income. Co-Bond Counsel express no opinion regarding any other tax consequences related to the ownership or disposition of, or the accrual or receipt of interest on the Series 2002 Bonds. See "TAX MATTERS."

The Series 2002 Bonds will be offered when, as and if issued and received by the Underwriters, subject to the approval of validity by Orrick, Herrington & Sutcliffe LLP, Los Angeles, California and Webster & Anderson, Oakland, California, Co-Bond Counsel, and to certain other conditions. Certain legal matters in connection with the Series 2002 Bonds will be passed upon by Fulbright & Jaworski L.L.P., Los Angeles, California, Underwriters' Counsel, Casey Gwinn, Esq., City Attorney of the City of San Diego and General Counsel to the Authority and Orrick, Herrington & Sutcliffe LLP, Los Angeles, California, Disclosure Counsel. It is expected that the Series 2002 Bonds will be available for delivery through DTC in New York, New York, on or about October 24, 2002.

MORGAN STANLEY

Salomon Smith Barney

MATURITY SCHEDULE \$196,235,000 Serial Bonds

Maturity (August 1)	Principal Amount	Interest Rate	Yield	CUSIP No. (79730C-)	Maturity (August 1)	Principal Amount	Interest Rate	Yield	CUSIP No. (79730C-)
2006	\$ 2,815,000	2.00%	1.85%	AA 2	2015	\$ 1,625,000	3.70%	3.77%	AK O
2006	1,765,000	3.00	1.85	AV6	2015	17,020,000	5.00	3.77	$BE\ \mathcal{3}$
2007	3,205,000	2.10	2.18	AB 0	2016	1,050,000	3.80	3.88	AL 8
2007	1,485,000	3.00	2.18	AW4	2016	5,005,000	5.00	3.88	BF O
2008	3,230,000	2.40	2.50	AC8	2017	1,000,000	3.90	3.98	AM 6
2008	1,600,000	5.00	2.50	AX 2	2017	5,355,000	5.00	3.98	$BG \ 8$
2009	1,385,000	2.70	2.77	AD 6	2018	1,405,000	4.00	4.06	AN4
2009	13,000,000	3.00	2.77	AYO	2018	5,265,000	5.00	4.06	BH 6
2010	2,560,000	3.00	3.05	AE 4	2019	7,000,000	5.00	4.16	AP 9
2010	12,380,000	5.00	3.05	AZ 7	2020	100,000	4.20	4.24	AQ7
2011	2,490,000	3.125	3.25	$\mathcal{A}F$ 1	2020	7,260,000	5.00	4.24	BJ 2
2011	13,170,000	5.00	3.25	BA 1	2021	850,000	4.25	4.32	AR~5
2012	1,375,000	3.30	3.35	AG 9	2021	6,885,000	5.00	4.32	BK9
2012	15,055,000	5.00	3.35	BB 9	2022	50,000	4.30	4.40	AS 3
2013	575,000	3.40	3.49	AH 7	2022	8,080,000	5.00	4.40	BL 7
2013	16,680,000	5.00	3.49	BC 7	2023	8,485,000	5.00	4.46	BN 3
2014	1,625,000	3.50	3.65	AJ 3	2024	8,910,000	5.00	4.48	BP 8
2014	16,495,000	5.00	3.65	BD 5	•				

\$290,000 4.50% Term Bonds Due August 1, 2026 — Yield 4.530% CUSIP No. 79730C AT1 \$19,210,000 5.00% Term Bonds Due August 1, 2026 — Yield 4.530% CUSIP No. 79730C BM5 \$71,210,000 5.00% Term Bonds Due August 1, 2032 — Yield 4.560% CUSIP No. 79730C AU8

No broker, dealer, salesperson or other person has been authorized by the City of San Diego (the "City"), the Public Facilities Financing Authority of the City of San Diego (the "Authority") or the Underwriters to give any information or to make any representations other than those contained herein and, if given or made, such other information or representation must not be relied upon as having been authorized by the City, the Authority or the Underwriters. This Official Statement does not constitute an offer to sell or the solicitation of an offer to buy, nor shall there be any sale of the Series 2002 Bonds by a person in any jurisdiction in which it is unlawful for such person to make such offer, solicitation or sale. This Official Statement is not to be construed as a contract with the purchasers of the Series 2002 Bonds.

Certain statements contained in this Official Statement reflect not historical facts but forecasts and "forward-looking" statements. In this respect, the words "estimate," "project," "anticipate," "expect," "intend," "believe" and similar expressions are intended to identify forward-looking statements. Projections, forecasts, assumptions, expressions of opinions, estimates and other forward-looking statements, are not to be construed as representations of fact and are qualified in their entirety by the cautionary statements set forth in this Official Statement.

The Underwriters have provided the following sentence for inclusion in this Official Statement. The Underwriters have reviewed the information in this Official Statement in accordance with, and as part of, their responsibilities to investors under the federal securities laws as applied to the facts and circumstances of this transaction, but the Underwriters do not guarantee the accuracy or completeness of such information.

The information set forth herein has been obtained from the City and from other sources and is believed to be reliable but is not guaranteed as to accuracy or completeness. The information and expressions of opinions herein are subject to change without notice and neither the delivery of this Official Statement nor any sale made hereunder shall, under any circumstances, create any implication that there has been no change in the affairs of the City since the date hereof. This Official Statement is submitted in connection with the sale of Series 2002 Bonds referred to herein and may not be reproduced or used, in whole or in part, for any other purpose, unless authorized in writing by the City. All summaries of the documents and laws are made subject to the provisions thereof and do not purport to be complete statements of any or all such provisions.

IN CONNECTION WITH THIS OFFERING OF THE SERIES 2002 BONDS, THE UNDERWRITERS MAY OVER-ALLOT OR EFFECT TRANSACTIONS THAT STABILIZE OR MAINTAIN THE MARKET PRICE OF SUCH BONDS AT A LEVEL ABOVE THAT WHICH MIGHT OTHERWISE PREVAIL IN THE OPEN MARKET. SUCH STABILIZING, IF COMMENCED, MAY BE DISCONTINUED AT ANY TIME. THE UNDERWRITERS MAY OFFER AND SELL SERIES 2002 BONDS TO CERTAIN DEALERS, INSTITUTIONAL INVESTORS AND OTHERS AT PRICES LOWER THAN THE PUBLIC OFFERING PRICES STATED ON THE COVER PAGE HEREOF AND SUCH PUBLIC OFFERING PRICES MAY BE CHANGED FROM TIME TO TIME BY THE UNDERWRITERS.

CITY OF SAN DIEGO

CITY COUNCIL

Dick Murphy, Mayor

Scott Peters Byron Wear Toni Atkins George Stevens Brian Maienschein Donna Frye Jim Madaffer Ralph Inzunza

CITY OFFICIALS

Michael T. Uberuaga City Manager Casey Gwinn City Attorney

Ed Ryan
City Auditor and Comptroller

Patricia T. Frazier
Deputy City Manager
Financial and Management Services

George Loveland
Senior Deputy City Manager

Mary Vattimo City Treasurer

Charles Abdelnour City Clerk

PUBLIC FACILITIES FINANCING AUTHORITY OF THE CITY OF SAN DIEGO

BOARD OF COMMISSIONERS

Joseph Craver, Chair

Ed Ryan, Treasurer

Samuel Brown, *Vice Chair*

Renee Comeau, Secretary

Michael T. Uberuaga, *Commissioner*

CO-BOND COUNSEL

DISCLOSURE COUNSEL

Orrick, Herrington & Sutcliffe LLP Los Angeles, California

Webster & Anderson Oakland, California

Orrick, Herrington & Sutcliffe LLP Los Angeles, California

TRUSTEE

Wells Fargo Bank, National Association Los Angeles, California

FINANCIAL ADVISORS

FEASIBILITY ENGINEER

Montague DeRose and Associates LLC Walnut Creek, California

Kitahata & Company San Francisco, California

O'Brien & Gere Engineers, Inc. Landover, Maryland



CITY OF SAN DIEGO • WATER DEPARTMENT CAPITAL IMPROVEMENTS PROGRAM MAJOR PROJECTS 2003-2007





SUMMARY STATEMENT

This Summary Statement is qualified in all respects by the more complete information contained elsewhere in this Official Statement, including the Appendices. This Official Statement should be read in its entirety, and no one subject discussed herein should be considered less important than any other by reason of its location in the text. Unless otherwise defined below, all capitalized terms used in this Summary Statement shall have the meanings ascribed thereto in Appendix A to this Official Statement.

City of San Diego

The City is the seventh largest city in the United States and the second largest city in the State of California. The City's population is approximately 1.3 million. See APPENDIX B – "CERTAIN INFORMATION REGARDING THE CITY OF SAN DIEGO AND AREA."

The San Diego Water System

The Water System is owned and operated by the City and managed by the Water Department. The Water System consists primarily of nine raw water storage facilities, three water treatment plants, 29 treated water storage facilities and more than 3,460 miles of transmission and distribution lines. See "THE WATER SYSTEM."

The operations of the Water System are accounted for in an enterprise fund - the Water Utility Fund - which was established by amendment to the City Charter effective February 11, 1963. All Water System Revenues are deposited in the Water Utility Fund. The Installment Payments relating to the Series 2002 Bonds are subordinate in right of payment to the Installment Payments relating to the Series 1998 Certificates remaining outstanding following the delivery of the Series 2002 Bonds (as defined herein) and Installment Payments relating to any other Parity Obligations and will be payable solely from Net System Revenues.

The Authority

The Authority is a joint powers authority created by the City and its Redevelopment Agency to engage in financing activities. The Authority has no taxing power. See "THE AUTHORITY."

Purpose of Financing

The Series 2002 Bonds are being issued to (i) finance the upgrade and expansion of the infrastructure of the Water System, (ii) fund a debt service reserve fund securing the Series 2002 Bonds, (iii) prepay, on an advance refunding basis, a portion of the Series 1998 Certificates and (iv) pay certain costs of issuance of the Series 2002 Bonds. See "DESCRIPTION OF THE SERIES 2002 BONDS."

The Series 2002 Bonds

The Series 2002 Bonds will be issued in the aggregate principal amount of \$286,945,000 pursuant to an indenture, dated as of October 1, 2002 (the "Indenture"), between the Authority and Wells Fargo Bank, National Association, as trustee (the "Trustee"). The Series 2002 Bonds shall be in denominations of \$5,000 and any integral multiple thereof. See "DESCRIPTION OF THE SERIES 2002 BONDS."

Redemption Provisions

The Series 2002 Bonds are subject to optional redemption as described herein, and the Series 2002 Bonds designated as Term Bonds on the cover page hereof and herein, are subject to mandatory redemption, all as more fully described herein. See "DESCRIPTION OF THE SERIES 2002 BONDS."

Security for the Series 2002 Bonds

The Series 2002 Bonds are limited obligations of the Authority secured by and payable solely from Revenues. Revenues include the (1) 2002 Subordinated Installment Payments to be made by the City to the Authority (as more fully described herein) and (2) amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund). The 2002 Subordinated Installment Payments are secured by and payable solely from Net System Revenues pursuant to a 2002 Supplement to the Master Installment Purchase Agreement, dated as of October 1, 2002 (the "2002 Supplement"), between the San Diego Facilities and Equipment Leasing Corporation (the "Corporation") and the City and are subordinate in right of payment to the Series 1998 Certificates and any other Parity Obligations issued from time to time. The Corporation has assigned its rights under the 2002 Supplement to the Authority. The Master Installment Purchase Agreement, dated as of August 1, 1998, together with the First Amendatory Supplement, dated as of September 19, 2002 and the 2002 Supplement are collectively referred to as the "Installment Purchase Agreement."

Installment Payments under the Installment Purchase Agreement, including the 2002 Subordinated Installment Payments under the 2002 Supplement, are secured by and payable solely from Net System Revenues on deposit in the Water Utility Fund. Net System Revenues for any Fiscal Year are comprised of System Revenues less Maintenance and Operation Costs of the Water System. Pursuant to the Installment Purchase Agreement, all Parity Obligations (including the Installment Payments securing the Series 1998 Certificates and any other Parity Obligations issued from time to time) are secured by a first priority lien on and pledge of Net System Revenues that are prior to the second priority lien on and pledge of Net System Revenues securing the 2002 Subordinated Installment Payments (which, in turn, secure the Series 2002 Bonds). For further information on Parity Obligations, see "SECURITY FOR THE SERIES 2002 BONDS –Parity Obligations."

The City has covenanted in the Installment Purchase Agreement, not to discontinue or suspend any Installment Payments whether or not the Project or any part thereof is operating or operable or has been completed, or its use is suspended, interfered with, reduced, curtailed or terminated in whole or in part, and such Installment Payments shall not be subject to reduction whether by offset or otherwise and shall not be conditioned upon the performance or non-performance by any party of any agreement for any cause whatsoever.

The obligation of the City to make 2002 Subordinated Installment Payments does not constitute an obligation of the City for which the City is obligated to levy or pledge any form of taxation or for which the City has levied or pledged any form of taxation. Neither the pledge made by the Authority, nor the obligation of the City to make 2002 Subordinated Installment Payments, creates a legal or equitable pledge, charge, lien or encumbrance upon any of the City's property, or upon its income, receipts or revenues other than Net System Revenues. The Authority has no taxing power. See "SECURITY FOR THE SERIES 2002 BONDS."

Insurance on the Series 2002 Bonds

The payment of principal of and interest on the Series 2002 Bonds when due will be guaranteed by a municipal bond insurance policy to be issued by MBIA Insurance Corporation (the "Insurer") simultaneously with the delivery of the Series 2002 Bonds. See "SECURITY FOR THE SERIES 2002 BONDS – Insurance on the Series 2002 Bonds" and APPENDIX H – "SPECIMEN MUNICIPAL BOND INSURANCE POLICY."

Rate Covenant

The City has covenanted in the Installment Purchase Agreement to fix, prescribe and collect rates and charges for the Water System which will be at least sufficient (1) to pay during each Fiscal Year all Obligations (other than Parity Obligations but including the 2002 Subordinated Installment Payments) payable in such Fiscal Year and (2) to yield during each Fiscal Year Adjusted Net System Revenues equal to 120% of the Adjusted Debt Service on Parity Obligations for such Fiscal Year. System Revenues may be increased or reduced by transfers in or out of the Rate Stabilization Fund or the Secondary Purchase Fund. See "SECURITY FOR THE SERIES 2002 BONDS," "WATER SYSTEM FINANCIAL OPERATIONS" and APPENDIX A – "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS – INSTALLMENT PURCHASE AGREEMENT – Selected Definitions."

Reserve Fund

A Reserve Fund has been established for the Series 2002 Bonds in an amount equal to the Reserve Requirement. See "SECURITY FOR THE SERIES 2002 BONDS."

Existing Parity Obligations

Installment Payments with respect to Parity Obligations are senior to the 2002 Subordinated Installment Payments securing the Series 2002 Bonds in the pledge of and right of payment from Net System Revenues. The City has outstanding \$371,165,000 in Parity Obligations incurred in connection with the delivery of the Certificates of Undivided Interest in Installment Payments Payable From Net System Revenues of the Water Utility Fund of the City of San Diego, California, Series 1998 (the "Series 1998 Certificates"). A portion of the proceeds of the Series 2002 Bonds will be used to prepay, on an advance refunding basis, a portion of the Series 1998 Certificates. See "DESCRIPTION OF THE SERIES 2002 BONDS – Plan of Refunding."

Issuance of Additional Obligations

Parity Obligations. The City may at any time issue or create other Obligations on a parity with the Installment Payments securing the Series 1998 Certificates and any other Parity Obligations issued from time to time in accordance with the Installment Purchase Agreement; provided that, among other things, the City obtains or provides a certificate or certificates, prepared by the City or at the City's option by a Consultant, showing that: (i) the Net System Revenues as shown by the books of the City for any 12-consecutive-month-period within the 18 consecutive months ending immediately prior to the incurring of such additional other Parity Obligations shall have amounted to at least 1.20 times the Maximum Annual Debt Service on all Parity Obligations to be Outstanding immediately after the issuance of the proposed Parity Obligations; or (ii) the estimated Net System Revenues for the five Fiscal Years following the earlier of (a) the end of the period during which interest on those Parity Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Parity Obligations are issued, or (b) the date on which substantially all new facilities financed with such Parity Obligations are expected to commence operations, will be at least equal to 1.20 times the Maximum Annual Debt Service for all Parity Obligations which will be Outstanding immediately after the issuance of the proposed Parity Obligations. The Installment Purchase Agreement allows for certain adjustments to be made to Net System Revenues in certain circumstances. For a description of these adjustments, see APPENDIX A - "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS."

Subordinated Obligations. The City may at any time issue or create other Subordinated Obligations on a parity with the 2002 Subordinated Installment Payments securing the Series 2002 Bonds which are payable from Net System Revenues on a basis subordinate to the payment by the City of the Installment Payments securing the Series 1998 Certificates and any other Parity Obligations (i) so long as (a) no Event of Default has occurred and is continuing and (b) no event of default or termination event attributable to an act or failure to act by the City under any Qualified Swap Agreement or Credit Support Instrument has occurred and is continuing and (ii) the City obtains or provides a certificate or certificates, prepared by the City or at the City's option by a Consultant, showing that: (i) the Net System Revenues as shown by the books of the City for any 12-consecutive-month-period within the 18 consecutive months ending immediately prior to the incurring of such additional other Subordinated Obligations shall have amounted to at least 1.00 times the Maximum Annual Debt Service on all Obligations (including Parity Obligations and Subordinated Obligations) to be Outstanding immediately after the issuance of the proposed Subordinated Obligations; or (ii) the estimated Net System Revenues for the five Fiscal Years following the earlier of (a) the end of the period during which interest on those Subordinated Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Subordinated Obligations are issued, or (b) the date on which substantially all new facilities financed with such Subordinated Obligations are expected to commence operations, will be at least equal to 1.00 times the Maximum Annual Debt Service for all Obligations (including Parity Obligations and Subordinated Obligations) which will be Outstanding immediately after the issuance of the proposed Subordinated Obligations. For purposes of this paragraph, Maximum Annual Debt Service includes debt service on all Obligations (including Parity Obligations and Subordinated Obligations). The Installment Purchase Agreement allows for certain adjustments to be made to Net System Revenues in certain circumstances. For a description of these adjustments, see APPENDIX A - "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS." See "SECURITY FOR THE SERIES 2002 BONDS."

Continuing Disclosure and Additional Information

See "CONTINUING DISCLOSURE" and APPENDIX C – "FORM OF CONTINUING DISCLOSURE AGREEMENT" for information regarding the City's obligation to provide annual financial information and operating data and information regarding the occurrence of certain events. Copies of the Indenture, the Installment Purchase Agreement, the Continuing Disclosure Agreement, the City Charter, the City of San Diego Water Department Annual Financial Report (includes the audited financial statements) and additional information relating to the City and the Series 2002 Bonds may be obtained from the Office of the City Clerk, City Administration Building, 202 C Street, MS 2A, San Diego, California 92101.

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OFFICIAL STATEMENT

\$286,945,000

PUBLIC FACILITIES FINANCING AUTHORITY OF THE CITY OF SAN DIEGO SUBORDINATED WATER REVENUE BONDS, SERIES 2002 (Payable Solely From Subordinated Installment Payments Secured By Net System Revenues of the Water Utility Fund)

INTRODUCTION

This Official Statement, which includes the cover page and appendices hereto, is being furnished in connection with the issuance by the Public Facilities Financing Authority of the City of San Diego (the "Authority") of \$286,945,000 aggregate principal amount of its Subordinated Water Revenue Bonds, Series 2002 (Payable Solely From Subordinated Installment Payments Secured By Net System Revenues of the Water Utility Fund) (the "Series 2002 Bonds"). The Master Installment Purchase Agreement, dated as of August 1, 1998 (the "Master Installment Purchase Agreement"), as amended by a First Amendatory Supplement, dated as of September 19, 2002 (the "Amendment"), and the 2002 Supplement to the Master Installment Purchase Agreement, dated as of October 1, 2002 (the "2002 Supplement"), each between the San Diego Facilities and Equipment Leasing Corporation (the "Corporation") and the City of San Diego (the "City") (the Master Installment Purchase Agreement, together with the Amendment, the 2002 Supplement and any other supplements thereto, are collectively referred to herein as the "Installment Purchase Agreement"), provide for the sale of certain components of the construction, replacement and improvement to the City's Water System (as defined below) (the "Project") to the City by the Corporation, in consideration of the City's payment of the 2002 Subordinated Installment Payments to the Authority, as assignee of the Corporation, in an amount equal to the principal of and interest due on the Series 2002 Bonds. The Corporation has assigned its rights under the 2002 Supplement to the Authority pursuant to an assignment agreement, dated as of October 1, 2002 (the "Assignment Agreement"), between the Corporation and the Authority. The Indenture, dated as of October 1, 2002 (the "Indenture"), between the Authority and Wells Fargo Bank, National Association, as trustee (the "Trustee") provides for the issuance of the Series 2002 Bonds. The Series 2002 Bonds are being issued pursuant to the provisions of the Joint Powers Act (commencing with Section 6500), comprising Article 1, Article 2 and Article 4 of Division 7 of Title 1 of the Government Code of the State of California. Capitalized terms not otherwise defined herein shall have the meaning given to such terms in APPENDIX A - "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS."

The Series 2002 Bonds are limited obligations of the Authority secured by and payable solely from Revenues. Revenues include the (1) 2002 Subordinated Installment Payments to be made by the City to the Authority (as assignee of the Corporation) pursuant to the 2002 Supplement, and (2) amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund). The 2002 Subordinated Installment Payments are secured by and payable solely from Net System Revenues and are required to be paid by the City to the Authority, as assignee of the Corporation under the 2002 Supplement, in an amount equal to the principal of and interest due on the Series 2002 Bonds. The pledge of and right of payment from Net System Revenues securing the 2002 Subordinated Installment Payments (which, in turn, secure the Series 2002 Bonds) are subordinate to the pledge of and right of payment from Net System Revenues securing the Installment Payments represented by the Certificates of Undivided Interest in Installment Payments Payable From Net System Revenues of the Water Utility Fund of the City of San Diego, California, Series 1998 (the "Series 1998 Certificates"), delivered in the original principal amount of \$385,000,000, of which \$371,165,000 is currently outstanding and of which \$77,155,000 will be prepaid, on an advance refunding basis, with a portion of the proceeds of the Series 2002 Bonds, and any other Parity Obligations issued from time to time in accordance with the Installment Purchase Agreement. See "DESCRIPTION OF THE SERIES 2002 BONDS – Plan of Refunding."

Net System Revenues for any Fiscal Year are comprised of System Revenues less Maintenance and Operation Costs of the Water System. System Revenues consist primarily of moneys derived by the City from the ownership and operation of the Water System. System Revenues can be (i) increased by withdrawals from the Rate Stabilization Fund and the Secondary Purchase Fund and (ii) decreased by deposits into the Rate Stabilization Fund or by any deposits of current System Revenues into the Secondary Purchase Fund. See "SECURITY FOR THE SERIES 2002 BONDS."

The payment of principal of and interest on the Series 2002 Bonds when due will be guaranteed by a municipal bond insurance policy (the "Bond Insurance Policy") to be issued by MBIA Insurance Corporation (the "Insurer") simultaneously with the issuance of the Series 2002 Bonds. See "SECURITY FOR THE SERIES 2002 BONDS – Insurance on the Series 2002 Bonds" and APPENDIX H — "SPECIMEN MUNICIPAL BOND INSURANCE POLICY."

The Installment Purchase Agreement defines the Water System (as more particularly defined in APPENDIX A – "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS," the "Water System") to mean any and all facilities, properties, improvements and works at any time owned, controlled or operated by the City as part of the public utility system of the City for water purposes, for the development, obtaining, conservation, production, storage, treatment, transmission, furnishing and distribution of water and its other commodities or byproducts for public and private use (whether located within or outside the City), and any related or incidental operations designated by the City as part of the Water System, including reclaimed and repurified water.

The Installment Purchase Agreement authorizes the Corporation to acquire certain components of the Project with the proceeds of the Series 2002 Bonds and to sell such components of the Project to the City in consideration of the City's payment of 2002 Subordinated Installment Payments to the Authority, as assignee of the Corporation. The Project consists of the upgrade and expansion of the infrastructure of the Water System.

The obligation of the City to make 2002 Subordinated Installment Payments does not constitute an obligation of the City for which the City is obligated to levy or pledge any form of taxation or for which the City has levied or pledged any form of taxation. Neither the pledge made by the Authority nor the obligation of the City to make 2002 Subordinated Installment Payments creates a legal or equitable pledge, charge, lien or encumbrance upon any of the City's property, or upon its income, receipts or revenues other than Net System Revenues. The Authority has no taxing power.

DESCRIPTION OF THE SERIES 2002 BONDS

General Terms

The Series 2002 Bonds will be issued in the aggregate principal amounts, will bear interest at the rates per annum and will mature in the principal amounts in each year (subject to prior redemption), as set forth on the cover page hereof. The Series 2002 Bonds are issued only in fully registered form and, when issued, will be registered in the name of Cede & Co., as registered owner and nominee of The Depository Trust Company, New York, New York ("DTC"). DTC will act as securities depository for the Series 2002 Bonds. Purchasers will not receive physical certificates representing their interest in the Series 2002 Bonds purchased. See APPENDIX I – "INFORMATION REGARDING THE BOOK-ENTRY-ONLY SYSTEM."

The Series 2002 Bonds may be transferred on the registration books of the Trustee kept for that purpose at the principal corporate trust office of the Trustee. The Trustee will not be required to register the transfer of any Series 2002 Bond (i) during the period commencing on the day five Business Days before the date on which the Series 2002 Bonds are to be selected for redemption and ending on such date of selection, or (ii) which has been selected for redemption in whole or in part. Similarly, the Trustee will not be required to register the transfer of the exchange of any Series 2002 Bond (i) during any period commencing with the close of business on the 15th day next preceding any Interest Payment Date and ending on such Interest Payment Date, (ii) during the period commencing 15 days before the mailing of any notice of redemption and ending on the day of such mailing or (iii) which has been selected for redemption in whole or in part.

Interest on the Series 2002 Bonds shall be paid to the persons in whose names such Series 2002 Bonds are registered as of the Record Date preceding the applicable Interest Payment Date, which is the 15th day (whether or not such day is a Business Day) preceding such Interest Payment Date. Interest on the Series 2002 Bonds shall be payable on each Interest Payment Date by check sent by first class mail by the Trustee to the registered owners of the Series 2002 Bonds as of the Record Date for such Interest Payment Date at the addresses shown on the registration books of the Trustee kept for that purpose at the principal corporate trust office of the Trustee; provided, however, that in the event ownership of such Series 2002 Bonds is no longer maintained in book-entry form by DTC, interest shall be payable by wire transfer to any registered owner who owns Series 2002 Bonds in an aggregate principal amount of at least \$1,000,000, in immediately available funds to an account in the United States of America designated in writing by such owner to the Trustee prior to the applicable Record Date. Interest on Series 2002 Bonds will be payable in lawful money of the United States of America and will be calculated on the basis of a 360-day year consisting of twelve 30-day months. The principal and redemption price of all Series 2002 Bonds will be payable at the principal corporate trust office of the Trustee.

Notwithstanding the foregoing, payment of interest on any Series 2002 Bond registered as of each Record Date in the name of Cede & Co. shall be made by wire transfer of same-day funds to the account of Cede & Co. on the Interest Payment Date for the Series 2002 Bonds at the address indicated on the Record Date or special record date for Cede & Co. in the registration books of the Trustee.

The Series 2002 Bonds

The Series 2002 Bonds will be dated their date of delivery and interest thereon will accrue from such date. Beneficial ownership of the Series 2002 Bonds may be purchased in denominations of \$5,000 or any integral multiple thereof in book-entry form only. Interest on the Series 2002 Bonds is payable on February 1 and August 1 of each year, commencing February 1, 2003.

Optional Redemption. If the City elects to prepay the 2002 Subordinated Installment Payments under the terms of the 2002 Supplement, the Series 2002 Bonds maturing on or after August 1, 2013 shall be subject to redemption, at the option of the Authority, upon at least 45 days prior written notice to the Trustee specifying the date and amount of such redemption, on or after August 1, 2012, in whole or in part on any date, at par, together with accrued interest to the date fixed for redemption.

Mandatory Sinking Account Redemption. The Series 2002 Bonds maturing on August 1, 2026 and bearing interest at a rate of 5.00% are subject to mandatory sinking account redemption prior to their stated maturity, in part, by lot, from Mandatory Sinking Account Payments, on any August 1 on or after August 1, 2025 at the principal amount thereof without premium plus accrued interest to the redemption date, according to the following schedule:

Year	Principal
(August 1)	<u>Amount</u>
2025	\$9,370,000
2026*	9,840,000

^{*} Maturity

The Series 2002 Bonds maturing on August 1, 2026 and bearing interest at a rate of 4.50% are subject to redemption prior to their stated maturity, in part, by lot, from Mandatory Sinking Account Payments, on any August 1 on or after August 1, 2023 at the principal amount thereof without premium plus accrued interest to the date fixed for redemption, according to the following schedule:

Year (August 1)	Principal <u>Amount</u>
2023	\$60,000
2024	70,000
2025	75,000
2026*	85,000

^{*} Maturity

The Series 2002 Bonds maturing on August 1, 2032 are subject to redemption prior to their stated maturity, in part, by lot, from Mandatory Sinking Account Payments, on any August 1 on or after August 1, 2027 at the principal amount thereof without premium plus accrued interest to the date fixed for redemption, according to the following schedule:

Year (August 1)	Principal <u>Amount</u>
2027	\$10,435,000
2028	10,970,000
2029	11,535,000
2030	12,125,000
2031	12,745,000
2032*	13,400,000

Notice of Redemption. When redemption is authorized pursuant to the Indenture, the Trustee shall give notice of the redemption of the Series 2002 Bonds at least 30 but not more than 60 days prior to the redemption date (i) to the respective Owners of the Series 2002 Bonds designated for redemption by first class mail at their addresses appearing on the registration books of the Trustee and (ii) to the Information Services and Securities Depositories described in the Indenture by registered or certified mail or overnight delivery. The notice of redemption shall include the information required by the Indenture.

Effect of Redemption. If notice of redemption has been duly given as provided in the Indenture and moneys for the payment of the redemption price of the Series 2002 Bonds to be redeemed are held by the Trustee, then on the redemption date designated in such notice the Series 2002 Bonds so called for redemption shall become payable at the redemption price specified in such notice; and from and after the date so designated interest on the Series 2002 Bonds so called for redemption shall cease to accrue, such that the Series 2002 Bonds shall cease to be entitled to any benefit or security hereunder and the Owners of such Series 2002 Bonds shall have no rights in respect thereof, except to receive payment of the redemption price thereof.

Purpose of Financing

The proceeds of the Series 2002 Bonds will be used to upgrade and expand Water System infrastructure. Upgrade and expansion costs include costs of design, engineering, legal and administrative services, acquisition of rights-of-way, land acquisition, construction, materials and equipment. See "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM." In addition to funding certain Water System capital improvements, the remaining proceeds of the Series 2002 Bonds will be used to fund a debt service reserve fund securing the Series 2002 Bonds, prepay, on an advance refunding basis, a portion of the Series 1998 Certificates and to pay certain costs of issuance of the Series 2002 Bonds. See "DESCRIPTION OF THE SERIES 2002 BONDS – Plan of Refunding."

^{*} Maturity

Plan of Refunding

Proceeds of the Series 2002 Bonds in the aggregate principal amount of \$86,346,263 will be deposited in an escrow fund (the "Escrow Fund") established under an escrow agreement between the City, the Authority and the Trustee. The moneys so deposited will be used to purchase certain securities, the interest and principal of which will be sufficient to pay the interest and principal represented by the Series 1998 Certificates maturing on the dates and in the principal amounts shown on the following table:

Maturity Date (August 1)	Principal <u>Amount</u>	Interest <u>Rate</u>
2009	\$ 2,605,000	4.500%
2009	6,900,000	5.250
2010	1,320,000	4.600
2010	8,685,000	5.375
2011	10,520,000	4.750
2012	750,000	4.800
2012	10,315,000	5.375
2013	1,515,000	4.875
2013	10,155,000	5.375
2014	1,765,000	4.900
2014	10,540,000	5.375
2015	12,085,000	5.375

Estimated Sources and Uses

The proceeds of the Series 2002 Bonds are to be applied as follows:

Sources:

Principal Amount	\$286,945,000
Net Original Issue Premium	18,238,710
Total	\$305,183,710
Uses:	
Deposit to Acquisition Fund ⁽¹⁾	193,606,992
Deposit to Escrow Fund for the advance refunding	\$86,346,263
of a portion of the Series 1998 Certificates ⁽²⁾	
Deposit to Reserve Fund ⁽³⁾	21,937,658
Costs of Issuance ⁽⁴⁾	3,292,797
Total	\$305,183,710

To be held and applied to pay for Water System capital improvements, including approximately \$19,182,000 to be reimbursed to the Water Utility Fund for expenditures made prior to the issuance of the Series 2002 Bonds for capital improvements, including certain design costs for the Project.

As a result of the prepayment, on an advance refunding basis, of \$77,155,000 aggregate principal amount of the Series 1998 Certificates with a portion of the proceeds of the Series 2002 Bonds, \$294,010,000 aggregate principal amount of the Series 1998 Certificates will remain outstanding following the date of delivery of the Bonds. See "DESCRIPTION OF THE SERIES 2002 BONDS – Plan of Refunding."

⁽³⁾ The amount on deposit in the Reserve Fund equals the Reserve Requirement as defined in the Indenture. See "SECURITY FOR THE SERIES 2002 BONDS – Reserve Fund."

⁽⁴⁾ Includes legal fees, financial advisor fees, rating agency fees, printing costs, the underwriters' discount (see "UNDERWRITING"), premium for the Bond Insurance Policy and other required expenses.

Debt Service Requirements

The following table shows the total debt service requirements on the Series 1998 Certificates (which are senior to the Series 2002 Bonds in pledge of and right of payment from Net System Revenues) and the Series 2002 Bonds.

 $\begin{tabular}{l} \it Table 1 \\ \it TOTAL DEBT SERVICE REQUIREMENTS \\ \end{tabular}$

Fiscal Year Ending			02 Bonds	Total Debt Service
(June 30)	<u>Certificates</u> ⁽¹⁾	Principal	<u>Interest</u>	
2003	\$ 7,078,362.50		\$ 3,639,233.20	\$10,717,595.70
2004	21,354,825.00		13,506,432.50	34,861,257.50
2005	21,355,025.00		13,506,432.50	34,861,457.50
2006	21,354,860.00		13,506,432.50	34,861,292.50
2007	21,351,113.75	\$ 4,580,000	13,451,807.50	39,382,921.25
2008	21,353,782.50	4,690,000	13,341,255.00	39,385,037.50
2009	21,353,502.50	4,830,000	13,206,567.50	39,390,070.00
2010	12,089,072.50	14,385,000	12,914,110.00	39,388,182.50
2011	12,089,072.50	14,940,000	12,352,512.50	39,381,585.00
2012	12,089,072.50	15,660,000	11,636,456.25	39,385,528.75
2013	12,089,072.50	16,430,000	10,869,237.50	39,388,310.00
2014	12,089,072.50	17,255,000	10,043,400.00	39,387,472.50
2015	12,089,072.50	18,120,000	9,175,812.50	39,384,885.00
2016	12,961,697.50	18,645,000	8,279,437.50	39,886,135.00
2017	25,372,572.50	6,055,000	7,678,800.00	39,106,372.50
2018	25,371,572.50	6,355,000	7,380,350.00	39,106,922.50
2019	25,369,697.50	6,670,000	7,067,250.00	39,106,947.50
2020	25,370,072.50	7,000,000	6,732,525.00	39,102,597.50
2021	25,370,697.50	7,360,000	6,373,925.00	39,104,622.50
2022	25,369,572.50	7,735,000	6,000,137.50	39,104,710.00
2023	25,370,602.50	8,130,000	5,606,875.00	39,107,477.50
2024	25,374,422.50	8,545,000	5,190,325.00	39,109,747.50
2025	25,369,800.00	8,980,000	4,752,525.00	39,102,325.00
2026	25,370,750.00	9,445,000	4,292,262.50	39,108,012.50
2027	25,370,156.25	9,925,000	3,808,412.50	39,103,568.75
2028	25,373,618.75	10,435,000	3,299,625.00	39,108,243.75
2029	25,373,643.75	10,970,000	2,764,500.00	39,108,143.75
2030		11,535,000	2,201,875.00	13,736,875.00
2031		12,125,000	1,610,375.00	13,735,375.00
2032		12,745,000	988,625.00	13,733,625.00
2033		13,400,000	335,000.00	13,735,000.00

Gives effect to the prepayment, on an advance refunding basis, of \$77,155,000 in aggregate principal amount of the Series 1998 Certificates with a portion of the proceeds of the Series 2002 Bonds. See "DESCRIPTION OF THE SERIES 2002 BONDS – Plan of Refunding" and " – Estimated Sources and Uses."

SECURITY FOR THE SERIES 2002 BONDS

Source of Payment; Priority of Pledge of Net System Revenues

The Series 2002 Bonds are limited obligations of the Authority secured by and payable solely from Revenues. Revenues include the (1) 2002 Subordinated Installment Payments to be made by the City to the Authority (as assignee of the Corporation) pursuant to the 2002 Supplement, and (2) amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund). The 2002 Subordinated Installment Payments are secured by and payable solely from Net System Revenues and are required to be paid by the City to the Authority, as assignee of the Corporation under the 2002 Supplement, in an amount equal to the principal of and interest due on the Series 2002 Bonds. The pledge of and right of payment from Net System Revenues securing the 2002 Subordinated Installment Payments (which, in turn, secure the Series 2002 Bonds) is subordinate to the pledge of and right of payment from Net System Revenues securing the Installment Payments represented by the Series 1998 Certificates and any other Parity Obligations that may be issued from time to time in accordance with the Installment Purchase Agreement. See "SECURITY FOR THE SERIES 2002 BONDS—Parity Obligations."

All Parity Obligations, including Installment Payments represented by the Series 1998 Certificates, shall be secured by a first priority lien on and pledge of Net System Revenues. All Parity Obligations shall be of equal rank with each other without preference, priority or distinction of any Parity Obligations over any other Parity Obligations. All Subordinated Obligations, including the 2002 Subordinated Installment Payment securing the Series 2002 Bonds, shall be secured by a second priority lien on and pledge of Net System Revenues that are junior and subordinate to the lien on and pledge of Net System Revenues securing Parity Obligations. All Subordinated Obligations shall be of equal rank with each other without preference, priority or distinction of any Subordinated Obligations over any other Subordinated Obligations except that Subordinated Obligations not issued under the Indenture would not have access to any Reserve Fund created thereunder for Subordinated Obligations. The Installment Purchase Agreement provides that nothing therein shall limit the ability of the City to grant liens on and pledges of Net System Revenues for the benefit of Priority Obligations and Subordinated Obligations contained in the Installment Purchase Agreement. See APPENDIX A – "SUMMARY OF PRINCIPAL DOCUMENTS."

The payment of principal of and interest on the Series 2002 Bonds when due will be guaranteed by the Bond Insurance Policy. See "Insurance on the Series 2002 Bonds" below.

The Water Utility Fund

The City accounts for its water operations through an enterprise fund known as the Water Utility Fund. The Water Utility Fund was established by amendment to the City Charter effective February 11, 1963 and is held separate and apart from other funds of the City. The Water Utility Fund is invested in the City Pool. See "INVESTMENT OF FUNDS" for more information on the City Pool.

The City has agreed and covenanted under the Installment Purchase Agreement that all System Revenues will be received by the City in trust and deposited in the Water Utility Fund. All moneys in the Water Utility Fund shall be used to pay: (i) all Maintenance and Operation Costs of the Water System; (ii) the Trustee for deposit in the Payment Fund for any Parity Obligations, including Reserve Fund Obligations for Parity Obligations, the amounts specified in any Issuing Instrument, as payments due on account of any Parity Obligations (including any Credit Provider Reimbursement Obligations designated as Parity Obligations), other than payments due as Parity Obligations by the City under a Qualified Swap Agreement; and (iii) the counterparty specified in any Qualified Swap Agreement, the amounts or payments due under such Qualified Swap Agreement as Parity Obligations. After such payments have been made, any remaining System Revenues shall be used to make up any deficiency in the Reserve Fund and Reserve Accounts for Parity Obligations. Any amounts thereafter remaining in the Water Utility Fund may be used to pay the amounts due on any Subordinated Obligations (including any Reserve Fund Obligations for Subordinated Obligations, any Credit Provider Reimbursement Obligations, provided the following conditions are met: (a) all Maintenance and Operation Costs of the Water System are being and have been paid and are then current; and (b) all deposits and payments contemplated by clauses (ii) and (iii) above shall

have been made in full and no deficiency in any Reserve Fund or Reserve Account for Parity Obligations shall exist, and there shall have been paid, or segregated within the Water Utility Fund, the amounts payable during the current month pursuant to clauses (ii) and (iii) above. After all payments described in this paragraph have been made, any amounts thereafter remaining in the Water Utility Fund may be used for any lawful purpose.

As of the date of issuance of the Series 2002 Bonds, there will be no outstanding swap agreements involving the Water Utility Fund.

Net System Revenues

"Net System Revenues" for any Fiscal Year consist of System Revenues less Maintenance and Operation Costs of the Water System. "System Revenues" are defined in the Installment Purchase Agreement to mean all income, rents, rates, fees, charges and other moneys derived from the ownership or operation of the Water System, including, without limiting the generality of the foregoing, (i) all income, rents, rates, fees and charges (including standby and capacity charges), or other moneys derived by the City from the water services or facilities and commodities or byproducts, including hydro-electric power, sold, furnished or supplied through the facilities of or in the conduct or operation of the business of the Water System, and including, without limitation, investment earnings on the operating reserves to the extent that the use of such earnings is limited to the Water System by or pursuant to law, and earnings on any Reserve Fund for Obligations but only to the extent that such earnings may be utilized under the Issuing Instrument for the payment of debt service for such Obligations; (ii) the proceeds derived by the City directly or indirectly from the lease of a part of the Water System; (iii) any amount received from the levy or collection of taxes which are solely available and are earmarked for the support of the operation of the Water System; (iv) amounts received under contracts or agreements with governmental or private entities and designated for capital costs for the Water System; and (v) grants for maintenance and operations received from the United States of America or from the State of California; provided, however, that System Revenues shall not include: (a) in all cases, customers' deposits or any other deposits or advances subject to refund until such deposits or advances have become the property of the City; and (b) the proceeds of borrowings. Certain components of the System Revenues, such as capacity charges and certain grants, are not available to pay for Maintenance and Operation Costs of the Water System, but could be available, in part, to pay Installment Payments. Notwithstanding the foregoing, there shall be deducted from System Revenues any amounts transferred into the Rate Stabilization Fund and any amounts transferred from current System Revenues to the Secondary Purchase Fund, and there shall be added to System Revenues any amounts transferred out of the Rate Stabilization Fund or the Secondary Purchase Fund to pay Maintenance and Operation Costs of the Water System. See "Rate Stabilization Fund and Secondary Purchase Fund" below.

"Maintenance and Operations Costs of the Water System" are defined in the Installment Purchase Agreement to mean: (i) the reasonable and necessary costs spent or incurred by the City for maintaining and operating the Water System, calculated in accordance with generally accepted accounting principles, including (among other things) the costs of the purchase, delivery or storage of water, the reasonable expenses of maintenance and repair and other expenses necessary to maintain and preserve the Water System in good repair and working order, and including administrative costs of the City attributable to the Water System, including the Project and the Installment Purchase Agreement, salaries and wages of employees, payments to employees retirement systems (to the extent paid from System Revenues), overhead, taxes (if any), fees of auditors, accountants, attorneys or engineers and insurance premiums, and including all other reasonable and necessary costs of the City or charges required to be paid by it to comply with the terms of the Obligations, including the Installment Purchase Agreement, including any amounts required to be deposited in the Rebate Fund pursuant to the Tax Certificate, and fees and expenses payable to any Credit Provider (other than in repayment of Credit Provider Reimbursement Obligation), and (ii) a Qualified Take or Pay Obligation, but excluding in all cases (a) depreciation, replacement and obsolescence charges or reserves therefor, (b) amortization of intangibles or other bookkeeping entries of a similar nature, (c) costs of capital additions, replacements, betterments, extensions or improvements to the Water System which under generally accepted accounting principles are chargeable to a capital account or to a reserve for depreciation, (d) charges for the payment of principal and interest on any general obligation issued for Water System purposes, (e) charges for the payment of principal and interest on any debt service on account of any obligation on a parity with or subordinate to the Installment Payments, and (f) all payments made pursuant to any Qualified Swap Agreement. Qualified Take or Pay Obligation means the obligation of the City to make use of any facility, property or services, or some portion of the capacity thereof, or to pay therefor from System Revenues, or both, whether or

not such facilities, properties or services are ever made available to the City for use, and there is provided to the City a certificate of the City or of an Independent Engineer to the effect that the incurrence of such obligation will not adversely affect the ability of the City to comply with the rate covenant contained in the Installment Purchase Agreement. As of the date of issuance of the Series 2002 Bonds, there will be no outstanding Take or Pay Obligations.

Obligation of the City Under Installment Purchase Agreement

Pursuant to the Installment Purchase Agreement, the City commits, absolutely and unconditionally, to make Installment Payments solely (including the 2002 Subordinated Installment Payments) from Net System Revenues until such time as the Purchase Price shall have been paid in full (or provision for the payment thereof has been made pursuant to the Installment Purchase Agreement). The City will not discontinue or suspend any Installment Payments (including the 2002 Subordinated Installment Payments) whether or not the Project or any part thereof is operating or operable or has been completed, or its use is suspended, interfered with, reduced, curtailed or terminated in whole or in part, and such Installment Payments (including the 2002 Subordinated Installment Payments) shall not be subject to reduction whether by offset or otherwise and shall not be conditioned upon the performance or nonperformance by any party of any agreement for any cause whatsoever.

Rate Covenant; Impact of Proposition 218

The City has covenanted in the Installment Purchase Agreement to fix, prescribe and collect rates and charges for the Water System which will be at least sufficient (1) to pay during each Fiscal Year all Obligations (other than Parity Obligations but including 2002 Subordinated Installment Payments) payable in such Fiscal Year and (2) to yield during each Fiscal Year Adjusted Net System Revenues equal to 120% of the Adjusted Debt Service on Parity Obligations for such Fiscal Year. "Adjusted Net System Revenues" is defined in the Installment Purchase Agreement to mean Net System Revenues less earnings on the Reserve Fund for Parity Obligations. "Adjusted Debt Service" is defined in the Installment Purchase Agreement to mean Debt Service on Parity Obligations less earnings on the Reserve Fund for Parity Obligations. (Net System Revenues (and thus Adjusted Net System Revenues) may be increased or reduced by transfers in or out of the Rate Stabilization Fund or the Secondary Purchase Fund. See "Net System Revenues" above.) The City may make adjustments from time to time in such rates and charges and may make such classification thereof as it deems necessary, but shall not reduce the rates and charges then in effect unless the Net System Revenues from such reduced rates and charges will at all times be sufficient to meet the requirements of the Installment Purchase Agreement. For information on the possible limitation on the City's ability to comply with the rate covenant as a consequence of Proposition 218, see "WATER SYSTEM FINANCIAL OPERATIONS."

Rate Stabilization Fund and Secondary Purchase Fund

The City has established as funds within the Water Utility Fund, a Rate Stabilization Fund and a Secondary Purchase Fund. From time to time, the City may deposit into the Rate Stabilization Fund, from current System Revenues, such amounts as the City shall determine and the amount of available current System Revenues shall be reduced by the amount so transferred. Amounts may be transferred from the Rate Stabilization Fund solely and exclusively to pay Maintenance and Operation Costs of the Water System, and any amounts so transferred shall be deemed System Revenues when so transferred. All interest or other earnings upon amounts in the Rate Stabilization Fund may be withdrawn therefrom and accounted for as System Revenues. As of June 30, 2002, the amount on deposit in the Rate Stabilization Fund was \$26,500,000.

In addition, from time to time the City may deposit in the Secondary Purchase Fund, from any lawful source, which may or may not consist of current System Revenues, such amounts as the City shall determine, and the amount of available System Revenues shall be reduced by the amount so transferred to the extent that amounts so transferred consist of current System Revenues. Amounts may be transferred from the Secondary Purchase Fund solely and exclusively to pay Maintenance and Operations Costs of the Water System, and any amounts so transferred shall be deemed System Revenues when so transferred. All interest or other earnings upon amounts in the Secondary Purchase Fund may be withdrawn therefrom and accounted for as System Revenues. As of June 30, 2002, the amount on deposit in the Secondary Purchase Fund was \$11,663,000.

For information on the possible limitation on the City's ability to set rates and charges at levels which would permit the City to make deposits into the Rate Stabilization Fund or the Secondary Purchase Fund as a consequence of Proposition 218, see "WATER SYSTEM FINANCIAL OPERATIONS." See also Table 11 under the caption "FINANCIAL PROJECTIONS – Projected Operating Results" for currently anticipated deposits into and withdrawals from the Rate Stabilization Fund incident to the currently contemplated Water System Capital Improvement Program.

Pledge Under the Indenture

Pursuant to the Indenture, the Authority has irrevocably pledged all Revenues (generally consisting of the 2002 Subordinated Installment Payments and amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund)) to the payment of principal of and interest on the Series 2002 Bonds and any Additional Bonds issued under the Indenture. In addition, in order to secure the pledge of the Revenues under the Indenture, the Authority has irrevocably pledged and transferred to the Trustee, for the benefit of the Holders all of the Authority's rights, title and interest in the right to receive the 2002 Subordinated Installment Payments from the City under the 2002 Supplement.

The Trustee has established and will maintain special trust funds called the Payment Fund, the Interest Account, the Principal Account, the Sinking Account, the Redemption Account and the Reserve Fund. Pursuant to the 2002 Supplement, the City will pay the 2002 Subordinated Installment Payments out of the Water Utility Fund to the Trustee for deposit into the Payment Fund so that the principal and interest due on the Series 2002 Bonds shall be paid no later than the third Business Day preceding the day on which such payment is due. See APPENDIX A – "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS."

Insurance on the Series 2002 Bonds

The MBIA Insurance Corporation Insurance Policy. The following information has been furnished by the Insurer for use in this Official Statement. Reference is made to Appendix H for a specimen of the Insurer's policy.

The Insurer's policy unconditionally and irrevocably guarantees the full and complete payment required to be made by or on behalf of the Issuer to the Paying Agent or its successor of an amount equal to (i) the principal of (either at the stated maturity or by an advancement of maturity pursuant to a mandatory sinking fund payment) and interest on, the Series 2002 Bonds as such payments shall become due but shall not be so paid (except that in the event of any acceleration of the due date of such principal by reason of mandatory or optional redemption or acceleration resulting from default or otherwise, other than any advancement of maturity pursuant to a mandatory sinking fund payment, the payments guaranteed by the Insurer's policy shall be made in such amounts and at such times as such payments of principal would have been due had there not been any such acceleration); and (ii) the reimbursement of any such payment which is subsequently recovered from any owner of the Series 2002 Bonds pursuant to a final judgment by a court of competent jurisdiction that such payment constitutes an avoidable preference to such owner within the meaning of any applicable bankruptcy law (a "Preference").

The Insurer's policy does not insure against loss of any prepayment premium which may at any time be payable with respect to any Series 2002 Bonds. The Insurer's policy does not, under any circumstance, insure against loss relating to: (i) optional or mandatory redemptions (other than mandatory sinking fund redemptions); (ii) any payments to be made on an accelerated basis; (iii) payments of the purchase price of Series 2002 Bonds upon tender by an owner thereof; or (iv) any Preference relating to (i) through (iii) above. The Insurer's policy also does not insure against nonpayment of principal of or interest on the Series 2002 Bonds resulting from the insolvency, negligence or any other act or omission of the Paying Agent or any other paying agent for the Series 2002 Bonds.

Upon receipt of telephonic or telegraphic notice, such notice subsequently confirmed in writing by registered or certified mail, or upon receipt of written notice by registered or certified mail, by the Insurer from the Paying Agent or any owner of a Series 2002 Bond the payment of an insured amount for which is then due, that such required payment has not been made, the Insurer on the due date of such payment or within one business day after receipt of notice of such nonpayment, whichever is later, will make a deposit of funds, in an account with State Street Bank and Trust Company, N.A., in New York, New York, or its successor, sufficient for the payment of any such insured amounts which are then due. Upon presentment and surrender of such Series 2002 Bonds or

presentment of such other proof of ownership of the Series 2002 Bonds, together with any appropriate instruments of assignment to evidence the assignment of the insured amounts due on the Series 2002 Bonds as are paid by the Insurer, and appropriate instruments to effect the appointment of the Insurer as agent for such owners of the Series 2002 Bonds in any legal proceeding related to payment of insured amounts on the Series 2002 Bonds, such instruments being in a form satisfactory to State Street Bank and Trust Company, N.A., State Street Bank and Trust Company, N.A. shall disburse to such owners or the Paying Agent payment of the insured amounts due on such Series 2002 Bonds, less any amount held by the Paying Agent for the payment of such insured amounts and legally available therefor.

MBIA. The Insurer is the principal operating subsidiary of MBIA Inc., a New York Stock Exchange listed company (the "Company"). The Company is not obligated to pay the debts of or claims against the Insurer. The Insurer is domiciled in the State of New York and licensed to do business in and subject to regulation under the laws of all 50 states, the District of Columbia, the Commonwealth of Puerto Rico, the Commonwealth of the Northern Mariana Islands, the Virgin Islands of the United States and the Territory of Guam. The Insurer has three branches, one in the Republic of France, one in the Republic of Singapore and one in the Kingdom of Spain. New York has laws prescribing minimum capital requirements, limiting classes and concentrations of investments and requiring the approval of policy rates and forms. State laws also regulate the amount of both the aggregate and individual risks that may be insured, the payment of dividends by the Insurer, changes in control and transactions among affiliates. Additionally, the Insurer is required to maintain contingency reserves on its liabilities in certain amounts and for certain periods of time.

The Insurer does not accept any responsibility for the accuracy or completeness of this Official Statement or any information or disclosure contained herein, or omitted herefrom, other than with respect to the accuracy of the information regarding the policy and the Insurer set forth under the heading "Insurance on the Series 2002 Bonds." Additionally, the Insurer makes no representation regarding the Series 2002 Bonds or the advisability of investing in the Series 2002 Bonds.

The Financial Guarantee Insurance Policies are not covered by the Property/Casualty Insurance Security Fund specified in Article 76 of the New York Insurance Law.

MBIA Information. The following documents filed by the Company with the Securities and Exchange Commission (the "SEC") are incorporated herein by reference:

- (1) The Company's Annual Report on Form 10-K for the year ended December 31, 2001; and
- (2) The Company's Quarterly Report on Form 10-Q for the quarter ended June 30, 2002.

Any documents filed by the Company pursuant to Sections 13(a), 13(c), 14 or 15(d) of the Exchange Act of 1934, as amended, after the date of this Official Statement and prior to the termination of the offering of the Series 2002 Bonds offered hereby shall be deemed to be incorporated by reference in this Official Statement and to be a part hereof. Any statement contained in a document incorporated or deemed to be incorporated by reference herein, or contained in this Official Statement, shall be deemed to be modified or superseded for purposes of this Official Statement to the extent that a statement contained herein or in any other subsequently filed document which also is or is deemed to be incorporated by reference herein modifies or supersedes such statement. Any such statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this Official Statement.

The Company files annual, quarterly and special reports, information statements and other information with the SEC under File No. 1-9583. Copies of the SEC filings (including (1) the Company's Annual Report on Form 10-K for the year ended December 31, 2001, and (2) the Company's Quarterly Report on Form 10-Q for the quarter ended June 30, 2002), are available (i) over the Internet at the SEC's web site at http://www.sec.gov; (ii) at the SEC's public reference room in Washington D.C.; (iii) over the Internet at the Company's web site at http://www.mbia.com; and (iv) at no cost, upon request to MBIA Insurance Corporation, 113 King Street, Armonk, New York 10504. The telephone number of the Insurer is (914) 273-4545.

As of December 31, 2001, the Insurer had admitted assets of \$8.5 billion (audited), total liabilities of \$5.6 billion (audited), and total capital and surplus of \$2.9 billion (audited) determined in accordance with statutory accounting practices prescribed or permitted by insurance regulatory authorities. As of June 30, 2002, the Insurer had admitted assets of \$8.7 billion (unaudited), total liabilities of \$5.7 billion (unaudited), and total capital and surplus of \$3.0 billion (unaudited) determined in accordance with statutory accounting practices prescribed or permitted by insurance regulatory authorities.

Financial Strength Ratings of MBIA. Moody's Investors Service, Inc. rates the financial strength of MBIA "Aaa."

Standard & Poor's, a division of The McGraw-Hill Companies, Inc. rates the financial strength of MBIA "AAA."

Fitch Ratings rates the financial strength of MBIA "AAA."

Each rating of the Insurer should be evaluated independently. The ratings reflect the respective rating agency's current assessment of the creditworthiness of the Insurer and its ability to pay claims on its policies of insurance. Any further explanation as to the significance of the above ratings may be obtained only from the applicable rating agency.

The above ratings are not recommendations to buy, sell or hold the Series 2002 Bonds, and such ratings may be subject to revision or withdrawal at any time by the rating agencies. Any downward revision or withdrawal of any of the above ratings may have an adverse effect on the market price of the Series 2002 Bonds. The Insurer does not guaranty the market price of the Series 2002 Bonds nor does it guaranty that the ratings on the Series 2002 Bonds will not be revised or withdrawn.

In the event the Insurer were to become insolvent, any claims arising under a policy of financial guaranty insurance are excluded from coverage by the California Insurance Guaranty Association, established pursuant to Article 14.2 (commencing with Section 1063) of Chapter 1 of Part 2 of Division 1 of the California Insurance Code.

Reserve Fund

A portion of the proceeds of the Series 2002 Bonds will be deposited in the Reserve Fund in an amount equal to the Reserve Requirement. The Reserve Requirement is defined to be, as of the date of delivery of Bonds (including the Series 2002 Bonds) (and giving effect to the current defeasance of any Bonds pursuant to the Indenture), the least of (i) aggregate Maximum Annual Debt Service on Outstanding Series 2002 Bonds and Additional Bonds issued under the Indenture in any Fiscal Year, (ii) 10% of the aggregate Outstanding par amount of the Series 2002 Bonds and any Additional Bonds issued under the Indenture or (iii) 125% of the aggregate average Annual Debt Service on Outstanding Series 2002 Bonds and any Additional Bonds issued under the Indenture; initially, (iii) is the relevant requirement with respect to the issuance of the Series 2002 Bonds. This test may be reapplied by the City as frequently as each August 1, commencing August 1, 2003, and if the result is a reduction in the Reserve Requirement, so long as no Event of Default (or an event the passage of time or giving of notice would result in an Event of Default) has occurred or is continuing, any excess amount in the Reserve Fund shall, at the City's option, be retained in the Reserve Fund or delivered to the Trustee upon the direction of the City.

At the option of the City, one or more Reserve Fund Credit Facilities may be substituted for the funds held by the Trustee in the Reserve Fund such that the amount available to be drawn under such Reserve Fund Credit Facilities together with funds remaining in the Reserve Fund satisfies the Reserve Requirement. If the City exercises its option to substitute a Reserve Fund Credit Facility for all or a portion of the moneys held by the Trustee in the Reserve Fund, then such moneys, on or after the date that the Reserve Fund Credit Facility becomes effective, at the option of the City, shall be transferred (i) to the Payment Fund and on each applicable Principal Payment Date a pro rata portion thereof shall be transferred to the Principal Fund and used to pay a portion of the principal on the Series 2002 Bonds due on such Principal Payment Date, or (ii) to the City for any other lawful purpose, provided that there is delivered to the Trustee an opinion of nationally recognized Bond Counsel to the effect that the expenditures contemplated by the City will not have an adverse effect upon the exclusion of interest on the Series

2002 Bonds from gross income for federal income taxes under Section 103 of the Internal Revenue Code of 1986 (the "Code") or any successor law. In the event any Reserve Fund Credit Facility is scheduled to terminate prior to the final maturity date of the Series 2002 Bonds and any Additional Bonds issued under the Indenture and such Reserve Fund Credit Facility is not extended, renewed or replaced with another Reserve Fund Credit Facility or with cash or Permitted Investments in the amount of such Reserve Fund Credit Facility, the Trustee shall draw on or make a claim under such Reserve Fund Credit Facility ten days prior to the date of such expiration in an amount equal to the lesser of (i) the maximum amount available thereunder or (ii) the Reserve Requirement, in either case for deposit into the Reserve Fund.

The Series 1998 Certificates are secured by a reserve fund separate and apart from the Reserve Fund securing the Series 2002 Bonds. The holders of the Series 1998 Certificates have no claim on the Reserve Fund for the Series 2002 Bonds, and the holders of the Series 2002 Bonds have no claim on the reserve fund for the Series 1998 Certificates.

Parity Obligations

The Series 1998 Certificates, of which \$371,165,000 are currently outstanding and of which \$77,155,000 will be prepaid, on an advance refunding basis, with proceeds of the Series 2002 Bonds, are Parity Obligations. Installment Payments with respect to Parity Obligations are senior to the 2002 Subordinated Installment Payments securing the Series 2002 Bonds in the pledge of and right of payment from Net System Revenues.

Issuance of Additional Obligations

Parity Obligations. The City may not create Obligations the payments of which are senior or prior in right to the payment by the City of Parity Obligations. The City may at any time issue or create other Parity Obligations secured by and payable solely from Net System Revenues on a parity with the pledge of Net System Revenues securing the Installment Payments (which, in turn, secure solely the Series 1998 Certificates) and any other Parity Obligations issued from time to time in accordance with the Installment Purchase Agreement; provided, among other things, the City obtains or provides a certificate or certificates prepared by the City or at the City's option by a Consultant, showing: (i) the Net System Revenues as shown by the books of the City for any 12 consecutive month period within the 18 consecutive months ending immediately prior to the incurring of such additional other Parity Obligations shall have amounted to at least 1.20 times the Maximum Annual Debt Service on all Parity Obligations to be Outstanding immediately after the issuance of the proposed Parity Obligations; or (ii) the estimated Net System Revenues for the five Fiscal Years following the earlier of (a) the end of the period during which interest on those Parity Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Parity Obligations are issued, or (b) the date on which substantially all new facilities financed with such Parity Obligations are expected to commence operations, will be at least equal to 1.20 times the Maximum Annual Debt Service for all Parity Obligations which will be Outstanding immediately after the issuance of the proposed Parity Obligations. The Installment Purchase Agreement allows for certain adjustments to be made to Net System Revenues in certain circumstances. See APPENDIX A - "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS."

The certificate or certificates described in clause (ii) above shall not be required if, among other things, the Parity Obligations being issued are for the purpose of refunding (1) then Outstanding Parity Obligations if at the time of the issuance of such Parity Obligations a certificate of an Authorized City Representative shall be delivered showing that Debt Service on all Parity Obligations Outstanding for all remaining Fiscal Years after the issuance of the refunding Parity Obligations will not exceed the sum of Debt Service on all Parity Obligations Outstanding for all remaining Fiscal Years prior to the issuance of such Parity Obligations; or (2) then Outstanding Balloon Indebtedness, Tender Indebtedness or Variable Rate Indebtedness, but only to the extent that the principal amount of such indebtedness has been put, tendered to or otherwise purchased by a standby purchase or other liquidity facility relating to such indebtedness. For additional information relating to the terms and conditions for the issuance of the Parity Obligations, see APPENDIX A – "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS."

Subordinated Obligations. The City may at any time issue or create other Subordinated Obligations on a parity with the 2002 Subordinated Installment Payments securing the Series 2002 Bonds which are payable from Net System Revenues on a basis subordinate to the payment by the City of the Installment Payments securing the Series 1998 Certificates and any other Parity Obligations (i) so long as (a) no Event of Default has occurred and is

continuing and (b) no event of default or termination event attributable to an act or failure to act by the City under any Qualified Swap Agreement or Credit Support Instrument has occurred and is continuing and (ii) the City obtains or provides a certificate or certificates, prepared by the City or at the City's option by a Consultant, showing that: (i) the Net System Revenues as shown by the books of the City for any 12-consecutive-month-period within the 18 consecutive months ending immediately prior to the incurring of such additional other Subordinated Obligations shall have amounted to at least 1.00 times the Maximum Annual Debt Service on all Obligations (including Parity Obligations and Subordinated Obligations) to be Outstanding immediately after the issuance of the proposed Subordinated Obligations; or (ii) the estimated Net System Revenues for the five Fiscal Years following the earlier of (a) the end of the period during which interest on those Subordinated Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Subordinated Obligations are issued, or (b) the date on which substantially all new facilities financed with such Subordinated Obligations are expected to commence operations, will be at least equal to 1.00 times the Maximum Annual Debt Service for all Obligations (including Parity Obligations and Subordinated Obligations) which will be Outstanding immediately after the issuance of the proposed Subordinated Obligations. For purposes of this paragraph, Maximum Annual Debt Service includes debt service on all Obligations (including Parity Obligations and Subordinated Obligations). The Installment Purchase Agreement allows for certain adjustments to be made to Net System Revenues in certain circumstances. For a description of these adjustments, see APPENDIX A - "SUMMARY OF PRINCIPAL LEGAL DOCUMENTS." See "SECURITY FOR THE SERIES 2002 BONDS."

The City is contemplating borrowing approximately \$20,000,000 from the State of California Department of Health Services pursuant to the Safe Drinking Water State Revolving Fund loan program during 2002. The City currently expects that this loan would be structured as a Subordinated Obligation under the Installment Purchase Agreement. See Table 12, which assumes such loan is a Subordinated Obligation.

THE AUTHORITY

The Authority was established pursuant to a Joint Exercise of Powers Agreement, dated May 14, 1991, as amended to date, between the City and the Redevelopment Agency of the City. The Authority is intended as a financing vehicle for City facilities and projects. The Authority has no taxing power.

THE WATER SYSTEM

History

The City purchased the Water System in 1901 from the privately owned San Diego Water & Telephone Company. Since then, continual expansion of the Water System has been required to meet the demands of the growing population of the City. To meet the demand, the City purchased a number of reservoirs between 1913 and 1935 to supplement local water supplies. Despite low annual local precipitation for the area (less than 10 inches per year), these reservoirs supplied the City's growing demands until 1940.

The need to import water emerged with the increased demand generated by the presence of the United States Navy before and up to World War II, and the population boom thereafter. As a result, the City and other local retail water distributors formed the San Diego County Water Authority ("CWA") in 1944 for the purpose of purchasing Colorado River water from the Metropolitan Water District of Southern California ("MWD") and conveying it to local distributors within San Diego County. Since 1947, the City and other local retail water distributors have received imported water from the Colorado River. See "WATER SUPPLY."

Governance and Management

The City Manager, who is appointed by the City Council, has the authority to supervise departments within the City, including the Water Department of the City (the "Water Department"), and to appoint managers and directors of these departments who are charged with the operations of such departments. A Utilities General Manager has been appointed to oversee the operations of both the water and wastewater utilities. The Water Department Director, who reports to the Utilities General Manager, is responsible for the operations of the Water Department. The City Council retains the authority to approve the Water Department's budget, to set rates and

charges of the Water System, and to approve the execution of certain contracts. For information on how the City sets the rates and charges of the Water System, see "WATER SYSTEM FINANCIAL OPERATIONS – Establishment and Collection of Water Service Charges."

The Water Department of the City has managed the Water System since July 1, 1996. Before such time, the Water System and the City's Wastewater System were managed by the City of San Diego Water Utilities Department. For the Fiscal Year ended June 30, 2002, the Water Department employed approximately 852 full-time employees and had a budget of \$375.7 million. The functions and responsibilities of the Water Department are divided into five divisions: (1) the Administration Division; (2) the Customer Support Division; (3) the Water Operations Division; (4) the Capital Improvements Program Management Division; and (5) the Water Policy, CIP Finance and Planning Division. For more information on the Capital Improvements Management Division and the Water Policy, CIP Finance and Planning Division, see "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM – Project Management for the CIP."

Service Area

The Water System services the City of San Diego and certain surrounding areas, including both retail and wholesale customers. The map which follows the Table of Contents of this Official Statement shows the boundaries of the service area of the Water System.

Retail Customer Base. The City has a population of approximately 1.3 million and its geographic area covers approximately 330 square miles. See APPENDIX B – "CERTAIN INFORMATION REGARDING THE CITY OF SAN DIEGO AND AREA" for general information on the City. For the Fiscal Year ended June 30, 2002, retail customers accounted for approximately 91% of total water deliveries and such sales represented approximately 97% of the revenues from total sales of water. Of the Water System's more than 264,000 retail service connections, approximately 92% are for residential customers, with the balance for commercial, industrial and other users. As of June 30, 2002, residential customers accounted for approximately 62% of retail water sales revenue, with the balance for commercial, industrial and other users. See Table 5 below.

Table 2 sets forth the historical number of connections to the Water System for each of the five Fiscal Years ended June 30, 1998 through 2002.

Table 2
HISTORICAL NUMBER OF RETAIL CONNECTIONS TO WATER SYSTEM
As of June 30, 1998 to 2002
(Unaudited)

Sources	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	<u>2002</u>
Single Family Domestic	203,659	206,168	208,486	210,271	212,951
Other Domestic	29,594	29,782	29,862	29,964	30,240
Commercial	20,473	20,489	20,806	20,995	21,140
Industrial	529	448	395	367	355
Outside City	62	59	60	61	60
TOTAL	254,317	256,946	259,609	261,658	264,746

Source: Water Department.

Wholesale Customer Base. For the Fiscal Year ended June 30, 2002, wholesale customers accounted for approximately 9% of total water deliveries and such sales represented approximately 3% of the revenues from total sales and/or treatment of water. The City sells and delivers or treats and delivers water on a wholesale basis to four wholesale customers: (1) the California-American Water Company ("Cal-American"), (2) the City of Del Mar ("Del Mar"), (3) the Santa Fe Irrigation District and (4) the San Dieguito Irrigation District (together with the

Santa Fe Irrigation District, the "Districts"). In addition, the City has contracted with a fifth wholesale customer, the Otay Water District ("OWD"), for delivery of treated water in the future.

<u>Cal-American</u>. Since 1912, the City has been selling and delivering treated water to Cal-American, which in turn provides water to the Cities of Coronado and Imperial Beach as well as a portion of the City under an agreement that it assumed from the prior owner of certain Water System facilities that it purchased. Under this agreement and subsequent amendments, the City was obligated to furnish water to Cal-American to supply all of the demands of its customers. Pursuant to an Interim Water Purchase Agreement executed in June 2000, the City is in the process of negotiating an extension of the water supply agreement with Cal-American regarding the amount to be charged for water and the methodology for determining such rates. For the Fiscal Year ended June 30, 2002, the City made approximately 5% of its total water deliveries to Cal-American and such sales represented approximately 3% of the revenues from total sales of water.

<u>Del Mar</u>. The City contracts with Del Mar to treat raw water which Del Mar purchases from the CWA. For the Fiscal Year ended June 30, 2002, deliveries from the treatment of Del Mar water represented less than 0.5% of total deliveries and 0.1% of revenues from total sales of water.

<u>Districts</u>. The City also contracts with the Districts to deliver raw water from Lake Hodges Reservoir. For the Fiscal Year ended June 30, 2002, these water sales represented approximately 3% of total deliveries and such sales represented approximately 0.1% of the revenues from total sales of water.

Otay Water District. The City entered into an agreement with the OWD in 1999 to deliver up to 10 million gallons per day ("MGD") of surplus treated water produced at the City's Otay Water Treatment Plant since the City can benefit by maximizing water production at the treatment plant and generating additional revenue. This agreement provides the OWD with a secondary source of treated water as it otherwise relies exclusively upon imported treated water purchased from the CWA. Pursuant to the agreement, the OWD may elect to pay its proportional share of costs to expand the treatment plant to meet its future treated water demands, estimated to be from 10 to 20 MGD. Any expansion would be subject to the City's discretion and the execution of a separate agreement. As of June 30, 2002, no treated water deliveries were made to OWD, inasmuch as facilities, including a pump station, necessary to move the treated water from the treatment plant to the OWD service area have not yet been constructed by OWD.

Overview of System Facilities

The Water System consists primarily of nine raw water storage facilities, three water treatment plants, 29 treated water storage facilities and more than 3,460 miles of transmission and distribution lines.

Raw Water Storage Facilities. The Water Department maintains and operates nine local surface raw water storage facilities, eight of which are directly connected to water treatment operations. The Lower Otay, Barrett and Morena Reservoirs (137,700 acre-feet ("AF") total capacity) service the Otay Water Treatment Plant in south San Diego; the El Capitan, San Vicente, Sutherland and Lake Murray Reservoirs (237,500 AF total capacity) service the Alvarado Water Treatment Plant in central San Diego; and the Miramar Reservoir (7,200 AF total capacity) services the Miramar Water Treatment Plant in north San Diego. Lake Hodges Reservoir (33,600 AF total capacity) presently remains unconnected to water treatment operations, although about 30% of its storage capacity is sold annually to neighboring water agencies. It is the policy of the City Council that there be maintained in City water storage facilities water sufficient for approximately 7 months at restricted levels of usage to be used in the event of substantial disruption or interruption of service and such amount is currently maintained by the Water System.

Water Treatment Plants. The Water Department maintains and operates three water treatment plants with a combined total rated capacity of 296 MGD. The Miramar Water Treatment Plant was originally constructed in 1962 and has a current rated capacity of 140 MGD. The Miramar Water Treatment Plant generally serves the entire geographical area north of the San Diego River (north San Diego). It is anticipated that the rated capacity of the Miramar Water Treatment Plant will be increased to 215 MGD by 2008. The Alvarado Water Treatment Plant was designed and constructed in 1951 for an initial capacity rating of 66 MGD. Several hydraulic improvements to the Alvarado Water Treatment Plant were constructed in the mid-1970s to increase the plant's hydraulic capacity to the current rated capacity of 120 MGD. The Alvarado Water Treatment Plant generally serves the geographical area from National City to the San Diego River (central San Diego). It is anticipated that the rated capacity of the Alvarado Water Treatment Plant will be increased to 150 MGD by 2003. The Otay Water Treatment Plant was originally constructed in 1940 and has a current rated capacity of 36 MGD. The Otay Water Treatment Plant generally serves the geographical area bordering Mexico (south San Diego) and parts of the southeastern portion of central San Diego. It is anticipated that the rated capacity of the Otay Water Treatment Plant will be increased to 40 MGD by 2009.

Table 3 shows the original design capacity, current rated capacity, future rated capacity, current average demand and the current peak demand for each of the three water treatment plants in the Water System.

Table 3
CAPACITY AND DEMAND OF WATER SYSTEM WATER TREATMENT PLANTS
(In MGD)
Fiscal Year Ended June 30, 2002

Water Treatment Plant	Original Design Capacity	Current Rated Capacity	Future Rated Capacity ⁽¹⁾	Current Average Demand ⁽²⁾	Current Peak/Max Demand ⁽²⁾
Alvarado ⁽³⁾	120	120	200	74.3	100.0
Miramar	140	140	215	82.4	125.7
Otay	<u>40</u>	<u>36</u>	<u>40</u>	<u>22.6</u>	<u>29.7</u>
Total	300	296	455	179.3	255.4

⁽¹⁾ Future Rated Capacity is based upon the completion of certain projects in the Capital Improvement Program by 2008. See "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM."

Source: Water Department

Treated Water Storage Facilities. The Water Department maintains and operates 29 treated water storage facilities, including steel tanks, standpipes, concrete tanks and rectangular concrete reservoirs, with capacities varying from less than 1 million gallons to 35 million gallons.

Delivery System. The Water System consists of approximately 3,460 miles of pipelines, including transmission lines up to 84 inches in diameter and distribution lines as small as 4 inches in diameter. Transmission lines are pipelines with larger diameters that convey raw water to the water treatment plants and convey treated water from the water treatment plants to the treated water storage facilities. Distribution lines are pipelines with smaller diameters that directly service the retail users connected to a meter. In addition, the Water Department maintains and operates 45 water pump stations that deliver treated water from the water treatment plants to over 264,000 metered service connections in over 90 different pressure zones. The Water Department also maintains several emergency connections to and from neighboring water agencies, including the Santa Fe Irrigation District (Miramar Water Treatment Plant), the Poway Municipal Water District (Miramar Water Treatment Plant), the Cal-

Total City average and peak daily water demands (including Cal-American) of 206 MGD and 274 MGD, respectively, are met by the water treatment plant capacities and treated water purchased from the CWA. Due to current operational limitations with respect to the distribution system, City average and peak daily water demands are met with a combination of City-treated water and treated water supplied by CWA. See "WATER SUPPLY."

⁽³⁾ The Capital Improvement Program contains two phases of improvements to the Alvarado Water Treatment Plant. These phases will increase the rated capacity to 150 MGD by 2003 and 200 MGD by 2008. See "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM – Description of Projects – Water Treatment Plants."

American (Alvarado and Otay Water Treatment Plants), the Sweetwater Authority (Otay Water Treatment Plant) and the OWD (Otay Water Treatment Plant).

For additional information on current Water System facilities, see APPENDIX D – "ENGINEER'S STATEMENT OF FEASIBILITY." The Water System is being improved by projects contained in the Capital Improvement Program. See "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM" for a description of these projects.

WATER SUPPLY

General

The Water System currently receives its water supply from two sources: (1) local runoff and (2) water imported by the CWA. Historically, approximately 10% of the water supply for the Water System comes from local rain runoff. This runoff source is dependent upon rainfall and is seasonal and variable in nature. The balance of the Water System water supply currently comes from City purchases from CWA. In turn, MWD is currently CWA's sole source of imported water.

For the Fiscal Year ended June 30, 2002, the City's average daily water use, including Cal-American, was approximately 206 MGD, with peak day demands as high as 274 MGD. As shown in Table 3, the City's three Water Treatment Plants provided 179 MGD or 87% of average demand and 255 MGD or 93% of peak demand. Due to current operational limitations with respect to the distribution system, City average and peak daily water demands are met with a combination of City-treated water and treated water supplied by CWA.

The City is the largest purchaser of water from CWA. During the Fiscal Year ended June 30, 2002, the Water Department purchased approximately 232,223 AF of water from the CWA at a cost of \$113.6 million. Currently, the City pays CWA \$444 per AF for untreated water and \$526 per AF for treated water. For the Fiscal Year ended June 30, 2002, the City's water purchases from CWA represented approximately 36.5% of CWA's total water deliveries and approximately 94% of the water produced by the City was purchased from CWA, with the balance coming from rain runoff collected in the City's raw water reservoirs. During the ten Fiscal Years ended June 30, 2002, approximately 14% of the water purchased by the City from CWA was treated water and the balance was untreated water. For the five Fiscal Years ended June 30, 2002, the average annual percentage of treated water purchased from CWA was approximately 12% of total water purchases.

For more detailed information concerning the water supply of the CWA, see APPENDIX E — "INFORMATION CONCERNING THE SAN DIEGO COUNTY WATER AUTHORITY AND ITS WATER SUPPLY." The information contained in APPENDIX E was obtained from an Official Statement dated May 21, 2002 of CWA or other sources believed to be accurate, but has not been independently verified by the City.

Future Supply for the Water System

The City has conducted two major studies addressing its water supply needs, which have identified an array of approaches to effectively plan for its water supply in the future and which are described below.

Strategic Plan for Water Supply. The City's projected water demands and recommended future supplies were developed through the Strategic Plan for Water Supply, which was adopted by the City Council in August 1997 (the "Strategic Plan"). The Strategic Plan estimated water demand through 2015, and identified infrastructure requirements necessary to insure that facilities were in place to store, treat and distribute required supplies in an efficient and effective manner. See "WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM – Background."

Long Range Water Resources Plan. In 2001, the City, with the assistance of a stakeholder group (a 12-member citizen's advisory committee), initiated an update of the Strategic Plan, known as the Long-Range Water Resources Plan ("WRP"), which is anticipated to be presented to the City Council in the Fall of 2002. The objectives of the WRP were to extend water demand projections through 2030, and develop a decision-making

framework for evaluating water supply options. The WRP identified various options to meet this medium to long-term demand. These options include water conservation, water reclamation, groundwater desalination, groundwater storage, ocean desalination, marine transport, Central Valley Water Transfers, and imported supply from CWA/MWD. Alternative portfolios of water supply options were evaluated against a set of planning objectives to determine the appropriate strategic direction for development of water resources, and a systems model was created to evaluate the options and how they achieve reliability under different operating and hydrologic conditions. The WRP concluded that no single supply source will be sufficient to meet the City's future water demand needs. The preferred supply options will reduce, over time, the City's dependence upon imported water while maximizing local resource development, including additional conservation, reclamation, ground water storage, treatment and recovery, and water transfers. The priority supply options identified for implementation by 2010 are: conservation, reclamation, groundwater and transfers of surplus waters from the Central Valley under long-term contracts or as spot commodity purchases. Management intends to propose that the WRP be implemented in phases in order to meet San Diego's growing demand for water, making adjustments as necessary to respond to changing technology and the regulatory environment.

The City has already successfully begun to implement two of these near-term options, as described in greater detail below:

Conservation. The City's water conservation goal is to reduce its dependency upon imported water. The City anticipates that the program goal of increasing water conservation to 26,000 AF per year, using Fiscal Year 1997 as a baseline, will be accomplished by mid-2005. In order to accomplish this goal, the City has sought to increase public awareness of the need for water conservation and to encourage conservation practices via education and the implementation of new programs that target landscape water conservation and the use of low flow fixtures. As of December 31, 2001, the City's water conservation programs accounted for 16.5 million gallons of water savings per day (18,500 AF per year), relative to the baseline sales number from 1997. The Ultra-Low Flush Toilet Incentive Program accounts for the most of the water savings (approximately 8 MGD), but this does not include reductions resulting from State and City requirements mandating installation of lower usage fixtures in newly constructed buildings and in certain remodeled facilities.

In 1999, the City was recognized by the United States Department of the Interior, Bureau of Reclamation, for its accomplishments in implementing water conservation programs and achieving water savings. New programs, such as the commercial landscape survey program and irrigation water budgeting program for new construction and irrigation meters, are designed with the objective of achieving significant water savings by improving local landscaping management practices. The City expects that these new landscape programs will become the new "workhorse" programs in terms of generating additional water savings in the future.

Reclamation. Reclaimed water is produced from wastewater processed at water reclamation plants owned and operated by the City as part of the City's Wastewater System. The reclaimed water is of high quality and suitable for irrigation, industrial and other non-potable uses. The City's beneficial reuse goals were established by the U.S. Environmental Protection Agency ("EPA") as a grant condition for the North City Water Reclamation Plant ("NCWRP"), which provides reclaimed water to businesses and homeowner associations in the northern area of the City as well as the City of Poway. The EPA's grant goals for the City are to distribute 6 MGD of reclaimed water by 2003 and 12 MGD by 2010. In order to meet the EPA reuse goals, a Beneficial Reuse Study was conducted in 2000, and is now being implemented by the City. The study's objective was to develop a long-term cost-effective strategy to meet the EPA goals. A market assessment was performed which identified large customers, and their demands defined the expanded reclamation distribution system that is currently in design and construction.

In addition to the 30 MGD of reclaimed water production capacity provided by the NCWRP, the City has recently completed the South Bay Water Reclamation Plant which has an initial capacity of 7 MGD and an ultimate capacity of 15 MGD. It is anticipated that this new facility will serve a variety of customers in the South Bay area.

As of June 2002, the City had over 220 reclaimed water meters in operation and the City is presently distributing 4 MGD of reclaimed water. In addition, there are approximately 100 new development and retrofit projects that are expected to begin using reclaimed water within the next three years. Landscaping is the single largest use for reclaimed water in the City. Major customers include Torrey Pines Golf Course, the University of California at San Diego ("UCSD") and General Atomics.

Reclaimed water rates were lowered from \$1.34 to \$0.80 per hundred cubic feet ("HCF") on July 1, 2001, following the completion of a detailed rate study. It is anticipated that the reduction in rates will provide an economic incentive for customers to switch from potable to reclaimed water. As of July 1, 2002, the reclaimed rate was 49% lower than the equivalent potable water rate charged to multi-family, commercial and industrial customers.

WATER SYSTEM REGULATORY REQUIREMENTS

Federal Requirements

The Water System is subject to regulations imposed by the federal Safe Drinking Water Act, as amended (the "Act"), which is administered by the EPA. In 1986, the United States Congress passed amendments to the Act, wherein 83 potential contaminants of potable water were to be regulated by no later than 1989, with 25 new contaminants to be added, prioritized and regulated every three years thereafter. In 1996, the Act was amended again, reducing the number to five new regulated contaminants every five years. The 1996 amendments also require that each regulation be reviewed every six years to determine if a revision is warranted. In addition to setting maximum levels for contaminants, the Act also allows regulations to require water treatment plants to meet defined "Treatment Techniques." The Water Department currently complies with all applicable standards and regulations of the Act.

Other new regulations that are currently proposed and which will impact water treatment are the Arsenic, Radon, Sulfate, Groundwater and Filter Backwash Rules. It is anticipated that new regulated contaminants, plus the continued revision of current regulations, will impact treatment costs and possibly require advance treatment processes. The fiscal impact of these proposed regulations is presently unknown to the City.

State Regulations

As an operator of a large municipal water system, the City is responsible for complying with various state requirements, including: operational requirements; design and construction standards for dams and reservoirs, distribution systems and pipelines; requirements for control of cryptosporidium and other water safety issues; and training and other requirements for Water Treatment and Distribution Operators. Failure to meet these standards may subject the City to civil or criminal sanctions. The Water Department is currently in compliance with all applicable state regulations.

Compliance Order by the California Department of Health Services

The State of California Department of Health Services ("DHS") is the regulatory agency responsible for ensuring that water systems meet the Federal regulations outlined above, as well as additional or stricter State regulations. In January 1994, DHS notified the City that certain deficiencies in the Water System were found during a routine sanitary survey of the Water System. The deficiencies primarily related to the future reliability of various components of the Water System. As a result, the City and DHS entered into a compliance agreement (No. 04-14-94CO-004) pursuant to which the City agreed to correct the deficiencies noted during the survey. The City also agreed to undertake the required rehabilitation and replacements by the deadlines established in the compliance agreement.

The City was unable to meet certain deadlines contained in the compliance agreement because the City had not secured adequate funding for the projects. DHS notified the City in a letter dated January 22, 1997, that the City was out of compliance with the compliance agreement and DHS issued a compliance order (No. 04-14-96CO-022) (the "Compliance Order") to the City. The Compliance Order described the projects that had not been completed and set deadlines for obtaining funding and the completion of these projects. In addition, the Compliance Order required that the City submit a quarterly progress report on the status of each project in the Compliance Order. Furthermore, the Compliance Order provided that if the City was unable to complete the projects by the deadlines listed in the Compliance Order, DHS could, at its discretion, extend the time for performance if the City demonstrated that it had used its best efforts to comply with the schedules and other requirements of the Compliance Order. Lastly, the Compliance Order provided that if the City failed to perform any of the tasks by the time prescribed in the Compliance Order or by the time specified pursuant to an extension of time granted by DHS, the

City would have failed to have complied with the Compliance Order, and, under applicable law, could therefore be subject to additional judicial action, including civil penalties of between \$5,000 and \$25,000 (maximum) per day for each separate violation.

The City has made substantial progress in completing projects listed in the Compliance Order. The City provides DHS with quarterly written updates on progress made on the Compliance Order, and periodic status meetings are held. There have been eight amendments to the original Compliance Order. Amendments are the result of project scope changes, date revisions, project sequencing and operational considerations. No civil penalties have been assessed to date. The projections contained in Table 12 below assume compliance with the project requirements and schedule contained in the Compliance Order, as currently amended.

In June 2002, the Water Department received a DHS order that required water agencies such as the City to install a fluoridation system if DHS identified a funding source that was sufficient to cover all costs of capital, operations and maintenance for the system. The City was offered approximately \$4 million dollars from the California Dental Association Research Fund ("Dental Association"), which the City believes is an amount sufficient to cover the costs of installation of fluoridation equipment and controls and approximately 1.5 years of operating and maintenance costs. An engineering planning study will be performed to further define the scope and budget for this project. The City will be required to comply with this DHS order within two years of the date funds are received. The City is currently negotiating with the Dental Association to finalize the terms for the receipt of funds. If no funds are identified to cover future operating and maintenance costs, the fluoridation system may be taken out of service until additional funds are obtained.

WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM

Background

In May 1996, the Mayor and the City Council formed a citizen task force (the "Public Advisory Group") to develop a long-term plan for addressing the current and future infrastructure needs of the Water System. The Mayor invited 30 community members to join the Public Advisory Group and participate in the creation of the Strategic Plan. For the next year, the Public Advisory Group attended eleven strategic planning workshops and toured the Water System. In May 1997, the Public Advisory Group produced the Strategic Plan that concluded, among other things, that the City must make significant capital improvements to the Water System to ensure that the City has a cost-effective, safe and reliable water supply. In addition, the Strategic Plan identified the projects that the Public Advisory Group felt should be included in the Capital Improvement Program ("CIP") from the period of Fiscal Year 1998 to Fiscal Year 2006. In August 1997, the City Council approved the CIP as contained in the Strategic Plan and implemented rate adjustments for the then current Fiscal Year and the next two succeeding Fiscal Years which were intended to increase water sales revenue in each of such years by 6% over the prior year.

The City reevaluates the projects contained in the CIP and the timing thereof from time to time. Changes to the CIP are made to reflect changing priorities within the Water System and occur as a result of project scope changes, date revisions, project sequencing and operational considerations. In addition, in 2001, the City initiated the WRP to update the Strategic Plan. See "WATER SUPPLY – Future Supply for the Water System – Long Range Water Resources Plan."

The Water Department expended approximately \$371 million from July 1, 1998 through June 30, 2002 on CIP projects. Improvements included projects to upgrade and expand water treatment plants, rehabilitate raw and treated water storage facilities, construct major transmission pipelines, replace and/or upgrade existing pump stations and replace cast iron water mains citywide. In April 2002, the City Council adopted increases on the water base fee rate and commodity charge, intended to increase revenues from retail sales in each of the next five fiscal years by 6% per year. These rate increases will provide needed revenue to continue funding the upgrade and expansion of the Water System through the CIP in order to ensure a reliable water supply for all City residents. For the Fiscal Years ending June 30, 2003 through June 30, 2007, the City plans to expend approximately \$511 million on such improvements. See Table 4 below. After that time, additional expenditures will be made to complete certain improvements begun during the current phase of the CIP, additional projects that are now in preliminary planning, and other projects that are not yet identified. A preliminary estimate of expenditures for the Fiscal Years

ending June 30, 2008 through June 30, 2012 is \$591 million. The CIP is dynamic, and is expected to result in additional expenditures beyond 2012.

Project Management for the CIP

In June 1997, the Water Department hired Parsons Infrastructure and Technology Group, Inc. ("Parsons") as Engineering Program Manager to provide services to support the implementation of the CIP. Parsons began developing a Program Management Plan ("PMP") to define and direct the implementation of the CIP. The PMP is the primary document used by the Feasibility Engineer in its evaluation of the viability of the CIP. See "FEASIBILITY ENGINEER" and APPENDIX D – "ENGINEER'S STATEMENT OF FEASIBILITY."

Parsons is providing traditional program management services including project controls (cost estimating and scheduling), design reviews and permit coordination. Parsons has developed design and construction standards and specifications for water projects to ensure consistency of systems, materials and equipment throughout the program, thereby reducing future operation and maintenance costs.

In December 1997, the Water Department created the Capital Improvements Program (CIP) Management Division to manage all aspects of the CIP. In July 1999, this division was divided into two divisions: the CIP Program Management Division and the Water Policy, CIP Finance & Planning Division. This reorganization provided enhanced focus on CIP project management and additional emphasis on water policy issues, particularly development of alternative sources of supply and long-range planning for the CIP.

The mission of the CIP Program Management Division is to provide a safe and reliable water treatment and distribution system incorporating state of the art facilities at the lowest possible cost to customers. The Division oversees the project management, engineering and other technical aspects of the CIP in order to accomplish the timely and cost effective upgrade and expansion of the Water System. The Division is comprised of six sections: Division Management, which provides overall management and supervision of the CIP projects; Project Management – North, which manages projects in the northern area of the City; Project Management – South, which manages projects in the southern area of the City; Project Management – Water Treatment Plant, which manages the water treatment plant projects irrespective of their geographical location; Operations Liaison, which coordinates CIP activities with system operations; and Special Projects, which assists overall program management with special projects.

The Water Policy, CIP Finance & Planning Division is comprised of seven major sections: Water Policy, Administration, Planning and Project Development, Public Information, Environmental and Permit Coordination, Contracts Procurement, and Water Research and Development. The Water Policy, CIP Financing & Planning Division ensures an adequate, safe and reliable water system by preparing capital project planning studies, developing the long-range capital program, coordinating with local, state and federal agencies, reviewing and developing policies related to water supply and development of local sources, managing the financial needs of the water capital program, and general administrative support for the capital program such as data systems, contract administration, and public information.

Description of the Projects

The CIP projects can be classified into one of eight categories as they relate to the Water System. Certain of these projects were included in the original CIP as contained in the Strategic Plan and certain of these projects have been added or changed since the development of the Strategic Plan. See APPENDIX D – "ENGINEER'S STATEMENT OF FEASIBILITY" for a further description of these projects. The map which follows the Table of Contents of this Official Statement shows the location of the major CIP projects. Brief descriptions of the projects in each of the categories are provided below.

• Water Treatment Plants

The CIP includes projects which will rehabilitate and upgrade the Alvarado Water Treatment Plant, the Miramar Water Treatment Plant and the Otay Water Treatment Plant to comply with the Federal

Safe Drinking Water Act and the Compliance Order. Under the Alvarado Upgrade Phase 1 project, capacity will be increased to 150 MGD by 2003. Under the Alvarado Upgrade Phase 2 project, which is expected to be completed by 2009, the Plant will be expanded to 200 MGD to meet future water demands through 2030. The Miramar Water Treatment Plant will be expanded to a capacity of 215 MGD to meet future water demands through 2030 and is expected to be completed by 2010. The improvements to the Otay Water Treatment Plant are expected to be completed by 2009.

Pipelines

The CIP includes pipeline projects relating to the rehabilitation, replacement and installation of distribution and transmission lines throughout the Water System. A number of pipeline projects have already been completed. Also targeted for replacement are approximately 10 miles per year of existing cast iron distribution mains which have passed their 50-year service life. Through June 30, 2002, the CIP has replaced approximately 59 miles of cast iron distribution mains. There are approximately 150 miles of such mains yet to be replaced.

• Pump Stations

The CIP includes projects that will replace, rehabilitate and construct pump stations throughout the Water System. Of the eleven pump stations included in the CIP, five have been completed and one is near completion. The five remaining pump stations will be completed by 2007.

• Water Storage Facilities

Raw Water Storage Facilities. The CIP includes projects that will upgrade the raw water outlet structures on three reservoirs. In April 2002, the Water Department completed a study of the entire raw water supply system and published a Raw Water Master Plan. The Raw Water Master Plan is expected to result in the addition of projects to the CIP after 2007.

Treated Water Storage Facilities. The CIP includes projects that will expand a number of treated water storage facilities. Completed CIP projects have increased treated water storage capacity by 11% over the Water System's capacity as of July 1, 1998. Projects to be completed by 2007 will increase treated water storage capacity by an additional 6% as compared to the amount available at the start of the CIP (July 1, 1998).

• Reclaimed Water Facilities

The CIP includes reclaimed water distribution projects that will add 15 miles to the City's reclaimed water distribution system by 2007. A significant portion of the reclaimed water distribution system for the NCWRP has been completed, including 40 miles of distribution pipelines, a pump station and storage tank. The Water Department is in the process of further developing markets for the reclaimed water produced at the City's reclaimed water treatment plants.

Miscellaneous Projects

Miscellaneous CIP projects include a centralized electronic monitoring and telemetry control system ("SCADA" – Systems Control and Data Acquisition), air valve adjustments, corrosion control for existing facilities, installation of pressure reducing stations, installation of flow meters and security enhancements at various water facilities. Phase I of SCADA has been completed and Phase II is under construction. All air valve adjustments required under the Compliance Order have been completed and additional air valve work addressing operational concerns is currently under way. Corrosion control activities completed include the Otay 2nd Pipeline Corrosion Study, electrical continuity testing for various north City water pipelines, and cathodic protection for the El Capitan Pipeline. Additional corrosion studies of various pipelines are ongoing.

• Program Management

Program management services for the CIP are provided by Parsons and include cost estimating, program controls and design review.

• Pooled Contingencies

Pooled contingencies are contingency amounts identified for each project in order to protect against certain uncertainties in the construction of such projects. Rather than carry this contingency amount in each project budget, all of the project contingencies are aggregated into a single pool of contingencies.

Project Schedule and Costs

The current cost estimate of CIP projects through June 30, 2007 is approximately \$511 million (excluding financing costs). Table 4 shows categories of projects with the estimated cost of expenditures contained in the CIP for the period of July 1, 2002 through June 30, 2007. Final CIP project costs will be refined as the CIP progresses. The City currently expects that approximately 70% of the costs of the CIP through 2007 will be funded with the proceeds of the Series 2002 Bonds and future financings and approximately 30% of the costs of the CIP will be paid on a pay-as-you-go-basis. See "FINANCIAL PROJECTIONS."

See APPENDIX D - "ENGINEER'S STATEMENT OF FEASIBILITY" for more information on project schedules and costs.

Table 4
WATER SYSTEM CAPITAL IMPROVEMENT PROGRAM ESTIMATED EXPENDITURES
Fiscal Years Ending June 30, 2003 through June 30, 2007

Category		Expenditures ⁽¹⁾⁽²⁾
Water Treatment Plants		\$215,414,143
Pipelines: Transmission Lines Distribution Lines Total	\$64,947,208 56,749,900	121,697,108
Pump Stations		11,600,001
Water Storage Facilities Treated Water Raw Water Total	\$68,154,583 2,985,160	71,139,743
Reclaimed Water Facilities		29,536,550
Miscellaneous Projects		15,744,750
Program Management		25,107,002
Pooled Contingency		20,339,612
TOTAL		\$510,578,909

The amounts in this column do not reflect any CIP expenditures incurred before July 1, 2002. Approximately \$19,182,000 of the proceeds of the Series 2002 Bonds will be used to reimburse the Water Utility Fund for expenditures made prior to the issuance of the Series 2002 Bonds for capital improvements, including certain design costs incurred on or after July 1, 2002.

⁽²⁾ The dollar amounts in this column give effect to assumed rates of inflation of 4% per year during the period covered. Source: Water Department.

Environmental Compliance

The projects contained in the CIP are generally subject to the California Environmental Quality Act ("CEQA"), as amended (Division 13 of the California Public Resources Code). Under CEQA, a project which may have a significant effect on the environment requiring evaluation of mitigation measures and which is to be carried out or approved by a public agency must comply with a comprehensive environmental review process, including the preparation of an Environmental Impact Report ("EIR"). An EIR reflects not only an independent technical analysis of the project's potential impacts, but also the comments of other agencies with some form of jurisdiction over the project and the comments of interested members of the public. Contents of an EIR include a detailed statement of the project's potentially significant environmental effects; any such effects which cannot be avoided if the project is implemented; mitigation measures proposed to eliminate or minimize such effects; alternatives to the proposed project; and any significant irreversible environmental changes which would result from the project. Approximately 15% of CIP projects reviewed through May 2002 have required an EIR. If the agency determines that the project itself will not have a significant effect on the environment, it may adopt a written statement (called a Negative Declaration) to that effect and need not prepare an EIR. A Negative Declaration was prepared for approximately 5% of CIP projects reviewed through May 2002. A Mitigated Negative Declaration ("MND") is appropriate for projects that could potentially result in a significant environmental impact, but revisions or standard mitigation measures are incorporated into the project that clearly mitigate the impact. Approximately 28% of CIP projects reviewed through May 2002 resulted in the preparation of a MND. Statutory exemptions are activities that are not subject to CEQA. CIP projects can also be exempted if they fit a specific "category" of activities identified by the State Legislature. Through May 2002, approximately 52% of CIP projects have qualified for either a statutory or categorical exemption. Once an agency approves or determines to carry out a project, either following an EIR process or after adopting a negative declaration, it must file a notice of such determination. Any action or proceeding challenging the agency's determination must be brought within 30 days following the filing of such notice.

As part of its regular planning and budgetary process, all projects are evaluated under the City's environmental impact review procedures, developed in compliance with State law and regulations. Separate environmental documents for each of the CIP projects either have been or will be prepared in accordance with local, State and/or federal law and regulations.

Since much of the CIP involves replacement, upgrading or increasing capacity of existing facilities, the City does not believe that environmental considerations will adversely affect the completion of the CIP within the contemplated budget or the current timetable.

Contract Disputes

From time to time, the City is engaged in disputes with the contractors and subcontractors working on the CIP. As of June 30, 2002, there are a number of pending contract disputes with vendors or contractors that claim an aggregate amount of approximately \$2.2 million. If these disputes are settled adversely to the City, the City believes they will not have a material financial impact on the operations of the Water System.

WATER SYSTEM FINANCIAL OPERATIONS

The City's primary deposits to the Water Utility Fund are derived from water service charges to City residents and commercial enterprises, capacity charges on new, additional or larger connections to the Water System within the City, and interest income on fund balances.

Establishment and Collection of Water Service Charges

Water service charges to City utility customers are collected on a municipal water bill, which also includes sewer charges and storm drain fees. Bills are currently rendered on a bi-monthly basis for single family and most multi-family dwellings and on a monthly basis for industrial, commercial and large multi-family dwellings. In April 2002, the City Council directed the City Manager to begin monthly billing for all customers by December 31, 2003. The Water Department is evaluating alternative approaches which may or may not require the commitment of additional funds.

The Water Department has available to it personnel and resources to analyze rates and charges necessary to support the Water System. They are responsible for collecting and collating revenue and expenditure data from key administrative, engineering, financial and budgetary elements within the City departments, then evaluating the adequacy of revenues and recommending rate adjustments to correspond with expected changes in maintenance and operations costs and the timing and magnitude of capital expenditures. This process, conducted semiannually for management purposes and as required to facilitate planned financings and rate adjustments, involves an extensive technical review by senior staff with oversight from senior city management. After final review by the City Manager, the recommendation of a rate increase is presented to the City Council for consideration, incorporating near-term financing and water rate considerations as specific recommendations.

The historical sources of water service revenues of the Water Utility Fund for each of the five Fiscal Years ended June 30, 1998 through 2002 are set forth in Table 5 below.

Table 5
HISTORICAL SOURCES OF WATER SERVICE REVENUES⁽¹⁾
(In Thousands of Dollars)
Fiscal Years Ended June 30, 1998 to 2002
(Unaudited)

Sources	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	<u>2002</u> (2)
Retail					
Single Family Domestic	\$ 54,611	\$ 62,637	\$ 75,414	\$ 73,300	\$75,564
Other Domestic ⁽³⁾	35,478	36,676	43,523	42,081	42,695
Commercial	50,301	55,933	68,301	63,536	66,471
Industrial	6,551	5,003	4,655	4,005	3,535
Reclaimed	-0-	-0-	-0-	$3,525^{(4)}$	2,334
Outside City	74	67	82	110	129
Wholesale to Other Retailers					
Other Utilities ⁽⁵⁾	4,680	5,425	6,354	6,581	6,841
Irrigation Districts	484	<u>562</u>	594	635	<u>522</u>
TOTAL	\$152,179	\$166,303	\$198,923	\$193,773	\$198,091

Does not include capacity charges or other operating revenues which are included in calculating Net System Revenues.

Source: Office of the City Auditor and Comptroller.

Calculation of Water Service Charges

Water service charges are based on metered water use and consist of two components; the base fee (or meter charge) and the commodity charge. The City's Municipal Code delegates to the City Manager the authority to adjust water rates to compensate proportionally for any increase in the costs of water and energy purchased by the City. The City Manager has exercised this authority by increasing the commodity charge component of the water service charges from time to time to adjust for the costs of water purchased by the City from CWA. See Table 6. Effective July 1, 2002, single-family residential customers are paying a fixed base fee of \$10.68 per month plus \$1.338 per HCF for the first 7 HCF of water used per month; \$1.703 per HCF for the next 7 HCF of water used per month; and \$1.880 per HCF for any water used per month above 15 HCF (748 gallons equal 1 HCF). Commercial and industrial customers pay a monthly base fee which is related to the size of their meter plus \$1.567 per HCF of water used.

Fiscal Year 2002 figures are preliminary and unaudited.

Other Domestic primarily consists of multi-family dwellings.

⁽⁴⁾ Reclaimed water sales were recorded within commercial water sales prior to Fiscal Year 2001.

⁽⁵⁾ Primarily Cal-American.

City Council Actions Relating to Water Service Charge Changes

In August 1997, the City Council adopted modified water base fee rate adjustments for the then current Fiscal Year and the next two succeeding Fiscal Years which were intended to increase revenues from subsequent retail sales in each of such years by 6% over the prior year for the purpose of funding the CIP. There were no rate increases implemented to take effect in Fiscal Years 2001 and 2002. In April 2002, the City Council adopted increases on the water base fee rate and commodity charge, intended to increase revenues from retail sales in each of the next five fiscal years by 6% per year beginning in Fiscal Year 2003. See "SECURITY FOR THE SERIES 2002 BONDS - Rate Covenant; Impact of Proposition 218." See also "Impact of Proposition 218 on Water Service Rates and Charges" for information on the possible limitations on the City's ability to comply with the rate covenant.

Set forth below as Table 6 is a five-year rate history for water service charges.

Table 6
FIVE-YEAR WATER SERVICE CHARGE HISTORY FOR SINGLE FAMILY
RESIDENTIAL UNITS AND OTHER DOMESTIC, COMMERCIAL & INDUSTRIAL

Effective Date	Single Family <u>Domestic</u>	Other Domestic, <u>Commercial & Industrial</u> ⁽¹⁾
August 12, 1997	Base fee: \$4.77 Commodity charge: 0-7 HCF/Mo. \$1.25/HCF; 8-14 HCF/Mo. \$1.60/HCF; 15+ HCF/Mo. \$1.77/HCF	Base Fee: (\$4.77-\$2,048.13) Commodity charge: \$1.47/HCF
July 1, 1998	Base fee: \$6.70 Commodity charge: 0-7 HCF/Mo. \$1.25/HCF; 8-14 HCF/Mo. \$1.60/HCF; 15+ HCF/Mo.: \$1.77/HCF	Base Fee: (\$6.70-\$2,875.58) Commodity charge: \$1.47/HCF
January 1, 1999	Base fee: \$7.70 Commodity charge: 0-7 HCF/Mo. \$1.25/HCF; 8-14 HCF/Mo. \$1.60/HCF; 15+ HCF/Mo.: \$1.77/HCF	Base Fee: (\$7.70-\$2,953.58) Commodity charge: \$1.47/HCF
July 1, 1999	Base fee: \$9.63 Commodity charge: 0-7 HCF/Mo. \$1.273/HCF; 8-14 HCF/Mo. \$1.623/HCF; 15+ HCF/Mo.: \$1.793/HCF	Base Fee: (\$9.63-\$3,989.75) Commodity charge: \$1.493/HCF
January 20, 2002	Base fee: \$9.63 Commodity charge ⁽²⁾ : 0-7 HCF/Mo. \$1.285/HCF; 8-14 HCF/Mo. \$1.635/HCF; 15+ HCF/Mo.: \$1.805/HCF	Base Fee: (\$9.63-\$3,989.75) Commodity charge: \$1.505/HCF
July 1, 2002	Base fee: \$10.68 Commodity charge: 0-7 HCF/Mo. \$1.338/HCF; 8-14 HCF/Mo. \$1.703/HCF; 15+ HCF/Mo.: \$1.880/HCF	Base Fee: (\$10.68-\$4,425.83) Commodity charge: \$1.567/HCF

⁽¹⁾ The base fee is dependent on the meter size.

Source: Office of the City Treasurer, Financing Services Division.

The increases in commodity charges through January 20, 2002 were implemented by the City Manager to compensate for the increase in the cost of water purchased from CWA.

Accounts Receivable

Typically, the City seeks to collect unpaid bills by (i) issuing an initial shut-off notice as early as 30 days after a bill is issued, (ii) issuing a final shut-off notice as early as 45 days after a bill is issued, and (iii) shutting off the customer's water service as early as 50 days after a bill is issued. This procedure results in almost all past due bills being paid. If necessary, the City establishes time payments for customers who are unable to pay a past due amount. If an account is closed with an amount due which remains unpaid, that account is referred to the City Treasurer for collection activities. An allowance is taken each Fiscal Year for accounts receivable which are not expected to be paid. During the five Fiscal Years ended June 30, 1998 through 2002, this amount ranged from a low of \$1,243,000 for the Fiscal Year ended June 30, 1998, to a high of \$1,639,000 for the Fiscal Year ended June 30, 2000.

Table 7 sets forth information related to accounts receivable and number of shut-offs.

Table 7
WATER CUSTOMER ACCOUNTS RECEIVABLE
AND SHUT-OFFS BY FISCAL YEAR
For each Fiscal Year ended June 30, 1998 to 2002
(Unaudited)

	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	2002 ⁽¹⁾
Water Sales Revenue (000's)	\$152,179	\$166,303	\$198,923	\$193,773	\$198,091
Accounts Receivable (000's) (2)	\$16,614	\$16,779	\$19,153	\$17,694	\$17,931
Accounts Receivable Over 120 Days (000's) ⁽²⁾	\$1,243	\$1,456	\$1,639	\$1,516	\$1,503
% of Total Water Sales Revenues	0.8%	0.9%	0.8%	0.8%	0.8%
No. of Shut-Offs ⁽³⁾	20,496	21,157	16,676	17,302	19,040

⁽¹⁾ Fiscal Year 2002 figures are preliminary and unaudited.

Collection and Calculation of Capacity Charges

A capacity charge is a one-time fee for new, additional or larger connections to the Water System within the City. The charge is imposed when a building permit is obtained and is based upon the number of "equivalent dwelling units" ("EDUs") to be created by the project for which the building permit is obtained. Capacity charges are not treated as operating income for financial reporting purposes but are considered System Revenues and are deposited in the Water Utility Fund. Pursuant to California law, capacity charges can be applied only for the purpose of paying costs associated with capital expansion, bonds, contracts, or other indebtedness of the Water System related to expansion. Because capacity charges are primarily collected on new construction within the City, revenues obtained from such charges vary based upon construction activity. Historical capacity charge revenues and EDUs are shown in Table 8 below.

⁽²⁾ As of June 30.

⁽³⁾ Shut-offs for non-payment may include multiple shut-offs at the same address throughout the fiscal year. Source: Office of the City Auditor and Comptroller & Water Department.

Table 8 WATER UTILITY FUND HISTORICAL CAPACITY CHARGE REVENUES For each Fiscal Year ended June 30, 1998 to 2002

ror each Fiscai Tear enaea June 30, 1998 to 20 (Unaudited)

Fiscal Year Ended June 30	New Equivalent <u>Dwelling Units</u>	Capacity Charge <u>Revenues</u>
1998	7,815	\$16,979,768
1999	6,637	14,671,450
2000	8,410	18,454,941
2001	7,520	16,581,394
2002	10,202	22,249,985(1)

⁽¹⁾ Fiscal Year 2002 figures are preliminary and unaudited.

Source: Office of the City Auditor and Comptroller & Water Department.

Capacity charges are shown in Table 9. In response to a request by the City Manager that capacity charges be reduced in order to stimulate economic development and affordable housing, the City Council approved in June 1996, retroactive to April 22, 1996, a 38% reduction of these charges. If Proposition 218 is determined to apply to water capacity charges and other water fees and charges, these and other fees and charges of the Water System may need to be revised in order to satisfy the requirements of Proposition 218. See "Impact of Proposition 218 on Water Service Rates and Charges" below.

Table 9
RECENT RATE HISTORY
FOR WATER CAPACITY CHARGES

Effective <u>Date</u>	Water Capacity Charges (Per EDU)	% Increase (Decrease)
July 1, 1995	\$4,012	-0-
April 1, 1996	2,500	(38)

Source: Office of the City Treasurer, Financing Services.

Impact of Proposition 218 on Water Service Rates and Charges

On November 5, 1996, the voters of the State approved Proposition 218, the so-called "Right to Vote on Taxes Act." Proposition 218 added Articles XIIIC and XIIID to the State Constitution, which contain a number of provisions affecting the ability of local governments to levy and collect both existing and future taxes, assessments, fees and charges.

Article XIIID conditions the imposition or increase of any "fee" or "charge" upon there being no written majority protest after a required public hearing and, for fees and charges other than for sewer, water or refuse collection services, voter approval. Article XIIID defines "fee" or "charge" to mean levies (other than ad valorem or

special taxes or assessments) imposed by a local government upon a parcel or upon a person as an incident of the ownership or tenancy of real property, including a user fee or charge for a "property-related service." One of the requirements of Article XIIID is that before a property related fee or charge may be imposed or increased, a public hearing upon the proposed fee or charge must be held and mailed notice sent to the record owner of each identified parcel of land upon which the fee or charge is proposed for imposition. In the public hearing if written protests of the proposed fee or charge are presented by a majority of the owners of affected identified parcel(s), an agency may not impose the fee or charge.

The City's water charges have two components, a base fee based on meter size and a commodity charge based on the volume of water consumed. In July 1997, the Attorney General of the State of California issued an opinion to the effect that Article XIIID does not apply to water fees or charges which are based on the volume of consumption. In an intermediate appellate court decision issued in 2000, it was held that water service fees and charges, where based primarily on consumption were not "fees" or "charges" within the meaning of Article XIIID; in that case, the charge had two components, a base charge and a variable charge based upon consumption. The California State Supreme Court denied review of the case and has not otherwise considered the issue directly. The City Attorney of the City is of the opinion that the water and capacity fees and charges are not subject to Article XIIID.

In addition, by July 1, 1997, under Article XIIID, all property-related fees and charges, including those which have been in existence since prior to the passage of Proposition 218 in November 1996, had to have met the following substantive standards:

- (1) Revenues derived from the fee or charge cannot exceed the funds required to provide the propertyrelated service.
- (2) Revenues derived from the fee or charge must not be used for any purpose other than that for which the fee or charge was imposed.
- (3) The amount of a fee or charge imposed upon any parcel or person as an incident of property ownership must not exceed the proportional cost of the service attributable to the parcel.
- (4) No fee or charge may be imposed for a service unless that service is actually used by, or immediately available to, the owner of the property in question. Fees or charges based on potential or future use of a service are not permitted. Standby charges, whether characterized as charges or assessments, must be classified as assessments and cannot be imposed without compliance with Section 4 of Article XIIID (relating to assessments).
- (5) No fee or charge may be imposed for general governmental services including, but not limited to, police, fire, ambulance or library services where the service is available to the public at large in substantially the same manner as it is to property owners.

Even though the City believes that its water rates and capacity charges are not subject to Article XIIID, the City believes that they comply with the foregoing standards. It is unclear whether under the foregoing standards rates and charges may be established at levels which would permit deposits to a Rate Stabilization Fund or maintenance of uncommitted cash reserves. See "FINANCIAL PROJECTIONS."

Article XIIIC removes limitations on the initiative power in matters of local taxes, assessments, fees and charges. Consequently, the voters of the City could, by future initiative, repeal, reduce or prohibit the future imposition or increase of any local tax, assessment, fee or charge. "Assessment," "fee" and "charge" are not defined in Article XIIIC and it is unclear whether the definitions of such terms contained in Article XIIID (which are generally property-related as described above) are so limited under Article XIIIC. No assurance can be given that the voters of the City will not, in the future, approve initiatives which repeal, reduce or prohibit the future imposition or increase of assessments, fees or charges, including the City's water service fees and charges, which are the source of Net System Revenues pledged to the payment of debt service on Series 2002 Certificates and other Outstanding Obligations.

In addition to the foregoing, the City's general financial condition may be affected by other provisions of Article XIIIC and Article XIIID, including (i) provisions of Article XIIIC (a) requiring taxes for general governmental purposes to be approved by a majority vote and taxes for specific purposes, even if deposited into the general fund, to be approved by a two-thirds vote, (b) requiring any general purpose tax which the City imposed, extended or increased, without voter approval, after December 31, 1994 to be approved by majority vote by November 5, 1998 (however, the City has not so imposed, extended or increased any such taxes which are currently in effect), (c) subjecting all taxes, assessments, fees and charges to reduction or repeal at any time through the initiative process (as mentioned above), and (ii) provisions of Article XIIID that could reduce the ability of the City to fund certain services or programs that it may be required or choose to fund from its general fund, such as provisions (1) adding requirements making it generally more difficult to levy and maintain "assessments," defined to mean a levy or charge upon real property located in the district or to the public at large, (2) requiring any imposition or increase of property related fees or charges other than for sewer, water and refuse collection services or fees for electrical or gas service (which are not treated as property related for purposes of Article XIIID) to be approved by a "Majority of the property owners" subject to the fee or charge or, at the option of the local government, two-thirds vote of the electorate residing in the affected area.

The interpretation and application of Proposition 218 will ultimately be determined by the courts or through implementing legislation with respect to a number of the matters discussed above, and it is not possible at this time to predict with certainty the outcome of such determination or the nature or scope of any such legislation.

Effect of Proposition 218 and of Possible General Limitations on Enforcement Remedies

The ability of the City to comply with its covenants under the Installment Purchase Agreement and to generate Net System Revenues sufficient to pay 2002 Subordinated Installment Payments thereunder, and ultimately the payment of the principal of and interest on the Series 2002 Bonds and the Outstanding Obligations, may be adversely affected by actions and events outside of the control of the City and may be adversely affected by actions taken (or not taken) under Article XIIIC or Article XIIID by voters, property owners, taxpayers or payers of assessments, fees and charges. Furthermore, any remedies available to the owners of the Series 2002 Bonds and the Outstanding Obligations upon the occurrence of an event of default under the Indenture are in many respects dependent upon judicial actions which are often subject to discretion and delay and could prove both expensive and time consuming to obtain. In addition to the possible limitations on the ability of the City to comply with its covenants under the Installment Purchase Agreement, the ability of the Authority to comply with its obligations under the Indenture, the rights and obligations under the Series 2002 Bonds, the Outstanding Obligations, the Indenture and the Installment Purchase Agreement may be subject to bankruptcy, insolvency, reorganization, arrangement, fraudulent conveyance, moratorium and other laws relating to or affecting creditors' rights, to the application of equitable principles, to the exercise of judicial discretion in appropriate cases and to limitations on legal remedies against cities in the State of California.

Based on the foregoing, in the event the City fails to comply with its covenants under the Installment Purchase Agreement, including its covenants to generate sufficient Net System Revenues, as a consequence of the application of Article XIIIC and Article XIIID or other matters in dispute, or to pay 2002 Subordinated Installment Payments thereunder, and thus ultimately effect the payment of principal or interest in respect of the Series 2002 Bonds and Outstanding Obligations, there can be no assurance that available remedies will be adequate to fully protect the interests of the holders of the Series 2002 Bonds and the Outstanding Obligations.

Historical Revenues and Adjusted Debt Service Coverage

Table 10 contains the Statement of Income for Fiscal Years ended June 30, 1998 through 2002, and Table 11 contains the calculation of Adjusted Debt Service Coverage for such years. See "SECURITY FOR THE SERIES 2002 BONDS – Rate Covenant; Impact of Proposition 218." See also APPENDIX F – AUDITED FINANCIAL STATEMENTS OF THE CITY OF SAN DIEGO WATER DEPARTMENT FOR THE YEARS ENDED JUNE 30, 2001 AND JUNE 30, 2000.

Table 10
WATER SYSTEM STATEMENT OF INCOME
Fiscal Years Ended June 30, 1998 to 2002

OPERATING REVENUES Sales of Water:	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	2002 ⁽¹⁾ (unaudited)
Inside City: Domestic Commercial and Industrial Reclaimed Outside City:	\$90,088,248 56,851,466 -0-	\$99,313,388 60,935,937 -0-	\$118,937,337 72,955,451 -0-	\$115,380,542 67,541,340 3,525,321 ⁽²⁾	\$118,259,408 70,006,351 2,333,783
Domestic, Commercial and Industrial Other Utilities Irrigation Districts	74,374 4,680,405 484,553	66,579 5,424,822 562,373	81,709 6,354,428 594,259	109,991 6,580,655 634,995	128,947 6,840,711 521,992
Total Sales of Water	152,179,046	166,303,099	198,923,184	193,772,844	198,091,192
Other Operating Revenues	24,404,627	17,765,944	23,554,454	18,517,134	24,749,539
TOTAL OPERATING REVENUES	176,583,673	184,069,043	222,477,638	212,289,978	222,840,731
OPERATING EXPENSES	166,644,024	190,793,054	204,389,613	223,901,388	223,816,438
OPERATING INCOME (LOSS)	9,939,649	(6,724,011)	18,088,025	(11,611,410)	(975,707)
NON-OPERATING REVENUES (EXPENSES):					
Interest Income Interest Expense Other	4,785,683 (35,196) (1,727,728)	8,646,146 (17,063,481) 14,697,453 ⁽³⁾	12,411,960 (18,707,396) 13,693,090 ⁽³⁾	18,528,367 (18,667,690) ⁽³⁾ <u>8,435,921</u>	10,170,941 (15,043,752) ⁽³⁾ (135,286)
TOTAL NON-OPERATING REVENUES (EXPENSES)	3,022,759	6,280,118	7,397,654	<u>8,296,598</u>	(5,008,097)
Operating Transfers In	30,571	1,250,473	-0-	67,144	-0-
Operating Transfers Out	(764,895)	(768,789)	(810,700)	(1,212,868)	(44,592)
Transfers to Primary Government	0-	-0-	-0-	(270,242)	(807,447)
NET INCOME	\$12,228,084	<u>\$37,791</u>	<u>\$24,674,979</u>	<u>\$(4,730,778)</u>	<u>\$(6,835,843)</u>

⁽¹⁾ Fiscal Year 2002 figures are preliminary and unaudited.

Source: Office of the City Auditor and Comptroller.

⁽²⁾ Reclaimed Water Sales were recorded within Commercial Water Sales prior to Fiscal Year 2001.

⁽³⁾ Interest received from the Bond Acquisition Fund for the Water Utility Fund was not originally recognized in the audited financial statements for fiscal years 1999 and 2000, but has been included in fiscal years 2001 and 2002 results. The fiscal years 1999 and 2000 financial statements were restated to reflect the additional revenues received. The effect of this adjustment was an increase of \$13,441,038 and \$13,643,658 to Nonoperating Revenues – Other and Net Income, respectively. The Fiscal Year 2002 results are preliminary and unaudited. Such interest is not included in System Revenues, although it is reflected in Net Income.

Management's Discussion and Analysis

The following discussion relates to certain items shown in Table 10.

Operating Revenues. Water sales revenue from customers increased from 1998 to 2000 due to an approved rate increase in August 1997 of 6% per year for the Fiscal Years ending 1998 through 2000 and also higher demand for water as a result of the decrease in rainfall during 1999 and 2000. Revenues decreased in 2001 due to the increase in rainfall, which resulted in lower demand. Revenues increased in 2002 due to higher demand for water because of the decrease in rainfall.

Other Operating Revenues increased in 2000 due to increased credits from the reclaimed water incentive program and a one-time refund of \$2.3 million from the CWA. Revenues decreased in 2001 due to the reclassification of the reclaimed water incentive credits of \$1.2 million from Other Operating Revenues to the Sale of Water category in Operating Revenues. Other Operating Revenues increased in 2002 due to receipt of an intermittent refund of \$5.9 million from the CWA, which includes a \$3.2 million refund for the City's portion of the Water Rate Stabilization Fund.

Operating Expenses. Operating expenses increased from 1998 to 2001 primarily due to the increased cost of water purchases, increased power costs and continual repair of the Water System. The Department continues to pay City-imposed right-of-way charges to the General Fund for use of City streets for water mains. The City's right-of-way charges for the Fiscal Years ended June 30, 1998, 1999, 2000, 2001 and 2002 were \$6.3 million, \$5.4 million, \$4.1 million, \$2.6 million and \$1.1 million, respectively.

In 2000, water purchases increased \$8 million. The high demand for water and the decrease in rainfall during 2000 compounded with the effects of evaporation loss resulted in a decrease in the levels in the reservoirs and, therefore, an increase in purchased water. Overall, the total ending water storage balance decreased in 2000.

In 2001, water purchases increased \$11 million. Although rainfall increased from 5.78 inches in 2000 to 8.61 inches in 2001, it continued to remain below the average seasonal rainfall of 9.99 inches per year. To partially offset the decrease in the water storage balance and to maintain compliance for emergency storage, an increase in the supply of purchased water was necessary.

In 2002, Operating Expenses remained level. Even though the demand for water increased, the total costs for water purchases did not. Excess water was purchased during the winter months when the cost is lower. This water was then used to meet the increased demand later in the year.

Operating Income (Loss). In 1999, an operating loss occurred primarily due to an increase in water purchases due to lower than average rainfall. For 2001 and 2002, the operating losses were primarily a result of a higher proportion of purchased water being used to meet demand. Historically, approximately 10% of the water supply comes from local runoff, but due to lower rainfall totals the last two years, the use of local water has declined.

Interest Income. Interest income increased in 1999 due to a 110% increase in the cash balances. Interest income increased in both 2000 and 2001 due to active management of the investment portfolio and the realization of gains on fixed income investments that were sold during this period of declining market rates. In 2002, the decrease in interest income was primarily due to the decrease in cash balances due to CIP expenditures and the dramatic decline in interest rates.

Interest Expense. Interest Expense increased in 1999, 2000 and 2001 because of the delivery of the Series 1998 Certificates. In 2002, interest earnings from the debt service reserve fund of \$3 million were used to reduce Interest Expense.

Other. Other non-operating revenues increased in 1999, 2000 and 2001 due to interest received from the Bond Acquisition Fund for the CIP. Also, in 1999 there was a gain of \$1.8 million from the sale of land. In 2002, the decrease was due to the reduction of interest earnings received from the Bond Acquisition Fund because the bond proceeds were fully expended.

Operating Transfers In. In 1999, \$1.2 million of funds previously transferred to the Special Engineering and Capital Improvement Fund in 1997 was returned. The Special Engineering Fund provides services to the CIP and is currently reimbursed for such services based on actual costs.

Operating Transfers Out. In 2001, the increase of \$402,000 was primarily due to a one-time transfer for the Year 2000 Project and an increase of transfers to the Special Training Fund for the Career Development Program.

Transfers to Primary Government. In 2001, \$270,000 was transferred to the General Fund for the purpose of funding the Financial Management Information System which the Department uses to prepare their budget and for the Hispanic Chamber Outreach Program established to benefit small and emerging businesses. In 2002, the increase is due to the reclassification of transfers from Operating Transfers Out to the category Transfers to Primary Government.

Net Income. Net income for Fiscal Years 1998, 1999, 2000, 2001 and 2002 was \$12.2, \$0.04, \$24.7, (\$4.7) and (\$6.8) million, respectively. In 1999, the increase in the Total Cost of Purchased Water and the decrease in the receipt of operating grants caused net income to decrease. In 2000, the increase in net income was due to the increase in sale of water, which included the effects of the rate increase of 6% per year compounded for three years. In 2001, the decrease in net income was due to increased total operating expenses and decreased total operating revenues. In 2002, the decrease in net income was due to the decrease in Interest Income and the decrease in other non-operating revenues due to a decline in interest income from the Bond Acquisition Fund (which interest income is not included in the calculation of debt service coverage).

Table 11 CALCULATION OF DEBT SERVICE COVERAGE Fiscal Years Ended June 30, 1998 to 2002 (Unaudited)

	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	2002 ⁽¹⁾
NET INCOME	\$12,228,084	\$37,791 ⁽²⁾	\$24,674,979(2)	\$(4,730,778)	\$(6,835,843)
ADJUSTMENTS					
Depreciation and Amortization	11,105,888	13,284,102	14,136,250	12,528,800	12,624,432
(Gain) Loss on Sale/Retirement of Fixed					
Assets ⁽³⁾	1,940,456	(1,339,303)	(258,668)	(747,308)	108,438
(Interest Earnings on Construction Fund) ⁽⁴⁾		(13,441,038)	(13,643,658)	(7,966,747)	(294,335)
Capital Grant Receipts	154,125			278,435	
Water System Capacity Charge Revenue	16,979,768	14,671,450	18,454,941	16,581,394	22,249,985
Withdrawal from Rate Stabilization Fund				7,000,000	2,000,000
Deposit to Rate Stabilization Fund		(15,500,000)	(20,000,000)		
Interest Expense		17,063,481	18,707,396	18,667,690	15,043,752
Financing Costs Under Installment Purchase		306,615	306,615	306,615	306,615
NET SYSTEM REVENUE	42,408,321	15,083,098	42,377,855	41,918,101	45,203,044
(Interest Earnings on Reserve Fund)		(884,450)		(54,334)	(3,444,126)
ADJUSTED NET SYSTEM REVENUE	\$42,408,321	\$14,198,648	<u>\$42,377,855</u>	\$41,863,767	<u>\$41,758,918</u>
Principal and Interest Due in Fiscal Year		9,364,768	18,729,536	18,729,536	25,373,936
Interest Earnings on Reserve Fund		(884,450)		(54,334)	(3,444,126)
ADJUSTED DEBT SERVICE		\$8,480,318	\$18,729,536	\$18,675,202	\$21,929,810
Debt Service Coverage – Parity Obligations		1.67	2.26	2.24	1.90

⁽¹⁾ Fiscal Year 2002 figures are preliminary and unaudited.

Source: Office of the City Auditor and Comptroller.

FINANCIAL PROJECTIONS

Set forth below in Table 12 are the projected estimated cash receipts and operating expenditures for the five Fiscal Years ending June 30, 2007. Table 12 incorporates the assumptions described below, including assumed inflation and interest rates, rate increases and the amount of indebtedness to be issued during the projection period. For purposes of complying with the Continuing Disclosure Agreement, the actual results for any future year specified in Table 12 will be published in tabular form, comparable to Table 12. The City has chosen to analyze prospective rate covenant coverage on the basis of projected cash receipts and operating expenses when paid. Accordingly, the method of calculating Adjusted Net System Revenue for Table 12 differs from the method of calculating Adjusted Debt Service Coverage for Table 11. The financial projections contained in Table 12 reflect the issuance of the Series 2002 Bonds as Subordinated Obligations and the prepayment, on an advance basis, of a portion of the Series 1998 Certificates.

⁽²⁾ Interest received from the Bond Acquisition Fund for the Water Utility Enterprise Fund was not recognized in previous fiscal years. The Fiscal Years 1999 and 2000 financial statements have been restated to reflect the additional revenues received. The effect of this adjustment was an increase of \$13,441,038 and \$13,643,658 to Nonoperating Revenues – Other and Net Income, respectively.

⁽³⁾ Gains and losses from the sale or retirement of fixed assets are included as Non-Operating Revenues (Expenses). To remove the effect thereof from the calculation of debt service coverage, gains from the sale or retirement of fixed assets have been deducted from Net Income and losses form the sale or retirement of fixed assets have been added to Net Income.

⁽⁴⁾ Interest received from the Bond Acquisition Fund for the Water Utility Fund is not included in System Revenue, although it is reflected in Net Income.

Table 12
FINANCIAL PROJECTIONS
(In Thousands)

Fiscal Years Ending June 30, 2003 to 2007

	<u>2003</u>	<u>2004</u>	<u>2005</u>	<u>2006</u>	<u>2007</u>
Operating Receipts					
Water Sales ⁽¹⁾	\$211,659	\$231,085	\$249,105	\$269,746	\$291,714
Other Services	8,485	8,646	8,810	8,978	9,148
Rentals	3,530	3,597	3,665	3,735	3,806
Other Revenue	1,831	1,866	1,901	1,937	1,974
Total Operating Receipts	\$225,505	\$245,194	\$263,482	\$284,396	\$306,642
Operating Expenditures					
Water Purchases	\$104,349	\$107,102	\$109,081	\$113,052	\$117,913
Operations and Maintenance	116,440	120,331	<u>125,655</u>	<u>131,047</u>	136,384
Total Operating Expenditures	220,789	227,433	234,736	244,099	254,297
Operating Income	\$4,716	\$17,761	\$28,746	\$40,297	\$52,345
Other Income					
Interest Earnings	\$14,646	\$ 9,408	\$ 9,250	\$12,896	\$ 9,829
Capacity Charges	16,902	16,522	16,894	16,574	16,578
Other Income	(2,221)	(2,818)	(1,128)	(5,095)	(2,097)
Total Other Income	29,337	23,112	25,016	24,375	24,311
Net Income	\$34,053	\$40,873	\$53,762	\$64,673	\$76,656
Transfer from Rate Stabilization Fund	\$ 6,000	\$ 9,000	\$ -0-	\$ -0-	\$ -0-
Adjusted Net System Revenues ⁽²⁾	\$40,053	\$49,873	\$53,762	\$64,673	\$76,656
Less: Adjusted Debt Service – Parity Obligations ⁽²⁾ Less: Debt Service –Subordinated	21,740	19,732	19,733	27,364	27,321
Obligations (3)	3,347	12,416	13,107	13,799	18,324
Remaining Net System Revenues after Debt Service on Parity and					
Subordinated Obligations	\$14,966	\$17,724	\$20,922	\$23,510	\$31,011
Debt Service Coverage –Parity					
Obligations	1.84	2.53	2.72	2.36	2.81

Includes Service Charges and Reclaimed Water Sales.

⁽²⁾ As defined in the Master Installment Purchase Agreement.

⁽³⁾ Includes projected interest earnings on the Reserve Fund for Subordinated Obligations for the Series 2002 Bonds. Reflects principal and interest projected to be payable on the Safe Drinking Water Revolving Loan.

Source: Office of the City Treasurer, Financing Services Division.

Projected Operating Results Assumptions

Table 12 provides the estimated operating revenues and expenses of the Water System for the Fiscal Years ending June 30, 2003 through June 30, 2007. The following are the principal assumptions used in the preparation of these financial projections:

- 1. The Water System will continue to be owned and operated by the City and the facilities contained in the CIP will be constructed and come into operation as currently planned by the City.
- 2. The City will maintain a 45-day operating reserve. In addition, the City will maintain a secondary purchase reserve, available for operating expenditures, equal to 6% of the annual anticipated water purchases beginning in Fiscal Year 2004. It will remain at its current level of 10% in Fiscal Year 2003.
- 3. Operating Expenditures, consisting of the cost of water purchases and operating and maintenance expenses (in thousands), for the Fiscal Years ending June 30, 2003 through June 30, 2007 are expected to be as follows:

	<u>2003</u>	<u>2004</u>	<u>2005</u>	<u>2006</u>	<u>2007</u>
Water Purchases	\$104,349	\$107,102	\$109,081	\$113,052	\$117,913
Operations and Maintenance	<u>\$116,440</u>	<u>\$120,331</u>	<u>\$125,655</u>	<u>\$131,047</u>	<u>\$136,384</u>
Total Operating Expenditures	\$220,789	\$227,433	\$234,736	\$244,099	\$254,297

The assumptions regarding the cost of water purchases are based on the population assumptions described in paragraph 4 below, the inflation assumptions described in the following sentence and the pass-through of anticipated water price increases by MWD and/or CWA. See "WATER SUPPLY." Total operations and maintenance estimates are projected to increase at 4.0% annually for the Fiscal Years ending June 30, 2004 through June 30, 2007.

4. For the Fiscal Years ending June 30, 2003 through June 30, 2007, growth projections for single family residential accounts are based upon the average of the five prior years. This assumption is more conservative than the percentage increase in population growth projected by the San Diego Association of Governments. Water Sales assumptions incorporate: rate increases imposed by the City in each of the five Fiscal Years ending June 30, 2003 through June 30, 2007 (see "WATER SYSTEM FINANCIAL OPERATIONS – City Council Actions Relating To Water Service Charge Changes"), population increases as described above, and the pass-through of water price increases by the MWD and/or CWA. See "WATER SUPPLY."

No increases in capacity charge rates are assumed. New system hook-ups (measured in EDUs) are projected based on the average of the last five years, increased by the projected population percentage increase. These projections are summarized below:

For the Fiscal Years Ending June 30, Projected

	<u>2003</u>	<u>2004</u>	<u>2005</u>	<u>2006</u>	<u>2007</u>
Single-Family Monthly Service Charge (14 HCF) ^(a)	\$32.14	\$34.35	\$36.64	\$39.32	\$42.27
Single-Family Residential Accounts	215,691	218,467	221,278	224,125	227,136
Total Water Sales ^(b) Revenues (000)	\$209,164	\$226,612	\$243,129	\$261,674	\$283,228
Capacity Charges (Per EDU) ^(c)	\$2,500	\$2,500	\$2,500	\$2,500	\$2,500
Annual Increase in EDUs	8,301	8,261	8,447	8,287	8,289
Total Capacity Charge Revenue (000)	\$16,902	\$16,522	\$16,894	\$16,574	\$16,578

⁽a) Assumes water rates are adjusted to reflect changes in the cost of water purchased by the City.

- 5. The City currently expects to fund the capital costs of the CIP from a combination of proceeds of financing, Safe Drinking Water State Revolving loans and System Revenues. The City expects to structure the Safe Drinking Water Revolving loan expected to be received in 2002 as a Subordinated Obligation and this loan has been classified as a Subordinated Obligation for purposes of these projections. Should the Safe Drinking Water Revolving loan in fact be a Parity Obligation, the impact on these projections could be to reduce the debt service coverage for Parity Obligations by approximately .09 or .10 for each of the fiscal years ending 2005, 2006 and 2007.
- 6. The average annual interest rate to finance the CIP is projected to be 4.52% for Fiscal Years ending June 30, 2003 through June 30, 2005, and 6% for Fiscal Years ending June 30, 2006 and June 30, 2007, and the related obligations will be amortized over 30 years from the respective times of issuance, as projected below.

The amount of obligations that will be created in each of the Fiscal Years ending June 30, 2003 through June 30, 2007 to fund the CIP will be as follows:

Fiscal Year Ending June 30,	Principal Amount
2003	\$211,295,000
2004	-0-
2005	0

2006 \$134,935,000 2007 -0-

7. The average annual interest rate on City invested funds including fund balance and other reserves is projected to be 2% in Fiscal Years ending June 30, 2003 and 2004, and 3% thereafter.

⁽b) Reflects water sales only. Does not include reclaimed water sales or service charges. See paragraph 4 above for a description of assumptions underlying the projection of Water Sales.

Reflects the maximum amount that may be charged. Charges could be reduced to \$1,500 for certain business enterprises, affordable housing units and new residential housing in City-approved redevelopment areas.

PENSION PLAN

All Water Department employees along with all other City employees and employees of the San Diego Unified Port District, participate in the City Employees' Retirement System ("CERS"). As a multiple-employer public employee retirement system, CERS acts as a common investment and administrative agent for both the City and the San Diego Unified Port District. CERS provides retirement benefits to all of its members through a variety of benefit plans.

The CERS plans are structured as defined benefit plans in which benefits are based on salary, length of service and age. Water Department employees and other City employees are required to contribute a percentage of their annual salary to CERS. State legislation requires the City to contribute to CERS at rates determined by actuarial valuations.

The City's last actuarial valuation dated June 30, 2001 stated the funding ratio (Valuation of Assets available for Benefits to Total Actuarial Accrued Liability) of the CERS fund to be 89.9%. The CERS fund has an Unfunded Actuarial Accrued Liability (UAAL) of \$284 million as of June 30, 2001. The UAAL is the difference between total actuarial accrued liabilities of \$2.810 billion and assets allocated to funding of \$2.526 billion. The UAAL is amortized over a 30-year period which started July 1, 1991, with each year's amortization payment reflected as a portion of the percentage of payroll representing the employer's contribution rate. As of June 30, 2002 there were 19 years remaining in the amortization period.

LABOR RELATIONS

Approximately 97% of Water Department employees are represented by either the Municipal Employees Association ("MEA") or the American Federation of State and County Municipal Employees ("Local 127"). In general, the MEA represents all technical, professional, and supervisory staff and administrative support personnel. Local 127 represents maintenance workers, laborers, skilled trades positions and equipment operators.

Under the current agreements, as amended, MEA and Local 127 represented employees will receive a 1% salary increase effective December 2002, a 2% increase in December 2003, 2% increase in June 2004, a 3% salary increase effective December 2004 and a 3% increase effective in June 2005. The current agreements expire on June 30, 2005.

INSURANCE

The Water Department is self-insured for workers' compensation and long-term disability and for public liability claims exposure up to \$1 million per occurrence. For liability between \$1 million and \$54 million, the Water Department is covered by the City which purchases insurance from commercial insurers in layers for its public liability exposure.

Table 13 reflects the accrued estimated liabilities and expenditures for liability claims of the Water System for Fiscal Years June 30, 1998 through 2002:

Table 13 LIABILITY CLAIMS ACCRUED ESTIMATED LIABILITIES AND EXPENDITURES

Fiscal Years Ending June 30, 1998 to 2002 (Unaudited)

Fiscal Year	Accrued <u>Estimated Liabilities</u> ⁽¹⁾	Expenditures
1998	\$1,916,928	\$1,624,351
1999	\$4,440,600	\$3,999,539
2000	\$941,000	\$1,231,303
2001	\$(422,815)	\$1,665,002
2002	\$1,324,867	\$2,021,073

⁽¹⁾ Accrued Estimated Liabilities includes actual cash expenditures plus the change in accrued liabilities from the previous fiscal year.

Source: Office of the City Auditor and Comptroller & Water Department.

The City maintains commercial property insurance on all City-owned buildings of an insurable nature, and currently carries property and extended loss insurance coverage of \$200 million per occurrence with a \$25,000 deductible on all City buildings, with earthquake insurance coverage of up to \$50 million on all bond-funded buildings. Depending on availability and affordability of such earthquake insurance, the City may elect not to purchase such coverage in the future. The City does not maintain any casualty insurance on the pipelines of the Water System as such insurance is not commercially available.

Insurance for the projects contemplated in the CIP is provided by the City through an Owner Controlled Insurance Program. This program will provide liability insurance coverage in the amount of \$100 million through layers of "A" rated insurers. It will also provide workers' compensation, covering injuries to all City and contractor workers, and builders risk property insurance covering the work and materials on the Water Department construction sites.

INVESTMENT OF FUNDS

The Treasurer of the City of San Diego, in accordance with the Charter of the City of San Diego, is responsible for investing the unexpended cash in the Treasurer's pooled operating investment fund (the "Investment Pool" or the "City Pool"). Responsibility for the daily investment of funds in the City Pool is delegated to the City's Chief Investment Officer. The City is the only participant in the City Pool; there are no other City Pool participants either voluntary or involuntary. The investment objectives of the City Pool are preservation of capital, liquidity and return.

Oversight and Reporting Requirements

The City Treasurer provides an investment report on a monthly basis to the City Manager, the City Auditor and Comptroller and the City Council and annually presents a statement of investment policy (the "Investment Guidelines") to the City Manager, the City Council and the City Manager's Investment Advisory Committee. The Investment Advisory Committee was established in 1990 and is comprised of the City Auditor and Comptroller, a Deputy City Manager and three investment professionals from the private sector. The Committee is charged with oversight responsibility to review on an ongoing basis the Investment Guidelines and practices of the City Treasurer and recommend changes. Investments in the City Pool are audited by an independent firm of certified public accountants as part of the overall audit of the City's financial statements.

The City's investment section uses outside services to provide investment portfolio valuations and accounting and reporting services. The service provides monthly portfolio valuation, investment performance statistics and other statistical security reports, which are distributed to the City Treasurer's accounting section and the City Auditor and Comptroller's office for review and reconciliation. The City Treasurer's accounting section prepares a series of monthly reports, which includes portfolio market valuation, and distributes these to the Mayor, City Council, City Manager and other officials.

Authorized Investments

Investments in the City Pool are governed by State law and further restricted by the City's Investment Guidelines. The Guidelines have been written with safety of principal being the foremost objective. Permitted investments include U.S. Treasury securities, U.S. Agency securities, corporate medium term notes, money market instruments and the Local Agency Investment Fund (California State Pool). Reverse repurchase agreements ("reverse repos") are restricted to 20% of the base value of the portfolio and are governed by various maturity restrictions as well. The main operating funds of the City are being managed in two separate portfolios. In its management of the "Liquidity" portfolio, comprising about 35% of total funds, the City invests in a variety of debt securities with maturities ranging from one day to one year. The remaining 65% of funds are managed in a separate "Core" portfolio that consists of a variety of debt securities ranging from one day to five years; performance is measured against the Merrill Lynch 1 to 3 year U.S. Treasury Index. Safety of principal and liquidity are the paramount considerations in the management of both portfolios.

The Pool does not engage in securities lending transactions.

Pool Liquidity and Other Characteristics

The City Pool (including both the "Liquidity" and the "Core" portfolios) is highly liquid. As of June 30, 2002, approximately 14% of the pool investments mature within 62 days, 23% within 92 days and 26% within 184 days (on a cumulative basis). As of June 30, 2002, the Pool had a weighted average maturity of 1.35 years (494 days) and its weighted yield was 3.61%. For purposes of calculating weighted average maturity, the City Treasurer treats investments in the State-wide Local Agency Investment Fund (California State Pool) as maturing within one day. The Liquidity portfolio had a duration of 0.34 years and the Core portfolio had a duration of 1.74 years as of June 30, 2002. Duration is a measure of the price volatility of the portfolio and reflects an estimate of the projected increase or decrease in the value of the portfolio based upon a decrease or increase in interest rates. Accordingly, based upon the current portfolio's composition, the Liquidity portfolio should decrease in market value by 0.34% for every 1% increase in market interest rates while the Core portfolio should decrease in market value by 1.74% for every 1% increase in market interest rates. The City Pool's composition is designed with a goal of having sufficient liquid funds available to meet disbursement requirements. The composition and value of investments under management in the City's Investment Pool will vary from time to time depending on cash flow needs of the City, maturity or sale of investments, purchase of new securities, and fluctuations in interest rates.

Table 14 CITY OF SAN DIEGO POOLED INVESTMENT FUND At June 30, 2002 (Unaudited)

			Percent of
<u>Investment Instrument</u>	Book Value	Market Value	Total (1)
U.S. Treasury Bills and Notes	\$ 608,540,139	\$ 606,868,673	44.17%
Federal Agency Securities	511,851,733	521,780,494	37.16
Medium Term Notes (Corporate) (2)	151,177,249	150,470,551	10.98
Money Market Instruments (3)	85,791,667	85,800,000	6.23
Local Agency Investment Fund	<u>20,097,822</u>	20,097,822	1.46
NET ASSETS	\$1,377,458,610	\$1,385,017,540	100.00%

⁽¹⁾ Based on Book Value.

Source: City of San Diego, Office of the City Treasurer

Derivatives

As of June 30, 2002, and at least since October 14, 1997, the City's Investment Pool has had no assets invested in structured notes or derivatives prohibited in California Government Code 53601. As of June 30, 2002, the City had \$7,122,811 invested in a simple step-up security purchased on November 9th, 2001. The City Treasurer defines a derivative as a financial instrument whose value is derived from an underlying asset, price, index or rate, e.g., options, futures or interest rate swaps. A structured note is an investment instrument that can contain within its structure various combinations of derivatives such as imbedded calls and interest rate swaps that will offer returns to an investor within a defined set of parameters and interest rate scenarios, e.g., step-ups, multiple-indexed notes, inverse floaters or leveraged constant maturity notes. The City Treasurer does not define fixed rate notes, debentures with call features or single index non-leveraged floating rate notes, e.g. monthly LIBOR plus or minus a spread, as structured notes. The City Treasurer limits structured notes eligible for purchase to those investments which, at the time of purchase, have no risk of principal loss if held to maturity and offer an estimated return at purchase that exceeds the return on a comparable fixed term investment in the judgment of the City's Investment Officer. The City Treasurer does not allow the purchase of securities that have a negative amortization of principal. In addition, California law prohibits the purchase by local governments of inverse floaters, range notes or interest only strips derived from pools of mortgages.

Reverse Repurchase Agreements

A reverse repo is a transaction in which the City Pool sells a security and concurrently agrees to buy it back from the same party at a later date for a price that includes an interest component for the City Pool's use of the money. Although the City is authorized to use reverse repos, as of June 30, 2002, and since September 18, 1996, the City has had no reverse repos in the City Pool. The Investment Guidelines require that all proceeds of a reverse repo be reinvested in securities whose maturity date or coupon reset date match the maturity of the reverse repo. The Investment Guidelines limit the use of reverse repurchase agreements to 20% of the base value of the City Pool. The City's reverse repo program is monitored daily and reported monthly, as described above under "Oversight and Reporting Requirements."

These notes consist of both fixed and floating securities. The notes with floating interest rates are reset at intervals ranging from one day to three months.

⁽³⁾ These securities consist of commercial paper, negotiable certificates of deposit, term and overnight repurchase agreements, banker's acceptances, bank notes and thrift notes.

TAX MATTERS

In the opinion of Orrick, Herrington & Sutcliffe LLP and Webster & Anderson, Co-Bond Counsel, based upon an analysis of existing laws, regulations, rulings, and court decisions, and assuming, among other matters, the accuracy of certain representations and compliance with certain covenants, interest on the Series 2002 Bonds is excluded from gross income for federal income tax purposes under Section 103 of the Internal Revenue Code of 1986 (the "Code") and is exempt from State of California personal income taxes. Co-Bond Counsel are of the further opinion that interest on the Series 2002 Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes, although Co-Bond Counsel observe that such interest is included in adjusted current earnings when calculating corporate alternative minimum taxable income. A complete copy of the proposed form of opinions of Co-Bond Counsel is set forth in APPENDIX G.

To the extent the issue price of any maturity of the Series 2002 Bonds is less than the amount to be paid at maturity of such Series 2002 Bonds (excluding amounts stated to be interest and payable at least annually over the term of such Series 2002 Bonds), the difference constitutes "original issue discount," the accrual of which, to the extent properly allocable to each owner thereof, is treated as the interest on the Series 2002 Bonds which is excluded from gross income for federal income tax purposes and is exempt from State of California personal income taxes. For this purpose, the issue price of a particular maturity of the Series 2002 Bonds is the first price at which a substantial amount of such maturity of the Series 2002 Bonds is sold to the public (excluding bond houses, brokers, or similar persons or organizations acting in the capacity of underwriters, placement agents or wholesalers). The original issue discount with respect to any maturity of the Series 2002 Bonds accrues daily over the term to maturity of such Series 2002 Bonds on the basis of a constant interest rate compounded semiannually (with straight-line interpolations between compounding dates). The accruing original issue discount is added to the adjusted basis of such Series 2002 Bonds to determine taxable gain or loss upon disposition (including sale, redemption, or payment on maturity) of the Series 2002 Bonds. Owners of the Series 2002 Bonds should consult their own tax advisors with respect to the tax consequences of ownership of the Series 2002 Bonds with original issue discount, including the treatment of purchasers who do not purchase the Series 2002 Bonds in the original offering to the public at the first price at which a substantial amount of the Series 2002 Bonds is sold to the public.

Series 2002 Bonds purchased, whether at original issuance or otherwise, for an amount greater than their principal amount payable at maturity (or, in some cases, at their earlier call date) ("Premium Bonds") will be treated as having amortizable bond premium. No deduction is allowable for the amortizable bond premium in the case of bonds, like the Premium Bonds, the interest on which is excluded from gross income for federal income tax purposes. However, a purchaser's basis in a Premium Bond, and under Treasury Regulations the amount of tax exempt interest received, will be reduced by the amount of amortizable bond premium properly allocable to such purchaser. Owners of Premium Bonds should consult their own tax advisors with respect to the proper treatment of amortizable bond premium in their particular circumstances.

The Code imposes various requirements that must be met in order for interest on the Series 2002 Bonds to be excluded from gross income for federal income tax purposes. The City and the Authority have made representations related to certain of these requirements and have covenanted to comply with certain of these requirements. Inaccuracy of these representations or failure to comply with these covenants may result in interest on the Series 2002 Bonds being included in gross income for federal income tax purposes, possibly from the date of original issuance of the Series 2002 Bonds. The opinion of Co-Bond Counsel assumes the accuracy of these representations and compliance with these covenants. Co-Bond Counsel have not undertaken to determine (or to inform any person) whether any actions taken (or not taken) or events occurring (or not occurring) after the date of issuance of the Series 2002 Bonds may adversely affect the value of, or the tax status of interest on, the Series 2002 Bonds.

Certain requirements and procedures contained or referred to in the Indenture, the Installment Purchase Agreement, the Tax Certificate and other relevant documents may be changed and certain actions (including, without limitation, defeasance of the Series 2002 Bonds) may be taken or omitted under the circumstances and subject to the terms and conditions set forth in such documents. Co-Bond Counsel express no opinion as to any Series 2002 Bond or the interest thereon if any such change occurs or action is taken upon the advice or approval of Co-Bond Counsel other than Orrick, Herrington & Sutcliffe LLP and Webster & Anderson.

Although Co-Bond Counsel are of the opinion that interest on the Series 2002 Bonds is excluded from gross income for federal income tax purposes and is exempt from State of California personal income taxes, the ownership or disposition of, or the accrual or receipt of interest on the Series 2002 Bonds, may affect a Beneficial Owner's federal or state tax liability. The nature and extent of these other tax consequences will depend upon the particular tax status of the Beneficial Owner or the Beneficial Owner's other items of income or deduction. Co-Bond Counsel express no opinion regarding any such other tax consequences.

In addition, no assurance can be given that any future legislation, including amendments to the Code, if enacted into law, or changes in interpretation of the Code, will not cause interest on the Series 2002 Bonds to be subject, directly or indirectly, to federal income taxation, or otherwise prevent owners of the Series 2002 Bonds from realizing the full current benefit of the tax status of such interest. Prospective purchasers of the Series 2002 Bonds should consult their own tax advisers regarding any pending or proposed federal tax legislation. Further, no assurance can be given that the introduction or enactment of any such future legislation, or any action of the Internal Revenue Service ("IRS"), including but not limited to regulation, ruling, or selection of the Series 2002 Bonds for audit examination, or the course or result of any IRS examination of the Series 2002 Bonds, or obligations which present similar tax issues, will not affect the market price for the Series 2002 Bonds.

FEASIBILITY ENGINEER

O'Brien and Gere Engineers, Inc. (the "Consulting Engineer") has prepared a report dated September 27, 2002, attached hereto as APPENDIX D (the "Engineer's Statement of Feasibility"). The Engineer's Statement of Feasibility should be read in its entirety for an understanding of the Consulting Engineer's conclusions concerning the Water System.

INDEPENDENT ACCOUNTANTS

The financial statements of the Water Utility Fund for the Fiscal Years ended June 30, 2001 and 2000, attached hereto as APPENDIX F to this Official Statement have been audited by Calderon, Jaham & Osborn, independent auditors, as set forth in their report, dated November 22, 2001.

RATINGS

Fitch Ratings ("Fitch"), Moody's Investors Service ("Moody's") and Standard & Poor's ("S&P") have assigned underlying ratings of "A+," "A1" and "A+," respectively, to the Series 2002 Bonds. Fitch, Moody's and S&P have assigned ratings of "AAA," "Aaa" and "AAA" based upon the issuance of the Policy by the Insurer. Such ratings reflect only the views of such organizations and any desired explanation of the significance of such ratings should be obtained from the rating agency furnishing the same, at the following addresses: Fitch Ratings, One State Street Plaza, New York, NY 10004; Moody's Investors Service, Inc., 99 Church Street, New York, New York 10007; and Standard & Poor's, 55 Water, New York, New York 10004. Such ratings are not a recommendation to buy, sell or hold the Series 2002 Bonds. Generally, a rating agency bases its rating on the information and materials furnished to it and on investigations, studies and assumptions of its own. There is no assurance that such ratings will continue for any given period of time or that such ratings will not be revised downward or withdrawn entirely by the rating agencies, if in the judgment of such rating agencies, circumstances warrant. Any such downward revision or withdrawal of such ratings may have an adverse effect on the market price or marketability of the Series 2002 Bonds.

FINANCIAL ADVISOR

Montague DeRose and Associates, LLC, Walnut Creek, California and Kitahata & Company, San Francisco, California have acted as financial advisors (the "Financial Advisors") to the City in connection with the issuance of the Series 2002 Bonds. The Financial Advisors are not obligated to undertake, and have not undertaken to make, an independent verification or assume responsibility for the accuracy, completeness, or fairness of the information contained in this Official Statement.

CERTAIN LEGAL MATTERS

The validity of the Series 2002 Bonds and certain other legal matters are subject to the approving opinion of Orrick, Herrington & Sutcliffe LLP, Los Angeles, California and Webster & Anderson, Oakland, California, Co-Bond Counsel. The form of opinion Co-Bond Counsel proposes to render is attached as APPENDIX G. Co-Bond Counsel, as such undertake no responsibility for the accuracy, completeness or fairness of this Official Statement. Certain legal matters are subject to the approval of Fulbright & Jaworski, Underwriters' Counsel, Casey Gwinn, Esq., the City Attorney of the City of San Diego and General Counsel to the Authority and Orrick, Herrington & Sutcliffe LLP, Los Angeles, California, Disclosure Counsel.

LITIGATION

There is no litigation pending concerning the validity of the Series 2002 Bonds, the corporate existence of the City, the Corporation or the Authority, or the title of the officers thereof to their respective offices.

UNDERWRITING

The Series 2002 Bonds are to be purchased by Morgan Stanley & Co. Incorporated, Salomon Smith Barney and E. J. De La Rosa & Co., Inc., as Underwriters, at a price which includes an underwriters' discount of \$1,278,928 and a net original issue premium of \$18,238,710. The Underwriters are committed to purchase all the Series 2002 Bonds if any are purchased. The Underwriters may offer and sell the Series 2002 Bonds to certain dealers (including depositing the Series 2002 Bonds into investment trusts) and others at prices lower than the offering prices stated on the cover of this Official Statement. After the initial public offering, the public offering prices of the Series 2002 Bonds may be changed from time to time by the Underwriters.

VERIFICATION

The arithmetical accuracy of certain computations included in the schedules provided by the Underwriters on behalf of the City relating to (a) computation of anticipated receipts of principal and interest on the escrow securities and the anticipated payments of principal and interest represented by the Series 1998 Certificates to be prepaid on an advance basis with a portion of the proceeds of the Series 2002 Bonds, and (b) computation of the yields on the Series 2002 Bonds and the escrow securities was examined by The Arbitrage Group, Inc. Such computations were based solely upon assumptions and information supplied by the Underwriters on behalf of the City. The Arbitrage Group, Inc. has restricted its procedures to examining the arithmetical accuracy of certain computations and has not made any study or evaluation of the assumptions and information upon which the computations are based and, accordingly, has not expressed an opinion on the data used, the reasonableness of the assumptions, or the achievability of future events.

CONTINUING DISCLOSURE

The Authority has determined that no financial or operating data concerning the Authority is material to an evaluation of the offering of the Series 2002 Bonds or to any decision to purchase, hold or sell the Series 2002 Bonds and the Authority will not provide any such information. The City has undertaken all responsibilities for any continuing disclosure to Bondholders as described below, and the Authority shall have no liability to the Bondholders of the Series 2002 Bonds or any other person with respect to Securities and Exchange Commission Rule 15c2-12 under the Securities Exchange Act of 1934 ("Rule 15c2-12").

The City has covenanted for the benefit of Bondholders and beneficial owners of the Series 2002 Bonds to provide certain financial information and operating data relating to the City by not later than 270 days following the end of the City's Fiscal Year (which Fiscal Year currently ends June 30) (the "Annual Report"), commencing with an Annual Report for the Fiscal Year ending June 30, 2002, and to provide notices of the occurrence of certain enumerated events, if material. The Annual Report will be filed by the Trustee, as the initial dissemination agent (the "Dissemination Agent") on behalf of the City with each Nationally Recognized Municipal Securities Information Repository and the State Repository, if any. (The City will also cause the Trustee to file copies of the Official Statement with a Nationally Recognized Municipal Securities Information Repository). The notices of

material events will be filed by the Dissemination Agent on behalf of the City with the Municipal Securities Rulemaking Board, each Nationally Recognized Municipal Securities Information Repository and the State Repository, if any. The specific nature of the information to be contained in the Annual Report or the notices of material events is summarized below under the caption APPENDIX C – "FORM OF CONTINUING DISCLOSURE AGREEMENT." These covenants have been made in order to assist the Underwriters in complying with Rule 15c2-12(b)(5). The City has never failed to comply in all material respects with any previous undertakings with regard to said Rule to provide annual reports or notices of material events.

AVAILABILITY OF DOCUMENTS

Copies of the Official Statement, the Indenture, the Installment Purchase Agreement, the 2002 Supplement, the Assignment Agreement, the Continuing Disclosure Agreement, the City Charter, the City of San Diego Water Department audited financial statements and additional information relating to the City and the Series 2002 Bonds will be available, upon written request, from the office of the City Clerk, City Administration Building, 202 C Street, MS 2A, San Diego, California 92101.

MISCELLANEOUS

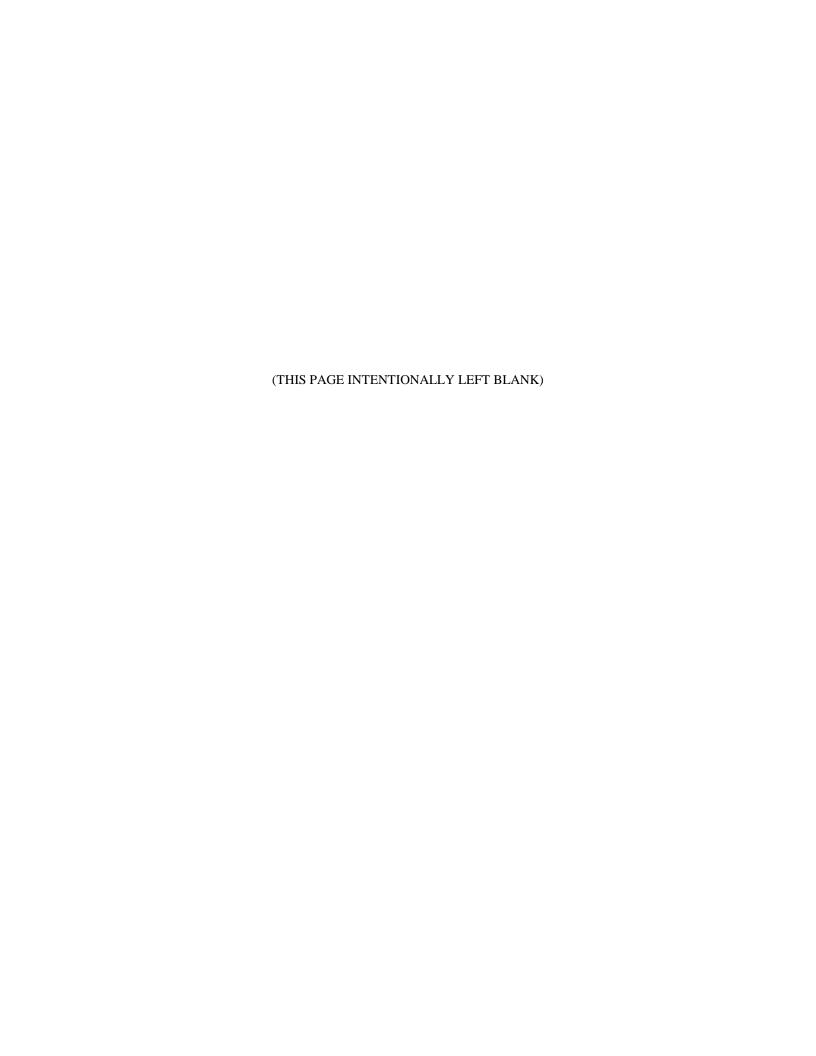
The purpose of this Official Statement is to supply information to prospective buyers of the Series 2002 Bonds. References are made herein to certain documents and reports that are brief summaries thereof that do not purport to be complete or definitive, and reference is made to such documents and reports for full and complete statement of the contents thereof.

Any statements in this Official Statement involving matters of opinion, whether or not expressly so stated, are intended as such and not as representations of fact. This Official Statement is not to be construed as a contract or agreement between the City or the Authority and the purchasers or holders of any of the Series 2002 Bonds. The preparation and distribution of this Official Statement have been authorized by the City and the Authority.

CITY OF SAN DIEGO

By:	/s/ Michael T. Uberuaga
•	City Manager
PUBLIC FACILITIES FINANCING AUTHORITY	
OF THE CITY O	F SAN DIEGO
D.	// Level Cover
ву:	/s/ Joseph Craver
Chair	

APPENDIX A SUMMARY OF PRINCIPAL LEGAL DOCUMENTS



APPENDIX A

SUMMARY OF PRINCIPAL LEGAL DOCUMENTS

The following is a summary of certain definitions and provisions set forth in the Indenture, the Master Installment Purchase Agreement and the 2002 Supplement to the Master Installment Purchase Agreement relating to the Series 2002 Bonds. These summaries do not purport to be comprehensive, and reference should be made to such documents for a full and complete statement of such definitions and provisions. Copies of these documents are available from the Trustee.

INDENTURE

The Indenture sets forth certain terms of the Bonds, the nature and extent of the security for the Bonds, various rights of the Owners of the Bonds, rights, duties and immunities of the Trustee and the rights and obligations of the Authority. Certain provisions of the Indenture are summarized below. Other provisions are summarized in this Official Statement under the captions "DESCRIPTION OF THE SERIES 2002 BONDS" and the "SECURITY FOR THE SERIES 2002 BONDS." This summary does not purport to be complete or definitive and is qualified in its entirety by reference to the full terms of the Indenture.

Selected Definitions

"Acquisition Costs" means all costs of acquiring, constructing, installing or improving the Project, including but not limited to:

- (1) all costs which the Authority or the City shall be required to pay to a manufacturer, vendor or contractor or any other person under the terms of any contract or contracts for the acquisition, construction, installation or improvement of the Project;
- (2) obligations of the Authority or the City incurred for labor and materials (including obligations payable to the Authority or the City for actual out-of-pocket expenses of the Authority or the City) in connection with the acquisition, construction, installation or improvement of the Project, including reimbursement to the Authority or the City for all advances and payments made in connection with the Project prior to or after delivery of the Bonds;
- (3) the costs of performance or other bonds and any and all types of insurance that may be necessary or appropriate to have in effect during the course of acquisition, construction, installation or improvement of the Project;
- (4) all costs of engineering and architectural services, including the actual out-of-pocket costs of the Authority and the City for test borings, surveys, estimates, plans and specifications and preliminary investigations therefor, development fees and sales commissions, and for supervising acquisition, construction, installation and improvement, as well as for the performance of all other duties required by or consequent to the proper acquisition, construction, installation or improvement of the Project; and
- (5) any sums required to reimburse the Authority or the City for advances made by the Authority or the City for any of the above items or for any other costs incurred and for work done by the Authority or the City which are properly chargeable to the acquisition, construction, installation or improvement of the Project.
- "Additional Bonds" means all revenue bonds of the Authority (other than the Series 2002 Bonds) which are secured by Subordinated Installment Payments authorized by and at any time Outstanding pursuant to the Indenture and executed, issued and delivered in accordance therewith.

- "Annual Debt Service" means, for any Fiscal Year, the sum of:
- (1) the interest payable on all Outstanding Bonds in such Fiscal Year, assuming that all Outstanding Serial Bonds are retired as scheduled and that all Outstanding Term Bonds are redeemed or paid from sinking fund payments as scheduled (except to the extent that such interest is to be paid from the proceeds of the sale of any Bonds);
 - (2) the principal amount of all Outstanding Serial Bonds maturing by their terms in such Fiscal Year; and
- (3) the principal amount of all Outstanding Term Bonds required to be redeemed or paid in such Fiscal Year (together with the redemption premiums, if any, thereon).
 - "Auditor and Comptroller" means the Auditor and Comptroller of the City.
- "Authorized Denominations" means \$5,000 and any integral multiple thereof, with respect to the Series 2002 Bonds.
 - "Beneficial Owner" shall have the meaning set forth in the Continuing Disclosure Agreement.
- "Business Day" means a day other than Saturday or Sunday or a day on which banking institutions in California are required or authorized to remain closed, or on which the New York Stock Exchange is closed. If the date for making any payment or the last date for performance of any act or the exercising of any right, as provided in the Indenture, shall not be a Business Day, such payment may be made or act performed or right exercised on the next succeeding Business Day, with the same force and effect as if done on the nominal date provided in the Indenture, and, unless otherwise specifically provided in the Indenture, no interest shall accrue for the period from and after such nominal date.
- "Certificate of Completion" means a Certificate of the City filed with the Trustee, stating that the Components of the Project being financed with the proceeds of the Bonds have been acquired, constructed, installed and improved and that all Acquisition Costs have been paid or provided for.
- "Certificate of the Authority" means an instrument in writing signed by the Chair, the Vice Chair or the Secretary of the Authority, or by any other officer of the Authority duly authorized by the Authority for that purpose.
- "Certificate of the City" means an instrument in writing signed by the City Manager, Deputy City Manager or City Attorney of the City, or by any other official of the City duly authorized by the City for that purpose.
- "Charter" means the Charter of the City as it now exists or may be amended, and any new or successor Charter.
- "City" means the City of San Diego, a municipal corporation duly organized and existing under the Charter and the Constitution of the State of California.
- "Code" means the Internal Revenue Code of 1986, as amended, and the regulations promulgated thereunder.
 - "Components" means components of the Project specified in a Supplement.
- "Corporation" means the San Diego Facilities and Equipment Leasing Corporation, a nonprofit public benefit corporation organized and existing under the laws of the State of California.

"Costs of Issuance" means all items of expense directly or indirectly payable by or reimbursable to the City or the Authority relating to the issuance, sale and delivery of the Bonds and the execution and delivery of the Indenture and the Installment Purchase Agreement, filing and recording costs, settlement costs, printing costs, reproduction and binding costs, initial fees and charges of the Trustee (including legal fees), financing discounts, legal fees and charges, insurance fees and charges, financial and other professional consultant fees, fees and charges of rating agencies and/or for credit ratings, fees for transportation and safekeeping of the Bonds and charges and fees in connection with the foregoing.

"Credit Provider" means the Insurer with respect to the Series 2002 Bonds and each Credit Provider (as defined in the Installment Purchase Agreement) for and with respect to a series of Additional Bonds.

"DTC" means The Depository Trust Company, New York, New York, and its successors.

"Federal Securities" means the following securities:

- (1) United States Treasury Bills, Bonds, and Notes for which the full faith and credit of the United States are pledged for payment of principal and interest.
- (2) Direct obligations issued by the following agencies of the United States Government: the Federal Farm Credit Bank System (FFCB), the Federal Home Loan Bank Board (FHLB), the Federal National Mortgage Association (FNMA), the Federal Home Loan Mortgage Association (FHLMC), the Student Loan Marketing Association (SLMA) and the Tennessee Valley Authority (TVA). The minimum acceptable rating for any investment issued by these agencies will be AAA by at least two nationally recognized rating agencies.
- (3) Mortgage Backed Securities (except stripped mortgage securities) issued by the Federal National Mortgage Association (FNMA) and Government National Mortgage Association (GNMA).

'Structured securities' (including flip notes, range notes, inverse floaters and step-ups) will not be considered Federal Securities. However, simple floaters (based on single, interest rate based indices) and simple callable securities may be included as Federal Securities.

"Financial Newspaper" means *The Wall Street Journal* or *The Bond Buyer* or, any other newspaper or journal printed in the English language publishing financial news and selected by the Trustee.

"Installment Purchase Agreement" means the Master Installment Purchase Agreement, dated as of August 1, 1998, entered into between the Corporation, as seller, and the City, as purchaser, as originally executed and as it may from time to time be amended or supplemented pursuant to the provisions of the Indenture and thereof.

"Interest Payment Date" means, with respect to the Series 2002 Bonds, February 1, 2003 and each February 1 and August 1 thereafter until the Series 2002 Bonds are paid or deemed paid in full, and with respect to Additional Bonds, means the Interest Payment Date(s) specified in a Supplemental Indenture related to such Additional Bonds thereof.

"Moody's" means Moody's Investors Service, a Delaware corporation, and its successors, and if such corporation shall no longer perform the functions of a securities rating agency, "Moody's" shall be deemed to refer to any other nationally recognized securities rating agency designated by the Authority and the City.

"Outstanding" when used as of any particular time with reference to Bonds and Additional Bonds, means all Bonds and Additional Bonds except:

- (a) Bonds theretofore cancelled by the Trustee or surrendered to the Trustee for cancellation;
- (b) Bonds paid or deemed to have been paid within the meaning of the Indenture;

- (c) Bonds beneficially owned by the City or the Authority; and
- (d) Bonds in lieu of or in substitution for which other Bonds shall have been executed by the Authority and authenticated and delivered pursuant to the Indenture.

"Owner" means any person who shall be the registered owner of any Outstanding Bond as indicated in the registration books of the Trustee.

"Permitted Investments" means any of the following to the extent then permitted by applicable law:

- (1) Federal Securities.
- (2) Obligations of any state, territory or commonwealth of the United States of America or any political subdivision thereof or any agency or department of the foregoing; provided, that at the time of their purchase such obligations are rated not lower than AAA by two nationally recognized rating agencies.
- (3) Bonds, notes, debentures or other evidences of indebtedness issued or guaranteed by any corporation which are, at the time of purchase, rated by Moody's and S&P in their respective highest short-term rating categories, or, if the term of such indebtedness is longer than three years, rated not lower than AAA by two nationally recognized rating agencies.
- (4) Taxable commercial paper or tax-exempt commercial paper rated at least A1/P1 by two nationally recognized rating agencies.
- Variable rate obligations required to be redeemed or purchased by the obligor or its agent or designee upon demand of the holder thereof secured as to such redemption or purchase requirement by a liquidity agreement with a corporation and as to the payment of interest and principal either upon maturity or redemption (other than upon demand by the holder thereof) thereof by an unconditional credit facility of a corporation; provided, that the variable rate obligations themselves are rated in their respective highest rating categories for its short-term rating, if any, and not lower than A for its long-term rating, if any, by two nationally recognized rating agencies, and that the corporations providing the liquidity agreement and credit facility have, at the date of acquisition of the variable rate obligation by the Trustee, an outstanding issue of unsecured, uninsured and unguaranteed debt obligations rated not lower than A by two nationally recognized rating agencies.
- (6) Deposits accounts or certificates of deposit, whether negotiable or non-negotiable, issued by a state or national bank (including the Trustee) or a state or federal savings and loan association or a state-licensed branch of a foreign bank, provided that such certificates of deposit or deposit accounts shall be either (i) continuously and fully insured by the Federal Deposit Insurance Corporation or (ii) have maturities of not more than 365 days (including certificates of deposit) and are issued by any state or national bank or a state or federal savings and loan association, the short term obligations of which are rated in the highest short term letter and numerical rating category by two nationally recognized rating agencies.
- (7) Bills of exchange or time drafts drawn on and accepted by a commercial bank, otherwise known as bankers acceptances, which bank has short-term obligations outstanding which are rated by two nationally recognized rating agencies in their respective highest short-term rating categories, and which bankers acceptances mature not later than 270 days from the date of purchase.
- (8) Any repurchase agreement with any bank or trust company organized under the laws of any state of the United States or any national banking association (including the Trustee), or a state-licensed branch of a foreign bank, having a minimum permanent capital of one hundred million dollars (\$100,000,000) and with short-term debt rated by two nationally recognized rating agencies in their respective three highest short-term rating categories or any government bond dealer reporting to, trading with, and recognized as a primary dealer by, the Federal Reserve Bank of New York, which agreement is secured by any one or more of the securities and obligations described in clause (1) above and having maturities equal to or less than 10 years from the date of delivery, which shall have a market

value (exclusive of accrued interest and valued at least monthly) not less than 102% of the principal amount of such investment and shall be lodged with the Trustee or other fiduciary, as custodian for the Trustee, by the bank, trust company, national banking association or bond dealer executing such repurchase agreement, and the entity executing each such repurchase agreement required to be so secured shall furnish the Trustee with an undertaking satisfactory to it that the aggregate market value of all such obligations securing each such repurchase agreement (as valued at least monthly) will be an amount equal to the principal amount of such repurchase agreement and the Trustee shall be entitled to rely on each such undertaking.

- (9) Any cash sweep or similar account arrangement of or available to the Trustee, the investments of which are limited to investments described in clauses (1), (2) and (8) of this definition and any money market fund, the entire investments of which are limited to investments described in clauses (1), (2) and (8) of this definition and which money market fund is rated in their respective highest rating categories by two nationally recognized rating agencies.
- (10) Any guaranteed investment contract, including forward delivery agreements ("FDAs") and forward purchase agreements ("FPAs"), with a financial institution or insurance company which has at the date of execution thereof an outstanding issue of unsecured, uninsured and unguaranteed debt obligations or a claims paying ability rated not lower than the Aa/AA/AA category by two nationally recognized rating agencies. Only Permitted Investments described in clause (1) above and having maturities equal to or less than 10 years from their date of delivery will be considered eligible for any collaterlization/delivery purposes for guaranteed investment contracts or FDAs or FPAs.
- (11) Certificates, notes, warrants, bonds or other evidence of indebtedness of the State or of any political subdivision or public agency thereof which are rated in the highest short-term rating category or within one of the three highest long-term rating categories of two nationally recognized rating agencies (excluding securities that do not have a fixed par value and/or whose terms do not promise a fixed dollar amount at maturity or call date).
- (12) For amounts less than \$10,000, interest-bearing demand or time deposits (including certificates of deposit) in a nationally or state-chartered bank, or a state or federal savings and loan association in the State, fully insured by the Federal Deposit Insurance Corporation, including the Trustee or any affiliate thereof.
- (13) Investments in taxable money market funds or portfolios restricted to obligations maturing in one year or less and which funds or portfolios are rated in either of the two highest rating categories by two nationally recognized rating agencies or have or are portfolios guaranteed as to payment of principal and interest by the full faith and credit of the United States of America.
- Any obligations which are then legal investments for moneys of the Authority under the laws of the State; provided, that if such investments are not required to be collateralized or insured such investments shall be issued by entities the debt securities of which are rated in one of the two highest short-term or long-term rating categories by two nationally recognized rating agencies; provided further, that any repurchase agreements must be fully secured by collateral security described in clause (1) of this definition, which collateral (i) is held by the Trustee or a third party agent during the term of such repurchase agreement and in which collateral the Trustee has a perfected first security interest; (ii) has a market value determined at least every thirty days at least equal to 103% of the amount so invested; and (iii) may be liquidated within seven days if the market value of such collateral is at any time less than the amount so invested.
- (15) Investments in the Local Agency Investment Fund created pursuant to Section 16429.1 of the California Government Code.
- (16) Shares of beneficial interest in diversified management companies investing exclusively in securities and obligations described in clauses (1) through (15) of this definition and which companies are rated in their respective highest rating categories by two nationally recognized rating agencies or have an investment advisor registered with the Commission with not less than five years' experience investing in such securities and obligations and with assets under management in excess of five hundred million dollars (\$500,000,000).

- (17) For amounts held in the Acquisition Fund only, any interest rate swap agreement with a counterparty which has at the date of execution thereof an unsecured, uninsured and nonguaranteed long-term obligation rated not lower than AAA by two nationally recognized rating agencies; provided, that such counterparty may satisfy such rating requirements by providing an insurance policy for its obligations under any such swap agreement from an insurer whose unsecured ratings are in the rating categories required above, or alternatively by providing an unconditional, irrevocable, unsecured, uninsured and nonguaranteed guaranty of any other entity, including an affiliated entity, whose unsecured ratings are in the rating categories required above.
- (18) Any other obligations which are approved in writing by Moody's (if Moody's is then rating the Bonds), S&P (if S&P is then rating the Bonds) and any Credit Providers (if so required by such Credit Provider).
- "Pre-Refunded Municipals" means any bonds or other obligations of any state of the United States of America or of any agency, instrumentality or local governmental unit of any such state which are not callable at the option of the obligor prior to maturity or as to which irrevocable instructions have been given by the obligor to call on the date specified in the notice; and which are rated, based on the escrow, in the highest rating category of Moody's and S&P.
- **"Principal Payment Date"** means, with respect to the Series 2002 Bonds, August 1 of each year until the Series 2002 Bonds are deemed paid in full and, with respect to any Additional Bonds, the Principal Payment Date or Dates specified in the Supplemental Indenture with respect to such Additional Bonds.
- **"Project"** means the acquisition, construction, installation and improvements to the City's Water System, as more specifically described in Exhibit A to the Installment Purchase Agreement.
 - "Rebate Requirement" means the Rebate Requirement as defined in the Tax Certificate.
- "Record Date" means, with respect to the Series 2002 Bonds, the fifteenth day of the month immediately preceding an Interest Payment Date, whether or not such day is a Business Day.
- "Reserve Fund Credit Facility" means any letter of credit, line of credit, surety bond, insurance policy or other credit source deposited with the Trustee pursuant to the Indenture.
- "Reserve Requirement" means, as of the date of delivery of Bonds (including the Series 2002 Bonds) (and giving effect to the current defeasance of any Bonds pursuant to the Indenture), the least of (1) 10% of the aggregate Outstanding par amount of the Bonds; (2) aggregate maximum Annual Debt Service of the Bonds for the current or any future Fiscal Year; or (3) 125% of aggregate average Annual Debt Service of the Bonds. This test may be reapplied by the City as frequently as each August 1, commencing August 1, 2003, and if the result is a reduction in the Reserve Requirement, so long as no Event of Default (or an event the passage of time or giving of notice would result in an Event of Default) has occurred or is continuing, any excess amount in the Reserve Fund shall, at the City's option, be retained in the Reserve Fund or delivered to the Trustee upon the direction of the City. There will be no obligation on the part of the City to increase the amount in the Reserve Fund if the application of the test would otherwise require. For purposes of determining if the amount on deposit in the Reserve Fund equals the Reserve Requirement, any Reserve Fund Credit Facility shall be deemed to be a deposit in the face amount or stated amount of such Reserve Fund Credit Facility, less any unreimbursed drawings or other amounts not reinstated under such Reserve Fund Credit Facility.
- "S&P" means Standard & Poor's Ratings Group, a division of the McGraw-Hill Companies, Inc., a New York Corporation, and its successors, and if such corporation shall for any reason no longer perform the functions of a securities rating agency, "S&P" shall be deemed to refer to any other nationally recognized securities rating agency designated by the Authority and the City.
- **"Subordinated Installment Payments"** means the Installment Payments which are Subordinated Obligations (as defined in the Installment Purchase Agreement) scheduled to be paid by the City under and pursuant to any Supplement that has been assigned to the Trustee (as assignee of the Authority) to secure any Bonds.

- "Supplemental Indenture" means any indenture then in full force and effect which has been duly executed and delivered by the Authority and the Trustee amending or supplementing the Indenture; but only if and to the extent that such Supplemental Indenture is specifically authorized under the Indenture.
- **"2002 Subordinated Installment Payments"** means the Subordinated Installment Payments specified in the 2002 Supplement which are to pay the purchase price of the 2002 Components.
- **"2002 Components"** means the components of the Project specified in the 2002 Supplement for which the City will be making 2002 Subordinated Installment Payments as specified in the 2002 Supplement.
 - "2002 Supplement" means the 2002 Supplement to the Installment Purchase Agreement.
- "Tax Certificate" means each certificate delivered with respect to the Series 2002 Bonds and any Additional Bonds on which it is intended that interest thereon will be excluded from gross income pursuant to Section 103 of the Code.
 - "Treasurer" means the Treasurer of the City.
- "Trustee" means Wells Fargo Bank, National Association, a national banking association existing under the laws of the United States, or any other association or corporation which may at any time be substituted in its place as provided in the Indenture.
- "Water System" means any and all facilities, properties, improvements and works at any time owned, controlled or operated by the City as part of the public utility system of the City for water purposes, for the development, obtaining, conservation, production, storage, treatment, transmission, furnishing and distribution of water and its other commodities or byproducts for public and private use (whether located within or without the City), and any related or incidental operations designated by the City as part of the Water System, including reclaimed and re-purified water.
- "Written Request of the Authority" means an instrument in writing signed by the Chair, the Vice Chair, and the Secretary of the Authority, or by any other officer of the Authority duly authorized by the Authority for that purpose.
- "Written Request of the City" means an instrument in writing signed by the City Manager or the Deputy City Manager or any other official of the applicable administrative departments of the City duly authorized by the City for that purpose.

General

The Indenture sets forth the terms of the Series 2002 Bonds and any Additional Bonds, the nature and extent of the security therefor, various rights of the Owners, rights and duties and immunities of the Trustee and the rights and obligations of the Authority. Certain provisions of the Indenture are summarized below.

Additional Bonds

Issuance of Additional Bonds. The Authority may at any time issue Additional Bonds payable from the Revenues as provided in the Indenture and secured by a pledge of the Revenues as provided in the Indenture equal to the pledge securing the Outstanding Bonds theretofore issued thereunder, but only subject to the following specific conditions, which are made conditions precedent to the issuance of any such Additional Bonds:

(a) The Authority shall be in compliance with all agreements and covenants contained in the Indenture and in the 2002 Supplement and any other Supplement executed and delivered from time to time pursuant to the Indenture.

- (b) The requirements set forth in the Installment Purchase Agreement shall have been satisfied.
- (c) The issuance of such Additional Bonds shall have been authorized by the Authority and shall have been provided for by Supplemental Indenture which shall specify the following:
 - (1) the purpose for which such Additional Bonds are to be issued; provided that such Additional Bonds shall be applied solely for the purpose of: (i) financing or refinancing additional improvements to the Project, including payment of all costs incidental to or connected with such financing or refinancing (including payment of interest during acquisition and construction, to fund the Reserve Fund and to pay Costs of Issuance); and/or (ii) refunding any Bonds or the 1998 Certificates then Outstanding (including payment of all costs incidental to or connected with such refunding);
 - (2) the authorized principal amount and designation of such Additional Bonds;
 - (3) the dated date and the maturity dates of, and the Mandatory Sinking Account Payment Dates, if any, for such Additional Bonds;
 - (4) the Interest Payment Dates (which may reflect interest that is fixed or adjustable from time to time) and Record Dates for such Additional Bonds;
 - (5) the Authorized Denominations for such Additional Bonds;
 - (6) the redemption premiums, if any, and the redemption terms, if any, for such Additional Bonds:
 - (7) the amount, if any, to be deposited from the proceeds of sale of such Additional Bonds in the Interest Account;
 - (8) the amount, if any, to be deposited from the proceeds of sale of such Additional Bonds in the Acquisition Fund;
 - (9) the amount to be deposited from the proceeds of sale of such Additional Bonds in the Reserve Fund, which amount shall be sufficient to cause the amount on deposit in the Reserve Fund to equal the Reserve Requirement upon the issuance of such Additional Bonds;
 - (10) the forms of such Additional Bonds;
 - (11) that the Supplement described in subsection (d) that follows, including the right to receive Subordinated Installment Payments thereunder, shall be irrevocably pledged to the payment of the principal of and interest on such Additional Bonds; and
 - (12) such other provisions as are necessary or appropriate and not inconsistent with the Indenture.
- (d) A Supplement shall be executed and delivered by the City and the Corporation to provide for the payment by the City of Subordinated Installment Payments thereunder in an amount at least sufficient to pay the principal of and interest on the Series 2002 Bonds and such Additional Bonds as the same become due.
- (e) The Subordinated Installment Payments described in the foregoing subsection (d) shall be granted, transferred, conveyed and assigned to the Authority.

Nothing in the Indenture shall limit the issuance of any revenue bonds of the Authority payable from the Revenues and secured by a pledge of the Revenues if after the issuance and delivery of such bonds none of the Bonds theretofore issued under the Indenture will be Outstanding.

Funds and Accounts

Establishment of Funds and Accounts. The Authority will establish and maintain the Acquisition Fund to be held by the Treasurer and disbursed by the Auditor and Comptroller to pay Costs of Issuance in accordance with the Indenture. The Trustee establishes the Payment Fund (and the Interest Account, the Principal Account, and the Redemption Account thereunder) and the Reserve Fund. Each of the funds and accounts established in the Indenture will be maintained by the Trustee separate and apart from all other funds and moneys held by the Trustee, and will be expended solely as provided in the Indenture.

Use of Moneys in Acquisition Fund.

- (a) The Treasurer will hold the moneys in the Acquisition Fund and the Auditor and Comptroller will disburse such moneys therefrom to pay Acquisition Costs and to pay Costs of Issuance. Such disbursements will be made from time to time upon receipt of a Written Request of the City on behalf of the Authority containing information set forth in the Indenture.
- (b) If, after payment by the Auditor and Comptroller of all Written Requests of the City on behalf of the Authority theretofore tendered to the Auditor and Comptroller under the provisions of the Indenture and delivery to the Treasurer, the Auditor and Comptroller and the Trustee of a Certificate of Completion, there shall remain any balance of money in the Acquisition Fund, all money so remaining will be transferred to the Trustee, and deposited, first to the Reserve Fund to the extent necessary to make the amount on deposit therein equal to the Reserve Requirement, and thereafter to the Interest Account of the Payment Fund as directed by the Authority.

Reserve Fund.

- (a) Immediately after making the required deposits into the accounts of the Payment Fund, the Trustee shall deposit in the Reserve Fund an amount of money which, together with the amount already on deposit therein, will be equal to the Reserve Requirement. No deposit need be made in the Reserve Fund so long as there shall be on deposit therein a sum not less than the Reserve Requirement. The Trustee shall promptly notify the City if the amount on deposit therein is less than the Reserve Requirement.
- (b) All money in the Reserve Fund shall be used and withdrawn by the Trustee solely for the purpose of paying the interest on, or principal of, or premiums, if any, on the Bonds in the event that no other money of the Authority is lawfully available therefor, or for the retirement of all Bonds then Outstanding. All interest income received by the Trustee on investment of moneys in the Reserve Fund shall be retained in the Reserve Fund so long as amounts on deposit in the Reserve Fund are less than the Reserve Requirement. For purposes of determining the amount on deposit in the Reserve Fund, all investments shall be valued semi-annually on or before each February 1 and August 1 at the amortized cost thereof (exclusive of accrued but unpaid interest, but inclusive of commissions). Subject to the foregoing, earnings and profits on investments in the Reserve Fund shall be transferred to the Interest Account of the Payment Fund.
- (c) If, on any Interest Payment Date, the amount on deposit in the Interest Account is insufficient to pay the interest due on the Bonds on such Interest Payment Date, the Trustee shall transfer from the Reserve Fund and deposit in the Interest Account an amount sufficient to make up such deficiency. If a Reserve Fund Credit Facility is credited to the Reserve Fund to satisfy a portion of the Reserve Requirement, the Trustee shall make a claim for payment under such Reserve Fund Credit Facility, in accordance with the provisions thereof, in an amount which, together with other available moneys in the Reserve Fund, will be sufficient to make said deposit in the Interest Account.
- (d) If, on any maturity date or Mandatory Sinking Installment Redemption Date, the amount on deposit in the Principal Account is insufficient to pay the principal or sinking fund installment of the Bonds on such maturity date or Mandatory Sinking Installment Redemption Date, the Trustee shall transfer from the Reserve Fund and deposit in the Principal Account an amount sufficient to make up such deficiency. If a Reserve Fund Credit Facility is credited to the Reserve Fund to satisfy a portion of the Reserve Requirement, the Trustee shall make a

claim for payment under such Reserve Fund Credit Facility, in accordance with the provisions thereof, in an amount which, together with other available moneys in the Reserve Fund, will be sufficient to make said deposit in the Principal Account.

- (e) Moneys, if any, on deposit in the Reserve Fund shall be withdrawn and applied by the Trustee for the final payment of principal of and interest on the Bonds last remaining Outstanding.
- (f) Amounts on deposit in the Reserve Fund which were not derived from payments under any Reserve Fund Credit Facility credited to the Reserve Fund to satisfy a portion of the Reserve Requirement shall be used and withdrawn by the Trustee prior to using and withdrawing any amounts derived from payments under any such Reserve Fund Credit Facility. In order to accomplish such use and withdrawal of such amounts not derived from payments under any such Reserve Fund Credit Facility, the Trustee shall, as and to the extent necessary, liquidate any investments purchased with such amounts. If and to the extent that, more than one Reserve Fund Credit Facility is credited to the Reserve Fund to satisfy a portion of the Reserve Requirement, drawings thereunder, and repayment of expenses with respect thereto, shall be made on a pro-rata basis (calculated by reference to the policy limits available thereunder).
- (g) In the event of any transfer from the Reserve Fund or the making of any claim under any Reserve Fund Credit Facility, the Trustee shall, within five days thereafter, provide written notice to the City of the amount and the date of such transfer or claim.
- (h) The Trustee shall, from amounts received from the City pursuant to the Installment Purchase Agreement, deposit in the Reserve Fund an amount of money which, together with the amount already on deposit therein and the amounts available under all Reserve Fund Credit Facilities, will be equal to the Reserve Requirement. No deposit need be made in the Reserve Fund so long as there shall be on deposit therein a sum equal to the amount which, together with the amounts available under all Reserve Fund Credit Facilities, is at least equal to the Reserve Requirement. The Trustee shall promptly notify the City in writing if the amount on deposit is less than the Reserve Requirement.
- (i) Any moneys in the Reserve Fund in excess of the Reserve Requirement as a result of the reduction of the Reserve Requirement as a consequence of the scheduled payment of principal of the Bonds shall, no later than the August 15 following such reduction, be transferred by the Trustee from the Reserve Fund to the Payment Fund. On any date on which Bonds are defeased in accordance with the Indenture, the Trustee shall, if so directed in a Written Request of the City, transfer any moneys in the Reserve Fund in excess of the Reserve Requirement resulting from such defeasance to the to the Redemption Account or the Principal Account, each of the Payment Fund.
- (j) At the option of the City, amounts required to be held in the Reserve Fund may be withdrawn, in whole or in part, upon the deposit of a Reserve Fund Credit Facility with the Trustee, in a stated amount equal to the amounts so withdrawn; provided, that at the time of such deposit the unsecured obligations of the Reserve Fund Credit Facility are rated not lower than Aa/AA by Moody's and S&P and that prior to the deposit of such Reserve Fund Credit Facility, each of the rating agencies then rating the Bonds shall be notified of such proposed withdrawal and the deposit of such Reserve Fund Credit Facility shall not result in a withdrawal or downgrading of any rating of the Bonds then in effect by each of the rating agencies then rating the Bonds. Any such withdrawn moneys shall be transferred, at the election of the City, to the Acquisition Fund, to the Redemption Account in the Payment Fund, to the Principal Account of the Payment Fund or to a special account to be established for the payment of any fees in connection with obtaining such Reserve Fund Credit Facility.
- (k) In the event any Reserve Fund Credit Facility is scheduled to terminate prior to the final maturity date of the Bonds and such Reserve Fund Credit Facility is not extended, renewed or replaced with another Reserve Fund Credit Facility or with cash or Permitted Investments in the amount of such Reserve Fund Credit Facility, the Trustee shall draw on or make a claim under such Reserve Fund Credit Facility ten days prior to the date of such expiration in an amount equal to the lesser of (i) the maximum amount available thereunder, or (ii) the Reserve Requirement, in either case for deposit into the Reserve Fund.

- (I) In the event a Reserve Fund Credit Facility is substituted for all or a portion of the moneys held by the Trustee in the Reserve Fund pursuant to the terms of the Indenture, then, notwithstanding any other provision of the Indenture, (i) the Trustee shall draw upon the Reserve Fund Credit Facility for amounts which the terms of the Indenture require to be transferred from the Reserve Fund; provided that the Trustee shall first draw upon any cash or Permitted Investments on deposit in the Reserve Fund prior to drawing upon any Reserve Fund Credit Facility, and thereafter shall draw upon all such Reserve Fund Credit Facilities on a pro rata basis, and (ii) amounts required by the terms of the Indenture to be deposited or transferred to the Reserve Fund shall (A) in the event the Reserve Fund Credit Facility has been drawn upon, be paid to the provider of such Reserve Fund Credit Facility if the City has an outstanding reimbursement obligation to such provider resulting from such draw, which payment shall result in an increase in the amount then available under the Reserve Fund Credit Facility equal to such payment, or (B) otherwise be transferred or deposited pursuant to the terms of the Indenture as if no deposit or transfer to the Reserve Fund were required.
- (m) The City shall be permitted to make use of a Reserve Fund Credit Facility pursuant to the Indenture at any time.
- (n) The term "substitution" (as used in this section) shall include such initial funding of the Reserve Requirement by means of a Reserve Fund Credit Facility instead of by deposit of moneys, and shall not be read to mean that the City must first make an initial cash deposit in the Reserve Fund before invoking the above-described provisions of the Indenture and satisfying the Reserve Requirement by securing and implementing a Reserve Fund Credit Facility.

Revenues

Pledge of Revenues. (a) All Revenues and amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund) are irrevocably pledged to the payment of the interest on and principal of the Bonds but only as provided in the Indenture, and the Revenues shall not be used for any other purpose while any of the Bonds remain Outstanding; provided, however, that out of the Revenues there may be allocated such sums for such purposes as are expressly permitted by the Indenture.

- (b) In order to secure the pledge of the Revenues, the Authority transfers, conveys and assigns to the Trustee, for the benefit of the Owners, all of the Authority's rights under the 2002 Supplement, including the right to receive 2002 Subordinated Installment Payments from the City, the right to receive any proceeds of insurance maintained thereunder or any condemnation award rendered with respect to the Project and the right to exercise any remedies provided therein in the event of a default by the City thereunder. The Trustee accepts said assignment for the benefit of the Owners subject to the provisions of the Indenture.
- (c) The Trustee shall be entitled to and shall receive all of the 2002 Subordinated Installment Payments, and any 2002 Subordinated Installment Payments collected or received by the Authority shall be deemed to be held, and to have been collected or received, by the Authority as agent of the Trustee and shall forthwith be paid by the Authority to the Trustee.

Deposit of Revenues in the Payment Fund. The Authority agrees and covenants that all Revenues when and as received shall be received in trust for the benefit of the Owners and shall be deposited when and as received in the Payment Fund. All Revenues shall be accounted for through and held in trust in the Payment Fund, and the Authority shall have no beneficial right or interest in any of the Revenues except only as provided in the Indenture. All Revenues, whether received by the Authority in trust or deposited with the Trustee, shall nevertheless be allocated, applied and disbursed solely to the purposes and uses set forth below.

<u>Interest Account.</u> On or before each Interest Payment Date, the Trustee shall transfer from the Payment Fund and deposit in the Interest Account that amount of money which, together with any money contained in the Interest Account, is equal to the aggregate amount of interest becoming due and payable on all Outstanding Bonds on such Interest Payment Date. No deposit need be made in the Interest Account if the amount contained in the Interest Account is at least equal to the aggregate amount of interest becoming

due and payable on all Outstanding Bonds on such Interest Payment Date. All money in the Interest Account shall be used and withdrawn by the Trustee solely for the purpose of paying the interest on the Bonds as it shall become due and payable (including accrued interest on any Bonds purchased or redeemed prior to maturity).

<u>Principal Account</u>. On or before each Principal Payment Date, the Trustee shall transfer from the Payment Fund and deposit in the Principal Account that amount of money which, together with any money contained in the Principal Account, is equal to the aggregate principal amount of all Outstanding Serial Bonds maturing on such Principal Payment Date plus the aggregate amount of all sinking account payments required to be made with respect to the Term Bonds on such Principal Payment Date. No deposit need be made in the Principal Account if the amount contained therein is at least equal to the aggregate amount of the principal of all Outstanding Serial Bonds maturing by their terms on such Principal Payment Date plus the aggregate amount of all sinking fund payments required to be made on such Principal Payment Date for all Outstanding Term Bonds.

- With respect to each Sinking Account, on each Mandatory Sinking Account Payment (1) Date established for such Sinking Account, the Trustee shall apply the sinking account payment required on that date to the redemption (or payment at maturity, as the case may be) of Term Bonds of the series and maturity for which such Sinking Account was established, upon the notice and in the manner provided in the Indenture or in the Supplemental Indenture pursuant to which such series of Bonds were issued; provided that, at any time prior to giving such notice of such redemption, at the direction of the City or the Authority, the Trustee may apply moneys in such Sinking Account to the purchase of Term Bonds of such series and maturity at public or private sale, as and when and at such prices (including brokerage and other charges, but excluding accrued interest, which is payable from the Interest Account) as shall be determined by the Authority, except that the purchase price (excluding accrued interest) shall not exceed the redemption price that would be payable for such Bonds upon redemption by application of such mandatory sinking account payment. If, during the twelve-month period immediately preceding said Mandatory Sinking Account Payment Date, the Trustee has purchased Term Bonds of such series and maturity with moneys in such Sinking Account, such Bonds so purchased shall be applied, to the extent of the full principal amount thereof, to reduce said mandatory sinking account payment.
- (2) All money in the Principal Account shall be used and withdrawn by the Trustee solely for the purpose of paying the principal of the Bonds as they shall become due and payable, except that any money in any Sinking Account shall be used and withdrawn by the Trustee only to purchase or to redeem or to pay Term Bonds for which such sinking account was created.

Redemption Account. All money in the Redemption Account shall be held in trust by the Trustee and shall be applied, used, and withdrawn either to redeem the Series 2002 Bonds pursuant to the Indenture or any Additional Bonds pursuant to the provisions of the Supplemental Indenture or for the purposes described in this subsection. Any moneys which, pursuant to the Installment Purchase Agreement, are to be used to redeem Bonds shall be deposited by the Trustee in the Redemption Account. The Trustee shall, on the scheduled redemption date, withdraw from the Redemption Account and pay to the Owners entitled thereto an amount equal to the redemption price of the Bonds to be redeemed on such date.

Any delinquent 2002 Subordinated Installment Payments and other delinquent Subordinated Installment Payments pledged to Additional Bonds with respect to the Project shall be applied first to the Interest Account for the immediate payment of interest payments past due and then to the Principal Account for immediate payment of principal payments past due according to the tenor of any Bond, and then to the Reserve Account to the extent necessary to make the amount on deposit therein equal to the Reserve Requirement. Any remaining money representing delinquent 2002 Subordinated Installment Payments and other delinquent Subordinated Installment Payments pledged to Bonds shall be deposited in the Payment Fund to be applied in the manner provided therein.

Investments. Moneys in the Acquisition Fund shall be accounted for by the Auditor and Comptroller and invested by the Treasurer in any legally permitted investment, including but not limited to the pooled investment

fund of the Treasurer. Moneys in the Reserve Fund and the Payment Fund and any accounts therein shall, upon the Written Request of the City, on behalf of the Authority, be invested by the Trustee in Permitted Investments. In the absence of a Written Request of the City, the Trustee may invest moneys in such funds and accounts in Permitted Investments described in clause (9) of the definition of Permitted Investments. The obligations in which moneys in the said funds and accounts are invested shall mature prior to the date on which such moneys are estimated to be required to be paid out under the Indenture; provided that with respect to the Reserve Fund, such obligations shall mature no later than ten years from the date of purchase.

Selected Covenants

Punctual Payment and Performance. The Authority will punctually pay the interest on and the principal of and premiums, if any, to become due on every Bond issued under the Indenture in strict conformity with the terms thereof and of the Bonds, and will faithfully observe and perform all the agreements and covenants contained therein and in the Bonds.

Accounting Records and Reports. The Authority will keep or cause to be kept proper books of record and accounts in which complete and correct entries shall be made of all transactions relating to the receipts, disbursements, allocation and application of the Revenues, and such books shall be available for inspection by the Trustee, at reasonable hours and under reasonable conditions. Not more than 270 days after the close of each Fiscal Year, the Authority shall furnish or cause to be furnished to the Trustee a complete financial statement covering receipts, disbursements, allocation and application of Revenues for such Fiscal Year, and including a profit and loss statement and balance sheet. The Authority shall also keep or cause to be kept such other information as is required under the Tax Certificate.

The City's Budgets. The Authority will supply to the Trustee, as soon as practicable after the beginning of each Fiscal Year, a Certificate of the City certifying that the City has made adequate provision in its annual budget for such Fiscal Year for the payment of all Subordinated Installment Payments due under the Installment Purchase Agreement in such Fiscal Year. If the amounts so budgeted are not adequate for the payment of all Subordinated Installment Payments due under the Installment Purchase Agreement in such Fiscal Year, the Authority will take such action as may be necessary and within its power to cause such annual budget to be amended, corrected or augmented so as to include therein the amounts required to be paid by the City in such Fiscal Year for the payment of all Installment Payment due under the Installment Purchase Agreement in such Fiscal Year, and will notify the Trustee of the proceedings then taken or proposed to be by the Authority.

Tax Covenants; Rebate Fund.

- (a) The Trustee shall deposit moneys in the Rebate Fund made available by the Authority pursuant to a Written Request of the City. All money at any time deposited in the Rebate Fund shall be held by the Trustee in trust, to the extent required to satisfy the Rebate Requirement (as such term is defined in the Tax Certificate), for payment to the federal government of the United States of America, and none of the City, the Authority, the Trustee nor the Owners of the Bonds shall have any right in or claim to such money. The Trustee shall be deemed conclusively to have complied with the provisions of the Indenture and the Tax Certificate if it follows the Written Request of the City, including supplying all necessary information in the manner provided in the Tax Certificate, and except as otherwise expressly provided in the Indenture, shall not be required to take any actions under the Indenture in the absence of written directions by the City, and shall have no liability or responsibility to enforce compliance by the City with the terms of the Tax Certificate or the Indenture. The Trustee agrees to comply with all Written Requests of the City given in accordance with the Tax Certificate.
- (b) Upon receipt of a Written Request of the City, the Trustee shall remit part or all of the amounts in the Rebate Fund to the United States of America, as so directed. In addition, if the City so directs, the Trustee will deposit moneys into or transfer moneys out of the Rebate Fund from or into such accounts or fund as directed by the Written Request of the City. Any funds remaining in the Rebate Fund after payment or prepayment of all of the Bonds and payment and satisfaction of any Rebate Requirement, or provision made therefor satisfactory to the Trustee, shall, after payment all fees and expenses of the Trustee, be withdrawn and remitted to the City.

Continuing Disclosure. The City has undertaken all responsibility for compliance with continuing disclosure requirements, and accordingly the Authority shall have no liability to the Owners of the Bonds or any other person with respect to S.E.C. Rule 15c2-12, and the City shall comply with and carry out all of the provisions of the each continuing disclosure agreement, dated the date of the execution and delivery of each series of the Bonds, executed and delivered by the City (each a "Continuing Disclosure Agreement"). Notwithstanding any other provision of the Indenture, failure of the City to comply with the a Continuing Disclosure Agreement shall not be considered an Event of Default under the Indenture or under the Installment Purchase Agreement; provided, that the Trustee may and, at the request of any Participating Underwriter or the Owners of at least twenty-five per cent (25%) in aggregate principal amount of the Outstanding Bonds of any series, shall, or any Owner or Beneficial Owner of any of the Bonds may, take such actions as may be necessary and appropriate, including seeking mandate or specific performance by court order, to cause the City to comply with its obligations under such Continuing Disclosure Agreement.

Events of Default and Remedies of Holders

Events of Default. The following events shall be Events of Default:

- (1) failure in the due and punctual payment of the interest on any Bond when and as the same shall become due and payable;
- (2) failure in the due and punctual payment of the principal of or premium, if any, on any Bond when and as the same shall become due and payable, whether at maturity as therein expressed or by proceedings for redemption;
- (3) failure by the Authority in the performance of any of the other agreements or covenants required in the Indenture to be performed by the Authority, and such default shall have continued for a period of 60 days after the Authority and the City shall have been given notice in writing of such default by the Trustee, a Credit Provider or a provider of a then existing Reserve Fund Credit Facility or to the Authority, the City and the Trustee by Owners of not less than 25% of the Bonds; or
- (4) if any event of default shall have occurred and be continuing under Section 8.01 of the Installment Purchase Agreement; or
- (5) if the Authority shall file a petition or answer seeking arrangement or reorganization under the federal bankruptcy laws or any other applicable law of the United States of America or any state therein, or if a court of competent jurisdiction shall approve a petition filed with or without the consent of the Authority seeking arrangement or reorganization under the federal bankruptcy laws or any other applicable law of the United States of America or any state therein, or if under the provisions of any other law for the relief or aid of debtors any court of competent jurisdiction shall assume custody or control of the Authority or of the whole or any substantial part of its property.

Action on Default. If one or more Events of Default shall occur, then and in each and every such case during the continuance of such Event of Default the Trustee may, with the consent of the Credit Providers, and upon the written request of the Credit Providers, any provider of a then existing Reserve Fund Credit Facility or the Owners of not less than 25% in aggregate principal amount of the Bonds then Outstanding shall, by notice in writing to the Authority, declare the principal of all Bonds then Outstanding and the interest accrued thereon to be due and payable immediately. Upon any such declaration, the same shall become due and payable, anything contained in the Indenture or in the Bonds to the contrary notwithstanding. Provided, however, that if a Reserve Fund Credit Facility is then in existence and not fully exhausted, acceleration shall not be effective unless the declaration is consented to by the provider of such Reserve Fund Credit Facility. This subsection is subject to the condition that if at any time after the entire principal amount of the unpaid Bonds and the accrued interest thereon shall have been obtained or entered, there shall be deposited with the Trustee a sum sufficient to pay the unpaid principal amount of the Bonds due prior to such declaration and the accrued interest thereon, with interest such overdue installments at the rate or

rates applicable thereto in accordance with their terms, and the reasonable fees and expenses of the Trustee, and any and all other defaults known to the Trustee (other than in the payment the entire principal amount of the unpaid Bonds and the accrued interest thereon due and payable solely by reason of such declaration) shall have been made good or cured to the satisfaction of the Trustee or provision deemed by the Trustee to be adequate shall have been made therefor, then and in every such case the Trustee, by written notice to the City and the Authority, may rescind and annul such declaration and its consequences; but no such rescission and annulment shall extend to or shall affect any subsequent default or shall impair or exhaust any right or power consequent thereon.

Anything in the Indenture to the contrary notwithstanding, upon the occurrence and continuance of an Event of Default, the Credit Providers shall be entitled to control and direct the enforcement of all rights and remedies granted to the Owners or the Trustee for the benefit of the Owners under the Indenture; including, without limitation: (i) the right to accelerate the principal of the Bonds as described in the Indenture; and (ii) the right to annul any declaration of acceleration, and the Credit Providers shall also be entitled to approve all waivers of Events of Default.

Other Remedies of the Trustee. Upon the happening and continuance of any Event of Default, the Trustee in its discretion may, and at the written request of the Credit Providers or the Owners of not less than 25% in aggregate principal amount of Bonds Outstanding or any provider of a then existing Reserve Fund Credit Facility shall (but only to the extent indemnified to its satisfaction from fees and expenses, including attorneys' fees), do the following:

- (a) by mandamus, or other suit, action or proceeding at law or in equity, enforce all rights of the Owners and require the Authority to enforce all rights of the Owners of Bonds, including the right to require the Authority to receive and collect Revenues and to enforce its rights under the Installment Purchase Agreement and to require the Authority to carry out any other covenant or agreement with Owners of Bonds and to perform its duties under the Indenture;
 - (b) bring suit upon the Bonds;
- (c) by action or suit in equity enjoin any acts or things which may be unlawful or in violation of the rights of the Owners; and
- (d) as a matter of right, have receivers appointed for the Revenues and the issues, earnings, income, products and profits thereof, pending such proceedings, with such powers as the court making such appointment shall confer.

Effect of Discontinuance or Abandonment. In case any proceeding taken by the Trustee on account of any default or Event of Default shall have been discontinued or abandoned for any reason, or shall have been determined adversely to the Trustee, then and in every such case the Authority, the Trustee, and the Owners shall be restored to their former positions and rights under the Indenture, respectively, and all rights, remedies and powers of the Trustee shall continue as though no such proceeding had been taken.

Rights of Owners. Anything in the Indenture to the contrary notwithstanding, subject to the consent of the Credit Providers and any provider of any then existing Reserve Fund Credit Facility which is not exhausted and subject to the limitations and restrictions as to the rights of the Owners described above and below, upon the happening and continuance of any Event of Default, the Owners of not less than 25% in aggregate principal amount of the Bonds then Outstanding shall have the right upon providing the Trustee security and indemnity reasonably satisfactory to it against the costs, expenses, and liabilities to be incurred therein or thereby, by an instrument in writing executed and delivered to the Trustee, to direct the method and place of conducting all remedial proceedings to be taken by the Trustee under the Indenture.

The Trustee may refuse to follow any direction that conflicts with law or the Indenture or that the Trustee determines is prejudicial to rights of other Owners or would subject the Trustee to personal liability.

Restriction on Owners' Action.

- (a) In addition to the other restrictions on the rights of Owners to request action upon the occurrence of an Event of Default and to enforce remedies described in this section, no Owner of any of the Bonds shall have any right to institute any suit, action or proceeding in equity or at law for the enforcement of any trust under the Indenture, or any other remedy under the Indenture or on said Bonds, unless:
 - (1) such Owner previously shall have given to the Trustee written notice of an Event of Default as described above:
 - (2) the Owners of not less than 25% in aggregate principal amount of the Bonds then Outstanding shall have made written request of the Trustee to institute any such suit, action, proceeding or other remedy, after the right to exercise such powers or rights of action, as the case may be, shall have accrued, and shall have afforded the Trustee a reasonable opportunity either to proceed to exercise the powers in the Indenture granted, or to institute such action, suit or proceeding in its or their name;
 - (3) there shall have been offered to the Trustee security and indemnity satisfactory to it against the costs, expenses and liabilities to be incurred therein or thereby, and
 - (4) the Trustee shall not have complied with such request within a reasonable time.
- (b) Such notification, request and offer of indemnity are declared in every such case, at the option of the Trustee, to be conditions precedent to the execution of the trusts of the Indenture or for any other remedy under the Indenture; it being understood and intended, subject to the Indenture, that no one or more Owners of the Bonds secured by the Indenture shall have any right in any manner whatever by his or their action to affect, disturb or prejudice the security of the Indenture, or to enforce any right under the Indenture or under the Bonds, except in the manner in the Indenture provided, and that all proceedings at law or in equity shall be instituted, and maintained in the manner in the Indenture provided, and for the equal benefit of all Owners of Outstanding Bonds; subject, however, to the provisions described in this section and provided that, no such action shall be effective unless a declaration is given by any provider of a then existing Reserve Fund Credit Facility which is not exhausted or is consented to by such provider.

Remedies Not Exclusive.

No remedy in the Indenture conferred upon or reserved to the Trustee or to the Owners of the Bonds is intended to be exclusive of any other remedy or remedies, and each and every such remedy shall be cumulative, and shall be in addition to every other remedy given under the Indenture or existing at law or in equity or by statute.

Waiver of Events of Default; Effect of Waiver.

- (a) The Trustee shall waive any Event of Default under the Indenture and its consequences and rescind any declaration of acceleration, upon the written request of the Credit Providers, the Owners of at least a majority in aggregate principal amount of all Outstanding Bonds or any Reserve Fund Credit Facility provider. If any Event of Default shall have been waived as provided in the Indenture, the Trustee shall promptly give written notice of such waiver to the Authority and shall give notice thereof by first class mail, postage prepaid to all Owners of Outstanding Bonds if such Owners had previously been given notices of such Event of Default and to any provider of a then-existing Reserve Fund Credit Facility, whether or not exhausted. No such waiver, rescission and annulment shall extend to or affect any subsequent Event of Default, or impair any right or remedy consequent thereon.
- (b) No delay or omission of the Trustee, the Credit Providers, any Owner of the Bonds or any Reserve Fund Credit Facility provider, to exercise any right or power accruing upon any default or Event of Default shall impair any such right or power or shall be construed to be a waiver of any such default or Event of Default, or an acquiescence therein. Every power and remedy in the Indenture given to the Trustee, the Credit Providers, the

Owners of the Bonds or any Reserve Fund Credit Facility provider, respectively, may be exercised from time to time and as often as may be deemed expedient.

Application of Moneys.

- (a) Any moneys received by the Trustee pursuant to Article XI of the Indenture, together with any moneys which upon the occurrence of an Event of Default are held by the Trustee in any of the funds and accounts under the Indenture (other than the Rebate Fund and other than moneys held for Bonds not presented for payment) shall, after payment of all fees and expenses of the Trustee, and the fees and expenses of its counsel, be applied as follows:
 - (1) Unless the principal of all of the Outstanding Bonds shall be due and payable:

FIRST - To the payment of the Owners of all installments of interest then due on the Bonds, in the order of the maturity of the installments of such interest and, if the amount available shall not be sufficient to pay in full any particular installment, then to the payment ratably, according to the amounts due on such installment, to the Owners, without any discrimination or privilege;

SECOND - To the payment of the Owners of the unpaid principal of and premium, if any, on any of the Bonds which shall have become due (other than Bonds matured or called for redemption for the payment of which moneys are held pursuant to the provisions of the Indenture), in the order of their due dates and, if the amount available shall not be sufficient to pay in full the principal of and premium, if any, on such Bonds due on any particular date, then to the payment ratably, according to the amount due on such date, to the Owners without any discrimination; and

THIRD - To be held for the payment to the Owners as the same shall become due of the principal of, interest, and premium, if any, on the Bonds, which may thereafter become due either at maturity or upon call for redemption prior to maturity and, if the amount available shall not be sufficient to pay in full such principal and premium, if any, due on any particular date, together with interest then due and owing thereon, payment shall be made in accordance with the FIRST and SECOND paragraphs above.

To the extent the provider of any Reserve Fund Credit Facility has advanced funds in lieu of funds in the Reserve Fund for the payment of any interest on or principal of the Bonds which have not theretofore been repaid to such provider, then such provider shall be entitled to participate as a person entitled to receive installments of interest on the Bonds to the extent of advances on the Reserve Fund Credit Facility for interest on the Bonds and shall be a person entitled to receive unpaid principal on account of any of the Bonds within the meaning of clause Second and Third to the extent of funds advance on the Reserve Fund Credit Facility to pay unpaid principal of the Bonds.

- (2) If the principal of all of the Outstanding Bonds shall be due and payable, to the payment of the principal, and premium, if any, and interest then due and unpaid upon the Outstanding Bonds without preference or priority of any of principal, premium or interest over the others or of any installment of interest, or of any Outstanding Bond over any other Outstanding Bond, ratably, according to the amounts due respectively for principal, premium and interest, to the Owners without any discrimination or preference except as to any difference in the respective amounts of interest specified in the Outstanding Bonds.
- (b) Whenever moneys are to be applied pursuant to the provisions of the Indenture described in this section, such moneys shall be applied at such times, and from time to time, as the Trustee shall determine, having due regard to the amount of such moneys available for application and the likelihood of additional moneys becoming available for such application in the future. The Trustee shall give, by mailing by first class mail as it may deem appropriate, such notice of the deposit with it of any such moneys.

Amendment of or Supplement to Indenture

- (a) The Indenture and the rights and obligations of the Authority and of the Owners may be amended at any time by a Supplemental Indenture which shall become binding when the written consents of the Owners of at least a majority in aggregate principal amount of the Bonds then Outstanding and materially adversely affected by such amendment and the Credit Provider for such Bonds, exclusive of Bonds disqualified as provided in Section 10.02, are filed with the Trustee. No such amendment shall (1) extend the maturity of or reduce the interest rate on or otherwise alter or impair the obligation of the Authority to pay the interest on or principal of or redemption premium, if any, on any Bond at the time and place and at the rate and in the currency provided in the Indenture without the express written consent of the Owner of such Bond, (2) except as provided in the Indenture with respect to issuance of Additional Bonds, permit the creation by the Authority of any pledge of the Revenues superior to or on a parity with the pledge created by the Indenture for the benefit of the Bonds, or (3) modify any rights or obligations of the Trustee without its prior written assent thereto.
- (b) The Indenture and the rights and obligations of the Authority and of the Owners may also be amended at any time by a Supplemental Indenture which shall become binding with the written consent of the Credit Providers and without the consent of any Owners, but only to the extent permitted by law and after receipt of an approving opinion of Bond Counsel and only for any one or more of the following purposes --
 - (1) to make such provisions for the purpose of curing any ambiguity or of correcting, curing or supplementing any defective provision contained in the Indenture regard to questions arising under the Indenture which the Authority may deem desirable or necessary and not inconsistent herewith and which shall not adversely affect the interests of the Owners;
 - (2) to make any other change or addition hereto which shall not materially adversely affect the interests of the Owners, or to surrender any right or power under the Indenture reserved to or conferred on the Authority; or
 - (3) to provide for the issuance of any Additional Bonds and to provide the terms of such Additional Bonds, subject to the conditions and upon compliance with the procedure set forth in the Indenture.
- (c) Any provision of the Indenture expressly recognizing or granting rights in or to a Credit Provider may not be amended in any manner which affects the rights of such Credit Provider under the Indenture without the prior written consent of such Credit Provider.

Disqualified Bonds. Bonds owned or held by or for the account of the Authority or the City shall not be deemed Outstanding for the purpose of any consent or other action or any calculation of Outstanding Bonds provided in the Indenture, and shall not be entitled to consent to or take any other action provided in the Indenture.

Endorsement or Replacement of Bonds After Amendment. After the effective date of any action taken as described above, the Authority may determine that the Bonds may bear a notation by endorsement in form approved by the Authority as to such action, and in that case upon demand of the Owner of any Outstanding Bond and presentation of his Bond for such purpose at the Corporate Trust Office of the Trustee a suitable notation as to such action shall be made on such Bond. If the Authority shall determine that a Bond shall bear such a notation by endorsement as described in this section, a new Bond so modified shall be prepared and executed, and upon demand of the Owner of any Outstanding Bond such new Bond shall be exchanged at the Corporate Trust Office of the Trustee without cost to any Owner upon surrender of such Bond.

Amendment by Mutual Consent. The provisions of the Indenture shall not prevent any Owner from accepting any amendment as to the particular Bonds owned by him, provided that due notation thereof is made on such Bonds.

Defeasance

If the Authority shall pay or cause to be paid to the Owners of all Outstanding Bonds the interest thereon and the principal thereof and the premiums, if any, thereon at the times and in the manner stipulated in the Indenture and therein, then the Owners of such Bonds shall cease to be entitled to the pledge of the Revenues as provided in the Indenture, and all agreements, covenants and other obligations of the Authority to the Owners of such Bonds shall cease, terminate and become void and be discharged and satisfied. In such event, the Trustee shall execute and deliver to the Authority all such instruments as may be necessary or desirable to evidence such discharge and satisfaction, and the Trustee shall pay over or deliver to the Authority all by it pursuant hereto which are not required for the payment of the interest on and principal of and redemption premiums, if any, on such Bonds.

Subject to the provisions of the above paragraph, when any of the Bonds shall have been paid and if, at the time of such payment, the Authority shall have kept, performed and observed all the covenants and promises in such Bonds and in the Indenture required or contemplated to be kept, performed and observed by the Authority or on its part on or prior to that time, then the Indenture shall be considered to have been discharged in respect of such Bonds and such Bonds shall cease to be entitled to the lien of the Indenture and such lien and all agreements, covenants, and other obligations of the Authority in the Indenture shall cease, terminate and become void and be discharged and satisfied as to such Bonds.

Notwithstanding the satisfaction and discharge of the Indenture or the discharge of the Indenture in respect of any Bonds, those provisions of the Indenture relating to the maturity of the Bonds, interest payments and dates thereof, tender and exchange provisions, exchange and transfer of Bonds, replacement of mutilated, destroyed, lost or stolen Bonds, the safekeeping and cancellation of Bonds, nonpresentment of Bonds, and the duties of the Trustee in connection with all of the foregoing, remain in effect and shall be binding upon the Trustee and the Owners of the Bonds and the Trustee shall continue to be obligated to hold in trust any moneys or investments then held by the Trustee for the payment of the principal of, redemption premium, if any, and interest on the Bonds, to pay to the Owners of Bonds the funds so held by the Trustee as and when such payment becomes due. Notwithstanding the satisfaction and discharge of the Indenture or the discharge of the Indenture in respect of any Bonds, those provisions of the Indenture relating to the compensation of the Trustee shall remain in effect and shall be binding upon the Trustee and the Authority.

Notwithstanding anything in the Indenture to the contrary, in the event that the principal and/or interest due on Bonds enhanced by a Credit Support Instrument shall be paid by the Credit Provider providing such Credit Support Instrument pursuant thereto, such Bonds shall remain Outstanding for all purposes, not be defeased or otherwise satisfied, and not be considered paid by the Authority, and the pledge of Revenues and all covenants, agreements and other obligations of the Authority to the Owners of such Bonds shall continue to exist and shall run to the benefit of such Credit Provider, and the such Credit Provider shall be subrogated to the rights of such Owners.

Any Outstanding Bonds shall prior to the maturity date or redemption date thereof be deemed to have been paid within the meaning of and with the effect expressed in the first paragraph of this section or this paragraph if: (i) in case any of such Bonds are to be redeemed on any date prior to their maturity date, the Authority shall have given to the Trustee in form satisfactory to it irrevocable instructions to mail, on a date in accordance with the provisions of the Indenture, notice of redemption of such Bonds on said redemption date; (ii) there shall have been deposited with the Trustee either (A) money in an amount which shall be sufficient or (B) Federal Securities of which are not subject to redemption prior to maturity except by the holder thereof (including any such Permitted Investments issued or held in book-entry form on the books of the Department of the Treasury of the United States of America) and/or Pre-Refunded Municipals, the interest on and principal of which when due, and without any reinvestment thereof, will provide money which, together with the money, if any, deposited with the Trustee at the same time, shall, as verified by an independent certified public accountant or other independent financial consultant acceptable to the Trustee and the Credit Provider providing a Credit Support Instrument for such Bonds, be sufficient, to pay when due the interest to become due on such Bonds on and prior to the maturity date or redemption date thereof, as the case may be, and the principal of and redemption premiums, if any, on such Bonds; and (iii) in the event such Bonds are not by their terms subject to redemption within the next succeeding 60 days, the Authority shall have given the Trustee in form satisfactory to it irrevocable instructions to mail as soon as practicable, a notice to the Owners of such Bonds and to the Securities Depositories and the Information Services that the deposit required by

clause (ii) above has been made with the Trustee and that such Bonds are deemed to have been paid in accordance with this Section and stating the maturity date or redemption date upon which money is to be available for the payment of the principal of and redemption premiums, if any, on such Bonds.

INSTALLMENT PURCHASE AGREEMENT

The Installment Agreement sets forth certain terms and conditions of the purchase of the Project by the City. Certain provisions of the Installment Purchase Agreement are summarized below. Other provisions are summarized in the Official Statement under the caption "SECURITY FOR THE SERIES 2002 BONDS." The summary does not purport to be complete or definitive and is qualified in its entirety by reference to the full terms of the Installment Purchase Agreement.

Selected Definitions

- "Accountant's Report" means a report signed by an Independent Certified Public Accountant.
- "Adjusted Debt Service" means, for any Fiscal Year, Debt Service for such Fiscal Year minus an amount equal to earnings from investments in any Reserve Fund or Reserve Account for Parity Obligations for such Fiscal Year.
- "Adjusted Net System Revenues" means, for any Fiscal Year, the Net System Revenues for such Fiscal Year minus an amount equal to earnings from investments in any Reserve Fund or Reserve Account for Parity Obligations for such Fiscal Year.
- "Authorized City Representative" means the City Manager of the City or such other officer or employee of the City or other person who has been designated in writing as such representative by the City Manager.
- "Authorizing Ordinance" means the ordinance pursuant to which the Installment Purchase Agreement was authorized and any additional Ordinance or official authorizing act of the council of the City approving execution and delivery of any Supplement to the Installment Purchase Agreement or any Issuing Instrument.
- "Balloon Indebtedness" means, with respect to any Series of Obligations twenty-five percent (25%) or more of the principal of which matures on the same date or within a 12-month period (with sinking fund payments on Term Obligations deemed to be payments of matured principal), that portion of such Series of Obligations which matures on such date or within such 12-month period; provided, however, that to constitute Balloon Indebtedness the amount of indebtedness maturing on a single date or over a 12-month period must equal or exceed 150% of the amount of such Series of Obligations which matures during any preceding 12-month period. For purposes of the definition, the principal amount maturing on any date shall be reduced by the amount of such indebtedness which is required, by the documents governing such indebtedness, to be amortized by prepayment or redemption prior to its stated maturity date.
- "Bond Counsel" means a firm of attorneys which are nationally recognized as experts in the area of municipal finance.
- "Capacity Charge" means a charge imposed upon a person, firm, corporation or other entity incident to the granting of a permit for a new water connection or due to an increase in water usage by the addition of any type of dwelling, commercial or industrial unit, which charge is based upon an increase in water consumption as measured by equivalent dwelling units, and the proceeds of which are used to construct, improve and expand the Water System to accommodate the additional business of such added dwellings or commercial or industrial units.
 - "Components" means components of the Project specified in a Supplement.
- "Consultant" means the consultant, consulting firm, engineer, architect, engineering firm, architectural firm, accountant or accounting firm retained by the City to perform acts or carry out the duties provided for such

consultant in the Installment Purchase Agreement. Such consultant, consulting firm, engineer, architect, engineering firm or architectural firm shall be nationally recognized within its profession for work of the character required. Such accountants or accounting firm shall be independent certified public accountants licensed to practice in the State of California.

"Credit Provider" means any municipal bond insurance company, bank or other financial institution or organization which is performing in all material respects its obligations under any Credit Support Instrument for some or all of the Parity Obligations.

"Credit Provider Reimbursement Obligations" means obligations of the City to repay, from Net System Revenues, amounts advanced by a Credit Provider as credit support or liquidity for Parity Obligations, which obligation shall be a Parity Obligation or a Subordinated Obligation, as designated by the City.

"Credit Support Instrument" means a policy of insurance, a letter of credit, a stand-by purchase agreement, revolving credit agreement or other credit arrangement pursuant to which a Credit Provider provides credit or liquidity support with respect to the payment of interest, principal or the purchase price of any Parity Obligations.

"Debt Service" means, except as otherwise provided in the next clause, for any Fiscal Year, the sum of (a) the interest payable during such Fiscal Year on all Outstanding Parity Obligations, assuming that all Outstanding Serial Parity Obligations are retired as scheduled and that all Outstanding Term Parity Obligations are redeemed or paid from sinking fund payments as scheduled (except to the extent that such interest is to be paid from the proceeds of sale of any Parity Obligations), (b) that portion of the principal amount of all Outstanding Serial Parity Obligations maturing on the next succeeding principal payment date which falls in such Fiscal Year (excluding Serial Obligations which at the time of issuance are intended to be paid from the sale of a corresponding amount of Parity Obligations), (c) that portion of the principal amount of all Outstanding Term Parity Obligations required to be redeemed or paid on any redemption date which falls in such Fiscal Year (together with the redemption premiums, if any, thereon); provided that, (1) as to any Balloon Indebtedness, Tender Indebtedness and Variable Rate Indebtedness, interest thereon shall be calculated as provided in the definition of Maximum Annual Debt Service and principal shall be deemed due at the nominal maturity dates thereof; (2) the amount on deposit in a debt service reserve fund on any date of calculation of Debt Service shall be deducted from the amount of principal due at the final maturity of the Parity Obligations for which such debt service reserve fund was established and in each preceding year until such amount is exhausted; (3) the amount of any interest payable on any Parity Obligation for which there exists a Qualified Swap Agreement shall be the net amount payable by the City as provided in paragraph (d) or paragraph (e), as applicable, of the definition of Maximum Annual Debt Service; and (4) the amount of payments on account of Parity Obligations which are redeemed, retired or repaid on the basis of the accreted value due on the scheduled redemption, retirement or repayment date shall be deemed principal payments, and interest that is compounded and paid as part of the accreted value shall be deemed payable on the scheduled redemption, retirement or repayment date but not before.

"Default Rate" means the Maximum Rate.

"Defaulted Obligations" means Obligations in respect of which an Event of Default has occurred and is continuing.

"Engineer's Report" means a report signed by an Independent Engineer.

"Fiscal Year" means the period beginning on July 1 of each year and ending on the next succeeding June 30, or any other twelve-month period selected and designated as the official Fiscal Year of the City.

"Independent Certified Public Accountant" means any firm of certified public accountants appointed by the City, and each of whom is independent pursuant to the Statement on Auditing Standards No. 1 of the American Institute of Certified Public Accountants.

"Independent Engineer" means any registered engineer or firm of registered engineers of national reputation generally recognized to be well qualified in engineering matters relating to water systems, appointed and paid by the City.

"Installment Payment Date" means any date on which an Installment Payment is due as specified in or determined pursuant to a Supplement.

"Installment Payments" means the Installment Payments scheduled to be paid by the City under and pursuant the Master Installment Purchase Agreement and any Supplement.

"Installment Payment Obligations" means Obligations consisting of or which are supported in whole by Installment Payments.

"Issuing Instrument" shall mean any indenture, trust agreement, loan agreement, installment purchase agreement, lease or Installment Purchase Agreement including any Supplement or other instrument under which Obligations are issued or created.

"Law" means the Charter and all laws of the State supplemental thereto.

"Maintenance and Operation Costs of the Water System" means (a) a Qualified Take or Pay Obligation and (b) the reasonable and necessary costs spent or incurred by the City for maintaining and operating the Water System, calculated in accordance with generally accepted accounting principles, including (among other things) the costs of the purchase, delivery or storage of water, the reasonable expenses of maintenance and repair and other expenses necessary to maintain and preserve the Water System in good repair and working order, and including administrative costs of the City attributable to the Water System, including the Project and the Installment Purchase Agreement, salaries and wages of employees, payments to employees retirement systems (to the extent paid from System Revenues), overhead, taxes (if any), fees of auditors, accountants, attorneys or engineers and insurance premiums, and including all other reasonable and necessary costs of the City or charges required to be paid by it to comply with the terms of the Obligations, including the Installment Purchase Agreement, including any amounts required to be deposited in the Rebate Fund pursuant to the Tax Certificate, and fees and expenses payable to any Credit Provider (other than in repayment of a Credit Provider Reimbursement Obligation), but excluding in all cases (1) depreciation, replacement and obsolescence charges or reserves therefor, (2) amortization of intangibles or other bookkeeping entries of a similar nature, (3) costs of capital additions, replacements, betterments, extensions or improvements to the Water System which under generally accepted accounting principles are chargeable to a capital account or to a reserve for depreciation, (4) charges for the payment of principal and interest on any general obligation bond issued for Water System purposes, (5) charges for the payment of principal and interest on any debt service on account of any obligation on a parity with or subordinate to the Installment Payments, and (6) all payments made pursuant to any Qualified Swap Agreement.

"Maximum Annual Debt Service" means, at any point in time, with respect to Parity Obligations then Outstanding, the maximum amount of principal and interest becoming due on the Parity Obligations in the then current or any future Fiscal Year, calculated by the City or by an Independent Certified Public Accountant as provided in the definition and provided to the Trustee. For purposes of calculating Maximum Annual Debt Service, the following assumptions shall be used to calculate the principal and interest becoming due in any Fiscal Year:

(a) in determining the principal amount due in each year, payments shall (except to the extent a different subsection of the definition applies for purposes of determining principal maturities or amortization) be assumed to be made in accordance with any amortization schedule established for such debt, including the amount of any Parity Obligations which are or have the characteristics of commercial paper and which are not intended at the time of issuance to be retired from the sale of a corresponding amount of Parity Obligations, and including any scheduled mandatory redemption or prepayment of Parity Obligations on the basis of accreted value due upon such redemption or prepayment, and for such purpose, the redemption payment or prepayment shall be deemed a principal payment; provided, however, that with respect to Parity Obligations which are or have the characteristics of commercial paper and which are intended at the time of issuance to be retired from the sale of a corresponding

amount of Parity Obligations, and which would not constitute Balloon Indebtedness, each maturity thereof shall be treated as if it were to be amortized in substantially equal installments of principal and interest over a term of 30 years commencing in the year of such stated maturity; in determining the interest due in each year, interest payable at a fixed rate shall (except to the extent subsection (b) or (c) of the definition applies) be assumed to be made at such fixed rate and on the required payment dates;

- (b) if all or any portion or portions of an Outstanding Series of Parity Obligations constitutes Balloon Indebtedness or if all or any portion or portions of a Series of Parity Obligations or such payments then proposed to be issued would constitute Balloon Indebtedness, then, for purposes of determining Maximum Annual Debt Service, each maturity which constitutes Balloon Indebtedness shall be treated as if it were to be amortized in substantially equal annual installments of principal and interest over a term of 30 years commencing in the year the stated maturity of such Balloon Indebtedness occurs, the interest rate used for such computation shall be determined as provided in (d) or (e) below, as appropriate, and all payments of principal and interest becoming due prior to the year of the stated maturity of the Balloon Indebtedness shall be treated as described in (a) above;
- (c) if any of the Outstanding Series of Parity Obligations constitutes Tender Indebtedness or if Parity Obligations proposed to be issued would constitute Tender Indebtedness, then for purposes of determining Maximum Annual Debt Service, Tender Indebtedness shall be treated as if the principal amount of such Parity Obligations were to be amortized in accordance with the amortization schedule set forth in such Tender Indebtedness or in the standby purchase or liquidity facility established with respect to such Tender Indebtedness, or if no such amortization schedule is set forth, then such Tender Indebtedness shall be deemed to be amortized in substantially equal annual installments of principal and interest over a term of 30 years commencing in the year in which such Series first subject to tender, the interest rate used for such computation shall be determined as provided in (d) or (e) below, as appropriate;
- (d) if any Outstanding Parity Obligations constitute Variable Rate Indebtedness (except to the extent paragraph (b) relating to Balloon Indebtedness or paragraph (c) relating to Tender Indebtedness applies), the interest rate on such Obligation shall be assumed to be 110% of the daily average interest rate on such Parity Obligations during the 12 months ending with the month preceding the date of calculation, or such shorter period that such Parity Obligations shall have been Outstanding; provided that in the event that such Variable Rate Indebtedness has been issued in connection with a Qualified Swap Agreement, the interest rate for purposes of computing Maximum Annual Debt Service shall be determined by (1) calculating the annualized net amount paid by the City under such Variable Rate Indebtedness and Qualified Swap Agreement (after giving effect to payments made under the Variable Rate Indebtedness and made and received by the City under the Qualified Swap Agreement) during the 12 months ending with the month preceding the date of calculation, or such shorter period that such Qualified Swap Agreement has been in effect, and (2) dividing the amount calculated in clause (1) by the average daily balance of the related Parity Obligations Outstanding during the 12-month period contemplated by clause (1);
- if Parity Obligations proposed to be issued will be Variable Rate Indebtedness (except to the extent subsection (b) relating to Balloon Indebtedness or subsection (c) relating to Tender Indebtedness applies), then such Parity Obligations shall be assumed to bear interest at 80% of the average of the average Revenue Bond Index during the calendar quarter preceding the calendar quarter in which the calculation is made, or if that index is no longer published, another similar index selected by the City, or if the City fails to select a replacement index, an interest rate equal to 80% of the yield for outstanding United States Treasury bonds having an equivalent maturity, or if there are no such Treasury bonds having such maturities, 100% of the lowest prevailing prime rate of any of the five largest commercial banks in the United States ranked by assets; provided that in the event that such Variable Rate Indebtedness will be issued in connection with a Qualified Swap Agreement, the interest rate for purposes of computing Maximum Annual Debt Service shall be determined by (1) calculating the net amount to be paid by the City under such Variable Rate Indebtedness and Qualified Swap Agreement after giving effect to payments to be made under the Variable Rate Indebtedness and to be made and received by the City under the Qualified Swap Agreement) for the period during which the Qualified Swap Agreement is to be in effect and for the purpose any variable rate of interest agreed to be paid thereunder shall be deemed to be the rate at which the related Parity Obligation shall be assumed to bear interest, and (2) dividing the amount calculated in clause (1) by the average principal amount of the related Parity Obligation to be Outstanding during the first year after the issuance of such Parity Obligation;

- (f) if moneys or Permitted Investments have been deposited by the City into a separate fund or account or are otherwise held by the City or by a fiduciary to be used to pay principal and/or interest on specified Parity Obligations, then the principal and/or interest to be paid from such moneys, Permitted Investments or from the earnings thereon shall be disregarded and not included in calculating Maximum Annual Debt Service;
- (g) if Parity Obligations are Paired Obligations, the interest thereon shall be the resulting linked rate or effective fixed rate to be paid with respect to such Paired Obligations; and
- (h) in the event that an agreement or commitment which, at the time of calculation is a Qualified Swap Agreement is or is to be in effect with respect to a Parity Obligation which is not Variable Rate Indebtedness, the interest rate of such Parity Obligation for purposes of calculating Maximum Annual Debt Service shall be calculated as follows:
 - (1) for such a Qualified Swap Agreement which is in effect on the date of calculation, the interest rate shall be calculated in the same manner as is specified in paragraph (d) for a Qualified Swap Agreement issued in connection with Variable Rate Indebtedness which is Outstanding on the date of calculation; and
 - (2) for such a Qualified Swap Agreement which is not in effect on the date of calculation, the interest rate shall be calculated in the same manner as is specified in paragraph (e) for a Qualified Swap Agreement to be issued in connection with Variable Rate Indebtedness to be Outstanding after the date of calculation, and for the purpose any variable rate of interest agreed to be paid thereunder shall be assumed to be the rate assumed for Variable Rate Indebtedness described in paragraph (e).
 - "Maximum Rate" means, on any day, the maximum interest rate allowed by law.
- "Net Proceeds" means, when used with respect to any insurance, self insurance or condemnation award, the proceeds from such award that are remaining after payment of all expenses (including attorneys' fees) incurred in the collection of such proceeds.
- "Net System Revenues" means, for any Fiscal Year, the System Revenues for such Fiscal Year less the Maintenance and Operation Costs of the Water System for such Fiscal Year.
- "Obligations" means (a) obligations of the City for money borrowed (such as bonds, notes or other evidences of indebtedness) or as installment purchase payments under any contract (including Installment Payments), or as lease payments under any financing lease (determined to be such in accordance with generally accepted accounting principles), the principal and interest on which are payable from Net System Revenues; (b) obligations to replenish any debt service reserve funds with respect to such obligations of the City; (c) obligations secured by or payable from any of such obligations of the City; and (d) obligations of the City payable from Net System Revenues under (1) any contract providing for payments based on levels of, or changes in, interest rates, currency exchange rates, stock or other indices, (2) any contract to exchange cash flows or a series of payments, or (3) any contract to hedge payment, currency, rate spread or similar exposure, including but not limited to interest rate swap agreements and interest rate cap agreements.
- "Outstanding," when used as of any particular time with respect to Obligations, means all Obligations theretofore or thereupon executed, authenticated and delivered by the City or any trustee or other fiduciary, except (a) Obligations theretofore cancelled or surrendered for cancellation; (b) Obligations paid or deemed to be paid within the meaning of any defeasance provisions thereof; (c) Obligations owned by the City or the Corporation; and (d) Obligations in lieu of or in substitution for which other Obligations have been executed and delivered.
- **"Owner"** means any person who shall be the registered owner of any Outstanding Obligation certificate or other evidence of a right to receive Installment Payments directly or as security for payment of the Obligation.

"Paired Obligations" shall mean any Series (or portion thereof) of Parity Obligations designated as Paired Obligations in a Supplement or related Issuing Instrument or other document authorizing the issuance or incurrence thereof, which are simultaneously issued or incurred (a) the principal of which is of equal amount maturing and to be redeemed (or cancelled after acquisition thereof) on the same dates and in the same amounts, and (b) the interest rates which, taken together, result in an irrevocably fixed interest rate obligation of the City for the terms of such Paired Obligations.

"Parity Installment Obligation" means Obligations consisting of or payable from Installment Payments which are not subordinated in right of payment to other Installment Payments.

"Parity Obligations" means (a) Parity Installment Obligations, (b) Obligations the principal and interest of which are payable on a parity with Parity Installment Obligations, (c) Reserve Fund Obligations, and (d) payments due under Qualified Swap Agreements that do not constitute termination or unwinding payments.

"Paying Agent" or "Paying Agents" means, with respect to an Installment Payment Obligation or Series of Installment Payment Obligations, the bank, trust company or other financial institution, if any, or other entities designated as the place or entity which shall make payment on such Installment Payment Obligation or a Series of Installment Payment Obligations and/or the interest thereon instead of or in addition to the Treasurer's office.

"Payment Fund" means the fund designated in the Issuing Instrument as the fund into which Installment Payments are to be deposited for the purposes of paying principal or interest on related Obligations.

"Permitted Investments" means investments which pursuant to an Issuing Instrument are permissible for the investment of funds received from the sale of Obligations pursuant to the Issuing Document or from other funds held pursuant to the Issuing Document.

"Project" means the construction, replacement and improvements to the Water System described in the Installment Purchase Agreement and as modified with respect to Components in conformance with the Installment Purchase Agreement.

"Purchase Price" means the principal amount plus interest thereon owed by the City to the Corporation under the terms the Installment Purchase Agreement and as specified in a Supplement.

"Qualified Swap Agreement" means a contract or agreement, payable from Net System Revenues on a parity with Parity Obligations to the extent provided in the definition of Parity Obligations, intended to place Obligations on the interest rate, currency, cash flow or other basis desired by the City, including, without limitation, any interest rate swap agreement, currency swap agreement, forward payment conversion agreement or futures contract, any contract providing for payments based on levels of, or changes in, interest rates, currency exchange rates, stock or other indices, any contract to exchange cash flows or a series of payments, or any contract, including, without limitation, an interest rate floor or cap, or an option, put or call, to hedge payment, currency, rate, spread or similar exposure, between the City and a counterparty; provided that not less than 30 days prior to the City's execution of such contract or agreement, each Rating Agency which maintains a rating with respect to any Parity Obligation receives notice in writing of the City's pending execution thereof.

"Qualified Take or Pay Obligation" means the obligation of the City to make use of any facility, property or services, or some portion of the capacity thereof, or to pay therefor from System Revenues, or both, whether or not such facilities, properties or services are ever made available to the City for use, and there is provided to the City a certificate of the City or of an Independent Engineer to the effect that the incurrence of such obligation will not adversely affect the ability of the City to comply with City's covenant to fix, prescribe and collect rates and charges for the Water Service in the manner prescribed in Installment Purchase Agreement.

"Rebate Requirement" shall have the meaning specified in any Tax Certificate.

- "Reserve Fund Credit Facility" shall mean a letter of credit, line of credit, surety bond, insurance policy or similar facility deposited in a Reserve Fund or Reserve Account in lieu of or in partial substitution for cash or securities on deposit therein.
- **"Reserve Fund Obligation"** means the obligation of the City to pay amounts advanced under any Reserve Fund Credit Facility entered into in accordance with the provisions of any Issuing Instrument or Supplement, which obligation shall be a Parity Obligation, if the Reserve Fund Credit Facility secures a Parity Obligation, or a Subordinated Obligation, if the Reserve Fund Credit Facility secures a Subordinated Obligation.
- "Reserve Requirement" shall have the meaning given to such term in any Issuing Instrument or Supplement.
 - "Serial Obligations" means Obligations for which no sinking fund payments are provided.
- "Serial Parity Obligations" means Serial Obligations which are Installment Payments or are payable on a parity with Parity Installment Obligations.
- "Series" means Obligations issued at the same time or sharing some other common term or characteristic and designated as a separate Series.
- "Subordinated Credit Provider" means any municipal bond insurance company, bank or other financial institution or organization which is performing in all material respects its obligations under any Subordinated Credit Support Instrument for some or all of the Subordinated Obligations.
- "Subordinated Credit Provider Reimbursement Obligations" means obligations of the City to repay, from Net System Revenues, amounts advanced by a Subordinated Credit Provider as credit support or liquidity for Subordinated Obligations, which obligations shall be a Subordinated Obligation.
- **"Subordinated Credit Support Instrument"** means a policy of insurance, a letter of credit, a stand-by purchase agreement, revolving credit agreement or other credit arrangement pursuant to which a Subordinated Credit Provider provides credit or liquidity support with respect to the payment of interest, principal or the purchase price of any Subordinated Obligations.
- "Subordinated Obligations" means any Obligations, the payment of which is subordinated in right of payment to Parity Obligations.
- **"Supplement"** means a supplement, substantially in the form provided in the Master Installment Purchase Agreement, providing for the payment of specific Installment Payments as the Purchase Price for Components of the Project, executed and delivered by the City and the Corporation.
- "System Revenues" means all income, rents, rates, fees, charges and other moneys derived from the ownership or operation of the Water System, including, without limiting the generality of the foregoing,
- (a) all income, rents, rates, fees, charges, or other moneys derived by the City from the water services or facilities, and commodities or byproducts, including hydro-electric power, sold, furnished or supplied through the facilities of or in the conduct or operation of the business of the Water System, and including, without limitation, investment earnings on the operating reserves to the extent that the use of such earnings is limited to the Water System by or pursuant to law, and earnings on any Reserve Fund for Obligations but only to the extent that such earnings may be utilized under the Issuing Instrument for the payment of debt service for such Obligations;
- (b) standby charges and Capacity Charges (which may not be used to pay Maintenance and Operation Costs of the Water System) derived from the services and facilities sold or supplied through the Water System;
 - (c) the proceeds derived by the City directly or indirectly from the lease of a part of the Water System;

- (d) any amount received from the levy or collection of taxes which are solely available and are earmarked for the support of the operation of the Water System;
- (e) amounts received under contracts or agreements with governmental or private entities and designated for capital costs for the Water System (which may not be used to pay Maintenance and Operation Costs of the Water System); and
- (f) grants for maintenance and operations received from the United States of America or from the State of California; provided, however, that System Revenues shall not include: (1) in all cases, customers' deposits or any other deposits or advances subject to refund until such deposits or advances have become the property of the City; and (2) the proceeds of borrowings.
- (g) Notwithstanding the foregoing, there shall be deducted from System Revenues any amounts transferred into a Rate Stabilization Fund as contemplated by the Master Installment Purchase Agreement, and any amounts transferred from current System Revenues to the Secondary Purchase Fund as contemplated by the Master Installment Purchase Agreement, and there shall be added to System Revenues any amounts transferred out of such Rate Stabilization Fund or the Secondary Purchase Fund to pay Maintenance and Operation Costs of the Water System.
- **"Tax Certificate"** shall mean any certificate delivered with respect to the maintenance of the tax-exempt status of Tax-Exempt Installment Payment Obligations.
- "Tax-Exempt Installment Payment Obligations" means Installment Payment Obligations in respect of which it is intended that the interest component thereof will be excluded from gross income pursuant to Section 103 of the Code.
- "Tender Indebtedness" means any Parity Obligations or portions of Parity Obligations, a feature of which is an option, on the part of the holders thereof, or an obligation, under the terms of such Parity Obligations, to tender all or a portion of such Parity Obligations to the City, a Paying Agent or other fiduciary or agent for payment or purchase and requiring that such Bonds or portions of Bonds or that such rights to payments or portions of payments be purchased if properly presented.
- **"Term Parity Obligations**" means Term Obligations which are Parity Installment Obligations or are payable on a parity with Parity Installment Obligations.
- "Term Obligations" means Obligations which are payable on or before their specified maturity dates from sinking fund payments established for that purpose and calculated to retire such Obligations on or before their specified maturity dates.
- "Trustee" means a financial institution acting in its capacity as Trustee under and pursuant to the any Issuing Instrument, and its successors and assigns.
- "Variable Rate Indebtedness" means any portion of indebtedness evidenced by Parity Obligations the interest rate on which is not established at the time of incurrence of such indebtedness and has not, at some subsequent date, been established at a rate which is not subject to fluctuation or subsequent adjustment, excluding Paired Obligations.
- **"Water Service"** means the collection, conservation, production, storage, treatment, transmission, furnishing and distribution services made available or provided by the Water System.
- "Water System" means any and all facilities, properties, improvements and works at any time owned, controlled or operated by the City as part of the public utility system of the City for water purposes, for the development, obtaining, conservation, production, storage, treatment, transmission, furnishing and distribution of water and its other commodities or byproducts for public and private use (whether located within or without the

City), and any related or incidental operations designated by the City as part of the Water System, including reclaimed and re-purified water.

"Water Utility Fund" means the fund by that name established under the Charter.

Acquisition and Construction of the Project

Acquisition and Construction of the Project; Components. (a) The Corporation has agreed to cause the Project to be constructed, acquired and installed by the City, as agent of the Corporation. The City will enter into contracts and provide for, as agent of the Corporation, the complete construction, acquisition and installation of the Project. The City has agreed that it will cause the construction, acquisition and installation of the Project to be diligently performed.

- (b) Except to the extent of proceeds of Obligations which are deposited in an Acquisition Fund, the Corporation shall be under no liability of any kind or character whatsoever for the payment of any cost of any Components. In the event the proceeds of Obligations deposited in an Acquisition Fund are insufficient to complete the construction, acquisition and installation of Components, the City shall cause to be deposited in such Acquisition Fund (or shall otherwise appropriate and encumber) from and to the extent of available amounts on deposit in the Water Utility Fund (or other lawfully available moneys) an amount equal to that necessary to complete the construction, acquisition and installation of such Components.
- (c) The Corporation will not undertake to cause any component of the Project to be constructed, acquired or installed unless and until the City and the Corporation have entered into a Supplement specifying the Components of the Project to be installed, the date of completion, the purchase price to be paid by the City under the Installment Purchase Agreement for that Component of the Project, and the Installment Payments or the method of calculating Installment Payments.

Changes to the Project. (a) From time to time and at any time, the City may modify or amend the description of the Project, to eliminate any part thereof and/or to substitute another Project or Projects, all without obtaining any consent, by filing an amendment with the Corporation and the Trustee; provided however, that no such amendment shall substitute a Project or Projects which are not to be accounted for as an asset of the Water Utility Fund or shall in any way impair the obligations of the City contained in any Supplement executed and delivered prior to any such amendment.

- (b) The City may substitute other improvements for those listed as Components in any Supplement, but only if the City first files with the Corporation and the Trustee a certificate of an Authorized City Representative, in the form described in the Installment Purchase Agreement.
- (c) Substituted Components may include or consist of an undivided interest in such Components, in which event the costs associated with the substituted Components over and above the undivided interest need not be deposited in the Acquisition Fund (or otherwise appropriated and encumbered); provided, however, that the certificate of an Authorized City Representative specifies that the funds necessary to complete the substituted Components are on deposit in the Acquisition Fund or otherwise appropriated and encumbered.

Installment Payments

Purchase Price. (a) The City will pay the Purchase Price for any Components being purchased as provided in a Supplement. The Purchase Price to be paid by the City to the Corporation pursuant to any Supplement to the Installment Purchase Agreement, solely from Net System Revenues and from no other sources, is the sum of the principal amount of the City's obligations under such Supplement plus the interest to accrue on the unpaid balance of such principal amount from the effective date thereof over the term thereof, subject to prepayment as provided therein.

- (b) The principal amount of the Installment Payments to be made by the City under a Supplement shall be paid at least three Business Days prior to the date such Installment Payments are payable as specified in such Supplement or at such other earlier time or times and in the manner or manners as specified in such Supplement. In the event the principal amount of an Installment Payment is not paid by the date the same is due and payable as specified in such Supplement, the same shall bear interest at the Default Rate, commencing on the day the same as due, to, but not including, the payment date.
- (c) The interest to accrue on the unpaid balance of such principal amount shall be paid at least three Business Days prior to the date such interest is payable as specified in a Supplement or at such other earlier time or times as specified in such Supplement, and shall be paid by the City as and constitute interest paid on the principal amount of the City's obligations thereunder. Interest shall be payable in an amount not exceeding the Maximum Rate at the time of incurring such obligation, at such intervals and according to such interest rate formulas as shall be specified in a Supplement or by reference to any Issuing Instrument to which such Supplement relates, and shall be payable with such frequency as shall be specified therein. In the event that interest is not paid by the date such interest is payable, to the extent permitted by applicable law, such interest thereafter bear interest at the Default Rate, commencing on the day the same is due, to, but not including, the payment date.

Installment Payments; Reserve Fund Payments. (a) The City shall, subject to any rights of prepayment provided for in a Supplement, pay to the Corporation, solely from Net System Revenues and from no other sources, the Purchase Price in Installment Payments over a period not to exceed the maximum period permitted by law, all as specified in a Supplement.

- (b) In the event that a Trustee notifies the City that the amount on deposit in a Reserve Fund or Reserve Account is less than the Reserve Requirement, the City shall deposit or cause to be deposited, solely from Net System Revenues in accordance with the Installment Purchase Agreement, in such Reserve Fund or Reserve Account such amounts on a monthly basis as are necessary to increase the amount on deposit therein to the Reserve Requirement in the ensuing twelve months.
- (c) The obligation of the City to make the Installment Payments solely from Net System Revenues is absolute and unconditional, and until such time as the Purchase Price shall have been paid in full (or provision for the payment thereof shall have been made pursuant to the Installment Purchase Agreement), the City will not discontinue or suspend any Installment Payments required to be made by it under the section when due, whether or not the Project or any part thereof is operating or operable or has been completed, or its use is suspended, interfered with, reduced or curtailed or terminated in whole or in part, and such Installment Payments shall not be subject to reduction whether by offset or otherwise and shall not be conditioned upon the performance or nonperformance by any party of any agreement for any cause whatsoever.

System Revenues

Commitment of the Net System Revenues. All Parity Obligations, including Parity Installment Payment Obligations, shall be secured by a first priority lien on and pledge of Net System Revenues. The City has granted such first priority lien on and pledge of Net System Revenues to secure Parity Obligations. Such lien and pledge shall constitute a first priority lien on Net System Revenues. All Parity Obligations shall be of equal rank with each other without preference, priority or distinction of any Parity Obligations over any other Parity Obligations. All Subordinated Obligations shall be secured by a second priority lien on and pledge of Net System Revenues that is junior and subordinate to the lien on and pledge of Net System Revenues securing Parity Obligations. The City has granted such second priority lien on and pledge of Net System Revenues to secure Subordinated Obligations. Such lien and pledge shall constitute a second priority lien on Net System Revenues. All Subordinated Obligations shall be of equal rank with each other without preference, priority or distinction of any Subordinated Obligations over any other Subordinated Obligations. The City represents and states that it has not granted any liens or charges on any of the Net System Revenues except as provided in the Installment Purchase Agreement; provided, however, that out of Net System Revenues there may be apportioned such sums for such purposes as are expressly permitted by the Installment Purchase Agreement. Nothing contained in the Installment Purchase Agreement shall limit the ability of the City to grant liens on and pledges of Net System Revenues that are subordinate to the liens on and pledges of Net

System Revenues for the benefit of Parity Obligations and Subordinated Obligations contained in the Installment Purchase Agreement.

Allocation of System Revenues. (a) In order to carry out and effectuate the commitment and pledge contained in the Installment Purchase Agreement, the City agrees and covenants that all System Revenues shall be received by the City in trust and shall be deposited when and as received in the Water Utility Fund, which fund the City agrees and covenants to maintain so long as any Installment Payment Obligations or payments due by the City under any Qualified Swap Agreement related thereto remain unpaid, and all moneys in the Water Utility Fund shall be so held in trust and applied and used solely as provided below. The City shall pay from the Water Utility Fund: (1) directly or as otherwise required all Maintenance and Operation Costs of the Water System; (2) to the Trustee for deposit in the Payment Fund for Parity Obligations, including Reserve Fund Obligations for Parity Obligations, the amounts specified in any Issuing Instrument, as payments due on account of Parity Obligations (including any Credit Provider Reimbursement Obligations designated as Parity Obligations), other than payments due as Parity Obligations by the City under a Qualified Swap Agreement; and (3) to the counterparty specified in any Qualified Swap Agreement, the amounts or payments due under such Qualified Swap Agreement as Parity Obligations. In the event there are insufficient Net System Revenues to make all of the payments contemplated by clauses (2) and (3) of the immediately preceding sentence, then said payments should be made as nearly as practicable, pro rata, based upon the respective unpaid principal amounts of said Parity Obligations.

- (b) After the payments contemplated by subsection (a) above have been made, and in any event not less frequently than January 15 and July 15 of each year, any remaining Net System Revenues shall be used to make up any deficiency in the Reserve Funds and Reserve Accounts for Parity Obligations. Notwithstanding the use of a Reserve Fund Credit Facility in lieu of depositing funds in the Reserve Fund and Reserve Accounts for Parity Obligations, in the event of any draw on the Credit Facility, there shall be deemed a deficiency in such Reserve Fund and Reserve Accounts until the amount of the Reserve Fund Credit Facility is restored to its pre-draw amount. In the event there are insufficient Net System Revenues to make up all deficiencies in all Reserve Funds and Reserve Accounts for Parity Obligations, such payments into Reserve Funds and Reserve Accounts shall be made as nearly as practicable pro rata based on the respective unpaid principal amount of all Parity Obligations. Any amounts thereafter remaining in the Water Utility Fund may from time to time be used to pay the amounts specified in any Issuing Instrument, as payments due on account of Subordinated Obligations (including any Reserve Fund Obligations for Subordinated Obligations, any Credit Provider Reimbursement Obligations designated as Subordinated Obligations and any Subordinated Credit Provider Reimbursement Obligations) provided the following conditions are met:
 - (1) all Maintenance and Operation Costs of the Water System are being and have been paid and are then current; and
 - (2) all deposits and payments contemplated by clauses (2) and (3) of paragraph (a) above shall have been made in full and no deficiency in any Reserve Fund or Reserve Account for Parity Obligations shall exist, and there shall have been paid, or segregated within the Water Utility Fund, the amounts payable during the current month pursuant to clauses (2) and (3) of paragraph (a) above.

Additional Obligations. (a) The City may not create any Obligations the payments of which are senior or prior in right to the payment by the City of Parity Obligations.

- (1) Without regard to section (c) below, the City may at any time enter into or create an obligation or commitment which is a Reserve Fund Obligation or a Qualified Swap Agreement, provided the Obligation to which the Qualified Swap Agreement relates is a Parity Obligation.
- (2) After the initial issuance of Parity Obligations, the City may at any time and from time to time issue or create any other Parity Obligations, provided:
- (3) There shall not have occurred and be continuing (A) an Event of Default under the terms of the Installment Purchase Agreement, any Issuing Instrument or any Credit Support Instrument, or (B) an

event of default or termination event (as defined in any Qualified Swap Agreement) under any Qualified Swap Agreement; and

- (4) The City obtains or provides a certificate or certificates, prepared by the City or at the City's option by a Consultant, showing that:
 - (A) the Net System Revenues as shown by the books of the City for any 12 consecutive month period within the 18 consecutive months ending immediately prior to the incurring of such additional other Parity Obligations shall have amounted to at least 1.20 times the Maximum Annual Debt Service on all Parity Obligations to be Outstanding immediately after the issuance of the proposed Parity Obligations; or
 - (B) the estimated Net System Revenues for the five fiscal years following the earlier of (i) the end of the period during which interest on those Parity Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Parity Obligations are issued, or (ii) the date on which substantially all new facilities financed with such Parity Obligations are expected to commence operations, will be at least equal to 1.20 times the Maximum Annual Debt Service for all Parity Obligations which will be Outstanding immediately after the issuance of the proposed Parity Obligations.
- (b) For purposes of the computations to be made as described in subsection (c)(2)(B) above, the determination of Net System Revenues:
 - (1) may take into account any increases in rates and charges which relate to the Water System and which have been approved by the City Council, and shall take into account any reduction in such rates and charges which have been approved by the City Council, which will, for purposes of the test described in subsection (c)(2)(B), be effective during a Fiscal Year ending within the five-year period for which such estimate is made; and
 - (2) may take into account an allowance for any estimated increase in such Net System Revenues from any revenue producing additions or improvements to or extensions of the Water System, to be made with the proceeds of such additional indebtedness or with the proceeds of Parity Obligations previously issued, all in an amount equal to the estimated additional average annual Net System Revenues to be derived from such additions, improvements and extensions during the five-year period contemplated by subsection (c)(2)(B), all as shown by such certificate of the City or a Consultant, as applicable; and
 - (3) for the period contemplated by subsection (c)(2)(B) Maintenance and Operation Costs of the Water System shall initially be deemed to be equal to such costs for the 12 consecutive months immediately prior to incurring such other Parity Obligations for the first year of the five-year period, but adjusted if deemed necessary by the City or a Consultant, as applicable, for any increased Maintenance and Operations Costs of the Water System which are, in the judgment of the City or a Consultant, as applicable, essential to maintaining and operating the Water System and which will occur during any Fiscal Year ending within the period contemplated by subsection (c)(2)(B).
- (c) The certificate or certificates described above in subsection (c)(2)(B) shall not be required if the Parity Obligations being issued are for the purpose of (1) issuing the Parity Obligations initially issued under the Installment Purchase Agreement or (2) refunding (A) any then Outstanding Parity Obligations if at the time of the issuance of such Parity Obligations a certificate of an Authorized City Representative shall be delivered showing that the sum of Adjusted Debt Service on all Parity Obligations Outstanding for all remaining Fiscal Years after the issuance of the refunding Parity Obligations will not exceed the sum of Adjusted Debt Service on all Parity Obligations Outstanding for all remaining Fiscal Years prior to the issuance of such refunding Parity Obligations; or (B) then Outstanding Balloon Indebtedness, Tender Indebtedness or Variable Rate Indebtedness, but only to the extent that the principal amount of such indebtedness has been put, tendered to or otherwise purchased by a standby purchase or other liquidity facility relating to such indebtedness.

(d) Without regard to section (c) above, if (1) no Event of Default has occurred and is continuing and (2) no event of default or termination event attributable to an act of or failure to act by the City under any Qualified Swap Agreement or Credit Support Instrument has occurred and is continuing, the City may issue or incur Subordinated Obligations, and such Subordinated Obligations may be paid only in accordance with the provisions of the Installment Purchase Agreement.

Selected Covenants of the City

Compliance With Installment Purchase Agreement And Ancillary Agreements. (a) The City will punctually pay Parity Obligations in strict conformity with the terms of the Installment Purchase Agreement and thereof, and will faithfully observe and perform all the agreements, conditions, covenants and terms contained in the Installment Purchase Agreement required to be observed and performed by it, and will not terminate the Installment Purchase Agreement for any cause including, without limiting the generality of the foregoing, any acts or circumstances that may constitute failure of consideration, destruction of or damage to the Project, commercial frustration of purpose, any change in the tax or other laws of the United States of America or of the State of California or any political subdivision of either or any failure of the Corporation to observe or perform any agreement, condition, covenant or term contained in the Installment Purchase Agreement required to be observed and performed by it, whether express or implied, or any duty, liability or obligation arising out of or connected with the Installment Purchase Agreement or the insolvency, or deemed insolvency, or bankruptcy or liquidation of the Corporation or any force majeure, including acts of God, tempest, storm, earthquake, war, rebellion, riot, civil disorder, acts of public enemies, blockade or embargo, strikes, industrial disputes, lock outs, lack of transportation facilities, fire, explosion, or acts or regulations of governmental authorities.

- (b) The City will faithfully observe and perform all the agreements, conditions, covenants and terms contained in the Installment Purchase Agreement, including Supplements, and any Issuing Instrument, Credit Support Instrument or Qualified Swap Agreement relating to Parity Obligations required to be observed and performed by it, and it is expressly understood and agreed by and between the parties to the Installment Purchase Agreement that each of the agreements, conditions, covenants and terms contained in the Installment Purchase Agreement and therein is an essential and material term of the purchase of and payment for each Component by the City pursuant to, and in accordance with, and as authorized under the Law.
- (c) The City will faithfully observe and perform all of the agreements and covenants of the City contained in each Authorizing Ordinance and will not permit the same to be amended or modified so as to adversely affect the Owners of Installment Payment Obligations or the counterparty to any Qualified Swap Agreement that is in effect.
- (d) The City shall be unconditionally and irrevocably obligated, as long as any Installment Payment Obligations remain Outstanding and unpaid, to take all lawful action necessary or required to continue to entitle the City to collect and deposit such System Revenues in the Water Utility Fund for use as provided in the Installment Purchase Agreement; provided, however, such obligation does not, in any way, limit the City's ability to undertake any and all legal actions, including any appeals, in the defense of a federal court order dictating a water system configuration other than that approved and adopted by the City.

Against Encumbrances. The City will not make any pledge of or place any lien on the Net System Revenues except as otherwise provided or permitted in the Installment Purchase Agreement.

Debt Service Reserve Fund. The City will maintain or cause to be maintained each Reserve Fund and Reserve Account at the applicable Reserve Requirement. In the event the amount in any such fund or account falls below the applicable Reserve Requirement, the City will replenish such fund or account up to the applicable Reserve Requirement pursuant to the Installment Purchase Agreement.

Against Sale or Other Disposition of Property. (a) The City will not sell, lease or otherwise dispose of the Water System or any part thereof essential to the proper operation of the Water System or to the maintenance of the System Revenues, except as provided in the Installment Purchase Agreement. Further, the City will not, except as

otherwise provided in the Installment Purchase Agreement, enter into any agreement or lease which impairs the operation of the Water System or any part thereof necessary to secure adequate Net System Revenues for the payment of the Parity Obligations or which would otherwise impair the rights of the Corporation with respect to the System Revenues or the operation of the Water System.

- (b) The City may dispose of any of the works, plant properties, facilities or other parts of the Water System, or any real or personal property comprising a part of the Water System, only upon the approval of the City Council and consistent with one or more of the following:
 - (1) the City in its discretion may carry out such a disposition if the facilities or property being disposed of are not material to the operation of the Water System, or shall have become unserviceable, inadequate, obsolete or unfit to be used in the operation of the Water System or are no longer necessary, material or useful to the operation of the Water System, and if such disposition will not materially reduce the Net System Revenues and if the proceeds of such disposition are deposited in the Water Utility Fund;
 - the City in its discretion may carry out such a disposition if the City receives from the acquiror an amount equal to the fair market value of the portion of the Water System disposed of. As used in the subparagraph (2), "fair market value" means the most probable price that the portion being disposed of should bring in a competitive and open market under all conditions requisite to a fair sale, the willing buyer and willing seller each acting prudently and knowledgeably and assuming that the price is not affected by coercion or undue stimulus. The proceeds of the disposition shall be used (A) first, to promptly redeem, or irrevocably set aside for the redemption of, Parity Obligations and second, to promptly redeem, or irrevocably set aside for the redemption of, Subordinated Obligations, and/or (B) to provide for a part of the cost of additions to and betterments and extensions of the Water System; provided, however, that before any such disposition under the subparagraph (2), the City must obtain (i) a certificate of an Independent Engineer to the effect that upon such disposition and the use of the proceeds of the disposition as proposed by the City, the remaining portion of the Water System will retain its operational integrity and the estimated Net System Revenues for the five Fiscal Years following the Fiscal Year in which the disposition is to occur will be at least equal to 1.0 times all Obligations (other than Parity Obligations) payable in such Fiscal Years plus 1.20 times the Adjusted Debt Service on all Outstanding Parity Obligations during the five fiscal years following the Fiscal Year in which the disposition is to occur, taking into account (aa) the reduction in revenue resulting from the disposition, (bb) the use of any proceeds of the disposition for the redemption of Parity Obligations and/or Subordinated Obligations, (cc) the Independent Engineer's estimate of revenue from customers anticipated to be served by any additions to and betterments and extensions of the Water System financed in part by the proceeds of the disposition, and (dd) any other adjustment permitted in the preparation of a certificate under Installment Purchase Agreement, and (ii) confirmation from the Rating Agencies to the effect that the rating then in effect on any Outstanding Parity Obligations will not be reduced or withdrawn upon such disposition.
- (c) The City will operate the Water System in an efficient and economical manner, provided that the City may remove from service on a temporary or permanent basis such part or parts of the Water System as the City shall determine, so long as (a) Net System Revenues are at least equal to 100% of all Obligations (other than Parity Obligations) payable in the then-current Fiscal Year plus 120% of Adjusted Debt Service for the then current Fiscal Year, after giving effect to any defeasance of Parity Obligations and/or Subordinated Obligations occurring incident to such removal, and for each Fiscal Year thereafter to and including the Fiscal Year during which the last Installment Payment is due, after giving effect to such defeasance, as evidenced by (1) an Engineer's Report on file with the City, or (2) a Certificate of the City, if the value of the parts of the Water System to be so removed, as shown in the most recently published financial statements of the Water Utility Fund for which there is an accountant's report, is less than 5% of the total Water System Plant assets, as shown on such financial statements, and (b) the City shall have filed with the Trustee an opinion of Bond Counsel to the effect that the removal of such part or parts of the Water System will not adversely affect the exclusion from gross income for federal income tax purposes of the interest on Tax-Exempt Installment Payment Obligations.

Prompt Acquisition and Construction. The City will take all necessary and appropriate steps to construct, acquire and install the Project, as agent of the Corporation, with all practicable dispatch and in an expeditious manner and in conformity with law so as to complete the same as soon as possible.

Maintenance and Operation of the Water System; Budgets. The City will maintain and preserve the Water System in good repair and working order at all times and will operate the Water System in an efficient and economical manner and will pay all Maintenance and Operation Costs of the Water System as they become due and payable. The City will adopt and make available to the Corporation, on or before the effective date of the Installment Purchase Agreement, a budget approved by the City Council of the City setting forth the estimated Maintenance and Operation Costs of the Water System for the period from such date until the close of the then current Fiscal Year. On or before August 1, of each Fiscal Year, the City will adopt, and on or before 120 days after the beginning of the Fiscal Year, make available to the Corporation a budget approved by the City Council of the City setting forth the estimated Maintenance and Operation Costs of the Water System for such Fiscal Year. Any budget may be amended at any time during any Fiscal Year and such amended budget shall be filed by the City with the Corporation.

Amount of Rates and Charges; Rate Stabilization Fund; Other Funds. The City will fix, prescribe and collect rates and charges for the Water Service which will be at least sufficient (1) to pay during each Fiscal Year all Obligations (other than Parity Obligations) payable in such Fiscal Year, and (2) to yield during each Fiscal Year Adjusted Net System Revenues equal to 120% of the Adjusted Debt Service for such Fiscal Year. The City may make adjustments from time to time in such rates and charges and may make such classification thereof as it deems necessary, but shall not reduce the rates and charges then in effect unless the Net System Revenues from such reduced rates and charges will at all times be sufficient to meet the requirements of the paragraph.

Payment of Claims. The City will pay and discharge any and all lawful claims for labor, materials or supplies which, if unpaid, might become a lien on the System Revenues or any part thereof or on any funds in the hands of the City or the Trustee might impair the security of the Installment Payments, but the City shall not be required to pay such claims if the validity thereof shall be contested in good faith.

Compliance with Contracts. The City will comply with, keep, observe and perform all agreements, conditions, covenants and terms, express or implied, required to be performed by it contained in all contracts for the use of the Water System and all other contracts affecting or involving the Water System to the extent that the City is a party thereto.

Insurance. (a) The City will procure and maintain or cause to be procured and maintained insurance on the Water System with responsible insurers, in such amounts and against such risks (including accident to or destruction of the Water System) as are usually covered in connection with water systems similar to the Water System, or it will self-insure or participate in an insurance pool or pools with reserves adequate, in the reasonable judgment of the City, to protect the Water System against loss. In the event of any damage to or destruction of the Water System caused by the perils covered by such insurance or self insurance, the Net Proceeds thereof shall be applied to the reconstruction, repair or replacement of the damaged or destroyed portion of the Water System. The City shall begin such reconstruction, repair or replacement promptly after such damage or destruction shall occur, and shall continue and properly complete such reconstruction, repair or replacement as expeditiously as possible, and shall pay out of such Net Proceeds all costs and expenses in connection with such reconstruction, repair or replacement so that the same shall be completed and the Water System shall be free and clear of all claims and liens unless the City determines that such property or facility is not necessary to the efficient or proper operation of the Water System and therefore determines not to reconstruct, repair or replace such project or facility. If such Net Proceeds exceed the costs of such reconstruction, repair or replacement, then the excess Net Proceeds shall be deposited in the Water Utility Fund and be available for other proper uses of funds deposited in the Water Utility Fund.

(b) The City will procure and maintain such other insurance which it shall deem advisable or necessary to protect its interests and the interests of the Corporation, which insurance shall afford protection in such amounts and against such risks as are usually covered in connection with water systems similar to the Water System;

provided that any such insurance may be maintained under a self-insurance program so long as such self-insurance is maintained in the amounts and in the manner usually maintained in connection with water systems similar to the Water System.

(c) All policies of insurance required to be maintained in the Installment Purchase Agreement shall, to extent reasonably obtainable, provide that the Corporation and the Trustee shall be given 30 days' written notice of any intended cancellation thereof or reduction of coverage provided thereby. The City shall certify to the Corporation and Trustee annually on or before August 31 that it is in compliance with the insurance requirements under the Installment Purchase Agreement.

Accounting Records; Financial Statements and Other Reports. (a) The City will keep appropriate accounting records in which complete and correct entries shall be made of all transactions relating to the Water System, which records shall be available for inspection by the Corporation and the Trustee at reasonable hours and under reasonable conditions.

- (b) The City will prepare and file with the Corporation and the Trustee annually (commencing with the Fiscal Year ending June 30, 1998), within 270 days of the close of each Fiscal Year, financial statements of the Water Utility Fund for the preceding Fiscal Year prepared in accordance with generally accepted accounting principles, together with an Accountant's Report thereon.
- (c) The City will furnish a copy of the financial statements referred to in subsection (b) above to any Owner of the Certificates requesting a copy thereof.

Payment of Taxes and Compliance with Governmental Regulations. The City will pay and discharge all taxes, assessments and other governmental charges which may be lawfully imposed upon the Water System or any part thereof or upon the System Revenues when the same shall become due, except that the City may contest in good faith any taxes, assessments and other governmental charges so long as the City shall have budgeted for the amount being contested and, if appropriate, such amount shall have been included as a Maintenance and Operation Cost of the Water System. The City will duly observe and conform with all valid regulations and requirements of any governmental authority relative to the operation of the Water System or any part thereof, but the City shall not be required to comply with any regulations or requirements so long as the validity or application thereof shall be contested in good faith.

Collection of Rates and Charges; No Free Service. The City will have in effect at all times rules and regulations for the payment of bills for Water Service. Such regulations may provide that where the City furnishes water to the property receiving Water Service, the Water Service charges shall be collected together with the water rates upon the same bill providing for a due date and a delinquency date for each bill. In each case where such bill remains unpaid in whole or in part after it becomes delinquent, the City may disconnect such premises from the water service, and such premises shall not thereafter be reconnected to the water service except in accordance with City operating rules and regulations governing such situations of delinquency. To the extent permitted by law, the City will not permit any part of the Water System or any facility thereof to be used or taken advantage of free of charge by any authority, firm or person, or by any public agency (including the United States of America, the State of California and any city, county, district, political subdivision, public authority or agency thereof).

Eminent Domain Proceeds. If all or any part of the Water System shall be taken by eminent domain proceedings, then subject to the provisions of any Authorizing Ordinance, the Net Proceeds thereof shall be applied to the replacement of the property or facilities so taken, unless the City determines that such property or facility is not necessary to the efficient or proper operation of the Water System and therefore determines not to replace such property or facilities. Any Net Proceeds of such award not applied to replacement or remaining after such work has been completed shall be deposited in the Water Utility Fund and be available for other proper uses of funds deposited in the Water Utility Fund.

Tax Covenants. There shall be included in each Supplement relating to Tax-Exempt Installment Payment Obligations such covenants as are deemed necessary or appropriate by Bond Counsel for the purpose of assuring that

interest on such Installment Payment Obligations shall be excluded from gross income under Section 103 of the Code.

Subcontracting. Nothing in the Installment Purchase Agreement to the contrary shall prevent the City from delegating the power to be an operator of some or all of the Water System, even though the City continues to retain ownership of the Water System and its operations, and no such subcontracting arrangement shall relieve the City of any of its obligations under the Installment Purchase Agreement. Prior to the effective date of any such delegation, the City shall deliver to the Trustee an opinion of Bond Counsel to the effect that the proposed delegation will not have an adverse effect on the exclusion from gross income for federal income tax purposes of the interest component of Tax-Exempt Installment Payment Obligations.

Prepayment of Installment Payments

Provisions may be made in any Supplement for the prepayment of Installment Payments, in whole or in part, in such multiples and in such order of maturity and from funds of any source, and with such prepayment premiums and other terms as are specified in the Supplement. Said Supplement shall also provide for any notices to be given relating to such prepayment.

Events of Defaults and Remedies of the Corporation

Events of Default and Acceleration of Maturities. If one or more of the following Events of Default shall happen, that is to say:

- (a) if default shall be made in the due and punctual payment of or on account of any Parity Obligation as the same shall become due and payable;
- (b) if default shall be made by the City in the performance of any of the agreements or covenants required in the Installment Purchase Agreement to be performed by it (other than as specified in subsection (a) above), and such default shall have continued for a period of 60 days after the City shall have been given notice in writing of such default by the Corporation or the Trustee;
- (c) if any Event of Default specified in any Supplement, Authorizing Ordinance or Issuing Instrument shall have occurred and be continuing; or
- (d) if the City shall file a petition or answer seeking arrangement or reorganization under the federal bankruptcy laws or any other applicable law of the United States of America or any state therein, or if a court of competent jurisdiction shall approve a petition filed with or without the consent of the City seeking arrangement or reorganization under the federal bankruptcy laws or any other applicable law of the United States of America or any state therein, or if under the provisions of any other law for the relief or aid of debtors any court of competent jurisdiction shall assume custody or control of the City or of the whole or any substantial part of its property;

then and in each and every such case during the continuance of such Event of Default the Corporation shall upon the written request of the Owners of 25% or more of the aggregate principal amount of all Series of Parity Installment Obligations Outstanding, voting collectively as a single class, by notice in writing to the City, declare the entire unpaid principal amount thereof and the accrued interest thereon to be due and payable immediately, and upon any such declaration the same shall become immediately due and payable, anything contained in the Installment Purchase Agreement to the contrary notwithstanding; provided, that with respect to a Series of Parity Installment Obligations which is credit enhanced by Credit Support, acceleration shall not be effective unless the declaration is consented to by the related Credit Provider and, provided further, that nothing in the Installment Purchase Agreement shall affect the rights of the parties to a Qualified Swap Agreement to terminate such Qualified Swap Agreement. The subsection, however, is subject to the condition that if at any time after the entire principal amount of all Series of Parity Installment Obligations and the accrued interest thereon shall have been so declared due and payable and before any judgment or decree for the payment of the moneys due shall have been obtained or entered, the City shall deposit with the Corporation a sum sufficient to pay the unpaid principal amount of all such Series of

Parity Installment Obligations and the unpaid payments of any other Parity Obligations referred to in clause (a) above due prior to such declaration and the accrued interest thereon, with interest on such overdue installments at the rate or rates applicable thereto in accordance with their terms, and the reasonable expenses of the Corporation, and any and all other defaults known to the Corporation (other than in the payment of the entire principal amount of the unpaid Parity Installment Obligations and the accrued interest thereon due and payable solely by reason of such declaration) shall have been made good or cured to the satisfaction of the Corporation or provision deemed by the Corporation to be adequate shall have been made therefor, then and in every such case the Corporation, by written notice to the City, may rescind and annul such declaration and its consequences; but no such rescission and annulment shall extend to or shall affect any subsequent default or shall impair or exhaust any right or power consequent thereon.

The Owners of Subordinated Obligations may enforce the provisions of the Installment Purchase Agreement for their benefit by appropriate legal proceedings. The payment of Subordinated Obligations will be subordinated in right of payment to payments on the Parity Obligations (except for any payment in respect of the Subordinated Obligations from the Reserve Funds or Reserve Accounts securing such Subordinated Obligations). In any Event of Default, Owners of Parity Obligations will be entitled to receive payment thereof in full before the Owners of Subordinated Obligations are entitled to receive payment thereof (except for any payment in respect of the Subordinated Obligations from Reserve Funds or Reserve Accounts securing such Subordinated Obligations) and the Owners of the Subordinated Obligations will become subrogated to the rights of such Owners of Parity Obligations to receive payments with respect thereto.

Application of Net System Revenues Upon Acceleration. All Net System Revenues received after the date of the declaration of acceleration by the Corporation as provided in the Installment Purchase Agreement shall be applied in the following order:

- (a) <u>First</u>, to the payment of the costs and expenses of the Corporation and the Trustee if any, in carrying out the provisions of the provisions of the Installment Purchase Agreement related to default and remedies thereunder, including reasonable compensation to its accountants and counsel;
- (b) Second, to the payment of the entire principal amount of the unpaid Parity Installment Obligations and the unpaid principal amount of all other Parity Obligations and the accrued interest thereon, with interest on the overdue installments at the rate or rates of interest applicable thereto in accordance with their respective terms. In the event there are insufficient Net System Revenues to pay the entire principal amount and accrued interest on all Parity Obligations, then accrued interest (and payments due to the counterparty to a Qualified Swap Agreement) shall first be paid and any remaining amount shall be paid on account of principal, and in the event there are insufficient Net System Revenues to fully pay either interest or principal in accordance with the foregoing, then payment shall be prorated within a priority based upon the total amounts due in the priority; and
- (c) Third, to the payment of the entire principal amount of the unpaid Subordinated Obligations and the accrued interest thereon, with interest on the overdue installments at the rate or rates of interest applicable thereto in accordance with their respective terms. In the event there are insufficient Net System Revenues to pay the entire principal amount and accrued interest on all Subordinated Obligations, then accrued interest shall first be paid and any remaining amount shall be paid on account of principal, and in the event there are insufficient Net System Revenues to fully pay either interest or principal in accordance with the foregoing, then payment shall be prorated within a priority based upon the total amounts due in the priority.

Discharge of Installment Payment Obligations

Discharge of Installment Payment Obligations. If the City shall pay or cause to be paid or there shall otherwise be paid to the Owners all Outstanding Installment Payment Obligations of a Series the interest thereon and the principal thereof and the redemption premiums, if any, thereon or if all such Outstanding Installment Payment Obligations shall be deemed to have been paid at the times and in the manner stipulated in the applicable Issuing Instrument, then, as to any such Series, all agreements, covenants and other obligations of the City under the Installment Purchase Agreement shall thereupon cease, terminate and become void and be discharged and satisfied,

except for the obligation of the City to pay or cause to be paid all sums due under the Installment Purchase Agreement.

Miscellaneous

Liability of City Limited to System Revenues. (a) Notwithstanding anything contained in the Installment Purchase Agreement, the City shall not be required to advance any moneys derived from any source of income other than the Net System Revenues and the other funds provided in the Installment Purchase Agreement for the payment of the Installment Payments or for the performance of any other agreements or covenants required to be performed by it contained in the Installment Purchase Agreement. The City may, however, but in no event shall be obligated to, advance moneys for any such purpose so long as such moneys are derived from a source legally available for such purpose and may be legally used by the City for such purpose.

- (b) The obligation of the City to make the Installment Payments is a special obligation of the City payable solely from such Net System Revenues and other funds provided for in the Installment Purchase Agreement, and does not constitute a debt of the City or of the State of California or of any political subdivision thereof within the meaning of any constitutional or statutory debt limitation or restriction.
- Amendments. (a) The Installment Purchase Agreement may be amended with respect to a Series of Installment Payment Obligations in writing as may be mutually agreed by the City and the Corporation, with the written consent of any Credit Provider for any Installment Payment Obligations and the Owners of a majority in aggregate principal amount of such Series of Installment Payment Obligations then Outstanding, provided that no such amendment shall (1) extend the payment date of any Installment Payment, or reduce the amount of any Installment Payment without the prior written consent of the Owner of each Obligation so affected; or (2) reduce the percentage of Installment Payment Obligations the consent of the Owners of which is required for the execution of any amendment of the Installment Purchase Agreement without the prior written consent of each of the Owners so affected.
- (b) Notwithstanding subsection (a) above, the City agrees that, so long as it shall have any obligations under a Qualified Swap Agreement, it shall not amend or modify, or consent to the amendment or modification of, the Installment Purchase Agreement that would in any way adversely affect (1) the rights of a counterparty to a Qualified Swap Agreement under the Installment Purchase Agreement, or (2) the obligations of the City under the Installment Purchase Agreement to such a counterparty without the prior written consent of such Qualified Swap Provider.
- (c) The Installment Purchase Agreement and the rights and obligations of the City and the Corporation under the Installment Purchase Agreement may also be amended or supplemented at any time by an amendment of the Installment Purchase Agreement or supplement to the Installment Purchase Agreement which shall become binding upon execution by the City and the Corporation, without the written consents of any Owner of Installment Payment Obligations or any Credit Provider, but only to the extent permitted by law and only upon receipt of an unqualified opinion of Bond Counsel selected by the City to the effect that such amendment or supplement is permitted by the provisions of the Installment Purchase Agreement and is not inconsistent with the Installment Purchase Agreement and does not adversely affect the exclusion of the interest portion of the Installment Payments received by the Owners from gross income for federal income tax purposes, and only for any one or more of the following purposes:
 - (1) to add to the covenants and agreements of the Corporation or the City contained in the Installment Purchase Agreement other covenants and agreements thereafter to be observed or to surrender any right or power in reserved in the Installment Purchase Agreement to or conferred upon the Corporation or the City, and which shall not adversely affect the interests of the Owners of the Installment Payment Obligations;
 - (2) to cure, correct or supplement any ambiguous or defective provision contained in the Installment Purchase Agreement or in regard to questions arising under the Installment Purchase

Agreement, as the Corporation or the City may deem necessary or desirable and which shall not adversely affect the interests of the Owners of the Installment Payment Obligations;

- (3) to make such other amendments or modifications which shall not materially adversely affect the interests of the Owners of the Installment Payment Obligations;
 - (4) to provide for the issuance of Parity Installment Payment Obligations; and
- (5) to provide for the issuance of Subordinated Obligations, provided that such amendments or modifications shall not materially adversely affect the interests of the Owners of Parity Obligations.

Net Contract. The Installment Purchase Agreement shall be deemed and construed to be a net contract, and the City shall pay absolutely net during the term of the Installment Payments and all other payments required under the Installment Purchase Agreement, free of any deductions and without abatement, diminution or setoff whatsoever.

2002 SUPPLEMENT TO MASTER INSTALLMENT PURCHASE AGREEMENT

The 2002 Supplement to Master Installment Agreement sets forth certain terms and conditions of the purchase of specified Components of the Project by the City. Certain provisions of the 2002 Supplement are summarized below. The summary does not purport to be complete or definitive and is qualified in its entirety by reference to the full terms of the 2002 Supplement.

Selected Definitions

"Subordinated Bonds Series 2002" means the Series 2002 Bonds.

Additional Covenants

In addition to the covenants specified in the Amended Agreement, the following additional covenants are added with respect to the Subordinated Bonds Series 2002:

Additional Covenant relating to Tax Exemption.

- (a) The City will not directly or indirectly use or permit the use of any proceeds of the Subordinated Bonds Series 2002 or any other funds of the City or of the Project or take or omit to take any action that would cause the Subordinated Bonds Series 2002 to be "private activity bonds" within the meaning of Section 141 of the Code, or obligations which are "federally guaranteed" within the meaning of Section 149(b) of the Code.
- (b) The City covenants that it will not take any action, or fail to take any action, if any such action or failure to take action would adversely affect the exclusion from gross income of the interest represented by the Subordinated Bonds Series 2002 under Section 103 of the Code. The City will not directly or indirectly use or permit the use of any proceeds of the Subordinated Bonds Series 2002 or any other funds of the City, or take or omit to take any action, that would cause the Subordinated Bonds Series 2002 to be "arbitrage bonds" within the meaning of Section 148(a) of the Code. To that end, the City will comply with all requirements of Section 148 of the Code to the extent applicable to the Subordinated Bonds Series 2002. In the event that at any time the City is of the opinion that for purposes of this section it is necessary to restrict or limit the yield on the investment of any moneys held by the Trustee under the Trust Agreement or otherwise, the City shall so instruct the Trustee in writing, and shall cause the Trustee to take such action as may be necessary in accordance with such instructions.
- (c) Without limiting the generality of the foregoing, the City agrees that there shall be paid from time to time all amounts required to be rebated to the United States of America pursuant to Section 148(f) of the Code and any temporary, proposed or final Treasury Regulations as may be applicable to the Subordinated Bonds Series 2002 from time to time. This covenant shall survive payment in full or defeasance of the Subordinated Bonds Series 2002. The City specifically covenants to pay or cause to be paid to the United States of America at the times and in the

amounts determined under this section the Rebate Requirement, as described in the Tax Certificate and to otherwise comply with the provisions of the Tax Certificate executed by the City in connection with the execution and delivery of the Subordinated Bonds Series 2002.

(d) Notwithstanding any provision of this section, if the City shall provide to the Trustee an opinion of nationally recognized Bond Counsel to the effect that any action required under this section is no longer required, or to the effect that some further action is required, to maintain the exclusion from gross income of the interest on the Subordinated Bonds Series 2002 pursuant to Section 103 of the Code, the City may rely conclusively on such opinion in complying with the provisions of the 2002 Supplement, and the covenants under the 2002 Supplement shall be deemed to be modified to that extent.

Additional Covenant relating to Continuing Disclosure. The City covenants and agrees that it will comply with and carry out all of the provisions of the Continuing Disclosure Agreement. Notwithstanding any other provision of the 2002 Supplement, failure of the City to comply with the Continuing Disclosure Agreement shall not be considered a default of any kind under the 2002 Supplement or the Continuing Disclosure Agreement; however, the Trustee may (and, at the request of any Participating Underwriter or the Owners (as defined in the Indenture) of at least twenty-five percent (25%) in aggregate principal amount of Subordinated Bonds Series 2002, shall) or any Owner or Beneficial Owner may take such actions as may be necessary and appropriate, including seeking mandate or specific performance by court order, to cause the City to comply with its obligations under this section. For purposes of this Section, "Beneficial Owner" means any person which has or shares the power, directly or indirectly, to make investment decisions concerning ownership of any Subordinated Bonds Series 2002 (including persons holding Subordinated Bonds Series 2002 through nominees, depositories or other intermediaries).

Additional Covenant Relating to the Issuance of Additional Subordinate Obligations. In addition to satisfying the conditions set forth in the Indenture with respect to the Issuance of Additional Bonds thereunder and the requirements of the Installment Purchase Agreement with respect to Additional Obligations thereunder, the City must obtain or provide a certificate or certificates, prepared by the City or at the City's option by a Consultant, so long as the Subordinate Bonds Series 2002 are Outstanding, prior to the issuance of additional Subordinate Obligations showing that: (i) the Net System Revenues as shown by the books of the City for any 12-consecutivemonth-period within the 18 consecutive months ending immediately prior to the incurring of such additional other Subordinated Obligations shall have amounted to at least 1.00 times the Maximum Annual Debt Service on all Obligations (including Parity Obligations and Subordinate Obligations) to be Outstanding immediately after the issuance of the proposed Subordinated Obligations; or (ii) the estimated Net System Revenues for the five Fiscal Years following the earlier of (a) the end of the period during which interest on those Subordinated Obligations is to be capitalized or, if no interest is to be capitalized, the Fiscal Year in which the Subordinated Obligations are issued, or (b) the date on which substantially all new facilities financed with such Subordinated Obligations are expected to commence operations, will be at least equal to 1.00 times the Maximum Annual Debt Service for all Obligations (including Parity Obligations and Subordinate Obligations) which will be Outstanding immediately after the issuance of the proposed Subordinated Obligations. For purposes of this paragraph, Maximum Annual Debt Service includes debt service on all Obligations (including Parity Obligations and Subordinate Obligations).

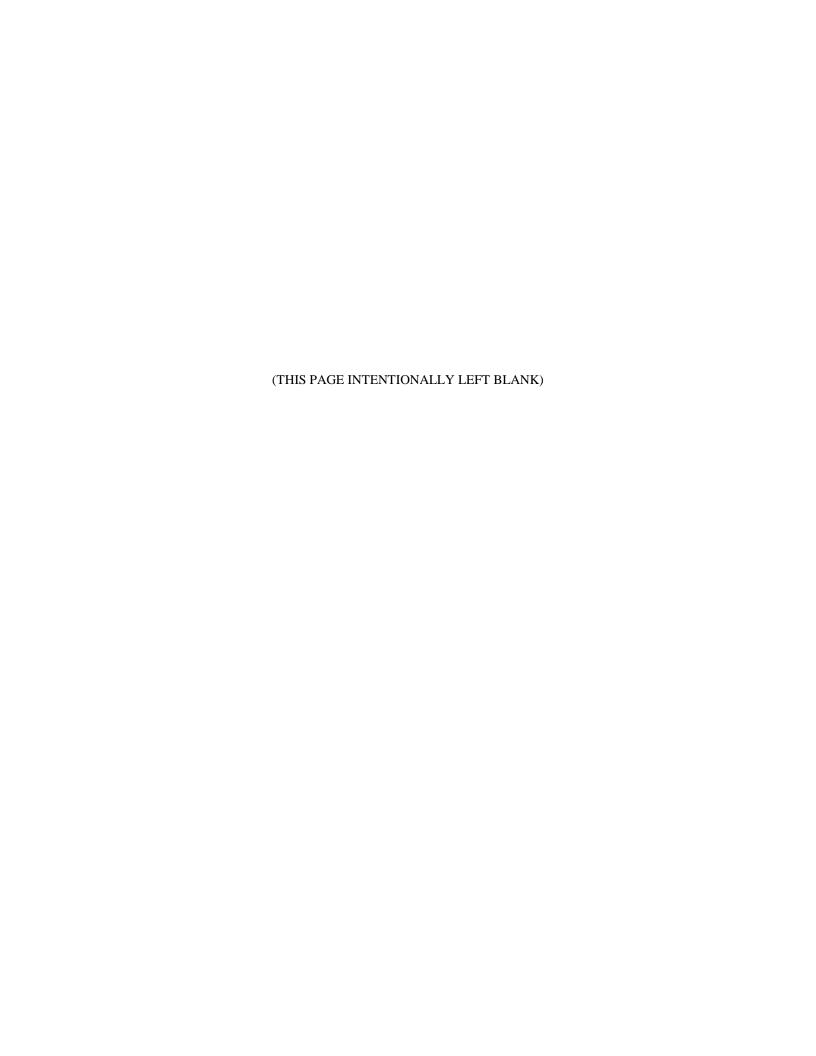
For purposes of the computations to be made as described in clause (ii) of the paragraph above, the determination of Net System Revenues:

- (1) may take into account any increases in rates and charges which relate to the Water System and which have been approved by the City Council, and shall take into account any reduction in such rates and charges which have been approved by the City Council, which will, for purposes of the test described in clause (ii) of the first paragraph of this section, be effective during a Fiscal Year ending within the five-year period for which such estimate is made; and
- may take into account an allowance for any estimated increase in such Net System Revenues from any revenue producing additions or improvements to or extensions of the Water System, to be made with the proceeds of such additional indebtedness or with the proceeds of Obligations previously issued, all in an amount equal to the estimated additional average annual Net System Revenues to be derived from such additions,

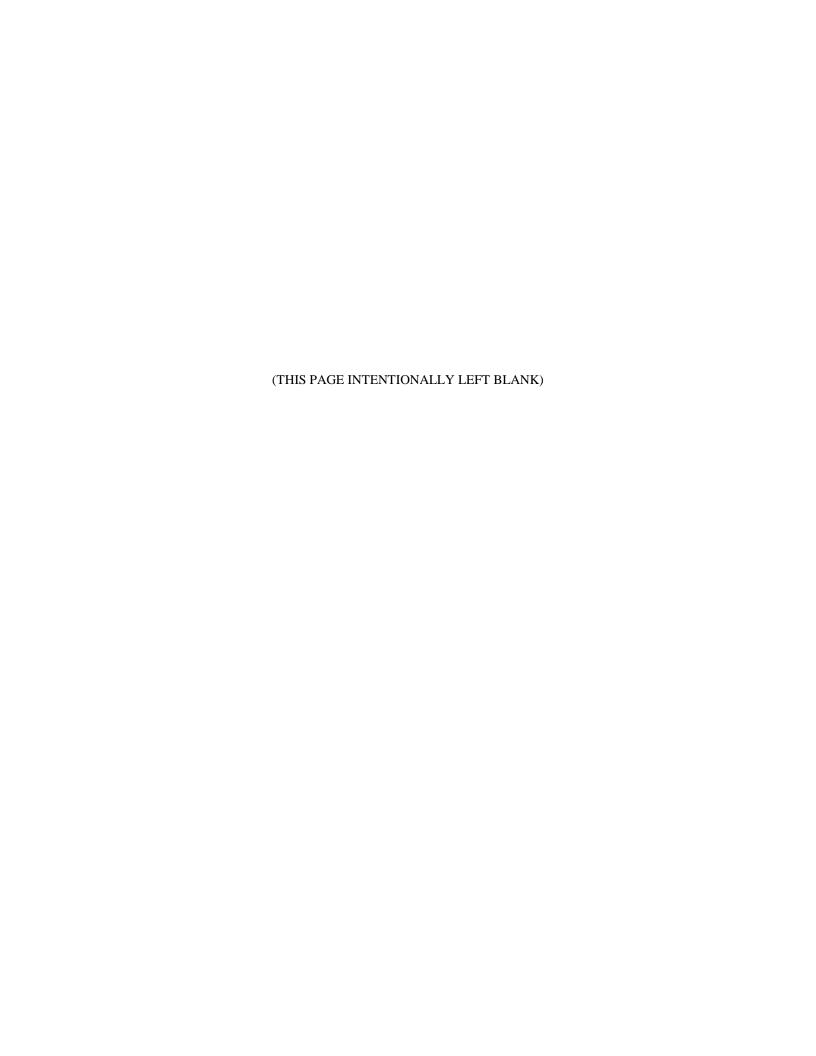
improvements and extensions during the five-year period contemplated by clause (ii) of the first paragraph of this section, all as shown by such certificate of the City or a Consultant, as applicable; and

(3) for the period contemplated by clause (ii) of the first paragraph of this section, Maintenance and Operation Costs of the Water System shall initially be deemed to be equal to such costs for the 12 consecutive months immediately prior to incurring such other Subordinated Obligations for the first year of the five-year period, but adjusted if deemed necessary by the City or a Consultant, as applicable, for any increased Maintenance and Operations Costs of the Water System which are, in the judgment of the City or a Consultant, as applicable, essential to maintaining and operating the Water System and which will occur during any Fiscal Year ending within the period contemplated by clause (ii) of the first paragraph of this section.

The certificate or certificates described above in clause (ii) of the first paragraph of this section shall not be required if the Subordinated Obligations being issued are for the purpose of refunding (i) any then Outstanding Subordinated Obligations if at the time of the issuance of such Subordinated Obligations a certificate of an Authorized City Representative shall be delivered showing that Adjusted Debt Service in each Fiscal Year on all Subordinated Obligations Outstanding after the issuance of the refunding Subordinated Obligations will not exceed Adjusted Debt Service in each corresponding Fiscal Year on all Subordinated Obligations Outstanding prior to the issuance of such Subordinated Obligations; or (B) then Outstanding Balloon Indebtedness, Tender Indebtedness or Variable Rate Indebtedness, but only to the extent that the principal amount of such indebtedness has been put, tendered to or otherwise purchased by a standby purchase or other liquidity facility relating to such indebtedness.



APPENDIX B CERTAIN INFORMATION REGARDING THE CITY OF SAN DIEGO AND AREA



APPENDIX B

THE CITY OF SAN DIEGO

The information and expressions of opinion set forth herein have been obtained from sources believed to be reliable, but such information is not guaranteed as to accuracy or completeness. Statements contained herein which involve estimates, forecasts, or matters of opinion, whether or not expressly so described herein, are intended solely as such and are not to be construed as representations of facts. The information and expressions of opinion herein are subject to change without notice, and neither delivery of this Official Statement nor any sale thereafter of the securities offered hereby shall under any circumstances create any implication that there has been no change in the affairs of the City or in any other information contained herein since the date of the Official Statement.

INTRODUCTION

With a total population of approximately 1.3 million in 2002, and a land area of 330 square miles, the City of San Diego (the "City") is the seventh largest city in the nation and the second largest city in California. The City is the county seat for the County of San Diego (the "County") and is the County's business and financial center.

Based on estimates published by the California Department of Finance in May 2002, the City's population grew by 9.7% between 1993 and 2002, for an average increase of approximately 12,300 annually. A major factor in the City's growth is its quality of life. In addition to having a favorable climate, the City offers a wide range of cultural and recreational services to both residents and visitors. With mild temperatures year round, the City's numerous beaches, parks, tennis courts, and golf courses are in constant use.

Another factor in the City's growth is its diversified economy. Recent historical growth has been concentrated in four major areas: high tech manufacturing and research (including electronics, telecommunications, scientific instruments, drugs, and biomedical equipment); professional services; tourism; and international trade. His torically, the City has also benefited from a stable economic foundation composed of basic manufacturing (ship building, industrial machinery, television & video equipment, and printing & publishing), public and private higher education, health services, military, and local government.

ECONOMIC AND DEMOGRAPHIC INFORMATION

Data contained under this caption is intended to portray economic, demographic, and business trends within the City. While not constituting direct revenue sources as such, these trends help explain changes in revenue sources such as property taxes, sales taxes, and transient occupancy taxes, which could be affected by changes in economic conditions.

Population

As set forth in Table 1 below, between January 1, 1993, and January 1, 2002, the City's population has increased by 111,000 (or by approximately 12,300 new residents annually in the ten year period).

Table 1
POPULATION GROWTH⁽¹⁾
Calendar Years 1993 through 2002

Calendar <u>Year</u> ⁽²⁾	City of San Diego	Annual Growth Rate	County of San Diego	Annual Growth Rate	State of <u>California</u>	Annual Growth Rate
1993	1,144,700	0.9	2,594,100	0.8	31,150,000	1.4
1994	1,144,200	0.0	2,604,400	0.4	31,418,000	0.9
1995	1,145,400	0.1	2,613,100	0.3	31,617,000	0.6
1996	1,146,900	0.1	2,621,100	0.3	31,837,000	0.7
1997	1,159,100	1.1	2,653,400	1.2	32,207,000	1.2
1998	1,176,900	1.5	2,702,800	1.9	32,657,000	1.4
1999	1,200,800	2.0	2,751,000	1.8	33,140,000	1.5
2000	1,221,200	1.7	2,805,900	2.0	33,753,000	1.8
2001	1,240,200	1.6	2,859,900	1.9	34,385,000	1.9
2002	1,255,700	1.2	2,918,300	2.0	35,037,000	1.9

⁽¹⁾ In March 2002, the California Department of Finance published revised population estimates for the years 1991 through 1999 in order to account for the 1990 Census undercount. These revised estimates increased the population estimates for the City, the County, and the State of California in the year 1991 and reduced the annual rates of growth in subsequent years.

Source: State of California, Department of Finance

As indicated in the following table, attendance in kindergarten through grade 12 in the San Diego Unified School District grew moderately over the last five academic years. The San Diego Unified School District's boundaries include 85% of the City of San Diego's land area.

⁽²⁾ As of January 1 of the calendar year.

Table 2 SAN DIEGO UNIFIED SCHOOL DISTRICT ENROLLMENT⁽¹⁾

School Year 1997-1998 through 2001-2002

School Year	<u>Enrollment</u>
1997-1998	137,235
1998-1999	138,974
1999-2000	142,021
2000-2001	143,244
2001-2002	142,430

⁽¹⁾ Enrollment is defined as the total number of students enrolled on a survey date in late September/early October of the school year.

Source: San Diego Unified School District, Pupil Accounting

Employment Summary

As seen in Table 3, the City's unemployment rate for calendar year 2001 averaged 3.3%, up from a rate of 3.1% during calendar year 2000. The City's 2001 unemployment rate was below both the national rate of 4.8% and the State's rate of 5.3%. During 2001, average employment in the City was up by approximately 8,800 from 2000 levels. Through the first eight months of 2002, the City's unemployment rate averaged approximately 4.1%, compared with 3.1% for the same period in 2001. Data for 2001 and 2002 reflect preliminary estimates, which will be revised at a future date.

Table 3
ESTIMATED AVERAGE ANNUAL EMPLOYMENT AND
UNEMPLOYMENT OF CITY OF SAN DIEGO RESIDENT LABOR FORCE
Calendar Years 1997 through 2001

Civilian Labor Force	<u>1997</u>	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>
City of San Diego					
Employed	564,039	584,157	604,733	623,201	632,046
Unemployed	25,357	21,668	19,613	19,613	21,341
Unemployment Rates					
City	4.3%	3.6%	3.1%	3.1%	3.3%
County	4.2	3.5	3.1	3.0	3.2
California	6.3	5.9	5.2	4.9	5.3
United States	4.9	4.5	4.2	4.0	4.8

⁽¹⁾ Preliminary, subject to future revision.

Source: State of California Employment Development Department, Labor Market Information Division; and U.S. Department of Labor, Bureau of Labor Statistics

Table 4 provides the California Employment Development Department's estimates of total annual nonagricultural wage and salary employment by major industry in the County during the period 1997 to 2001. Annual employment information is not regularly compiled by sector for the City alone. As shown, total nonagricultural wage and salary employment in the County increased by 175,700 new jobs during this period. During calendar year 2001 alone, employment in San Diego County increased by 33,400 new jobs.

However, as shown in Table 4, while San Diego County wage and salary employment grew at a rate of 2.8% during 2001, this rate of growth was slower than in prior years. For instance, wage and salary employment grew at a rate of 3.8% and 4.3% in the prior two years.

Table 4 SAN DIEGO COUNTY WAGE AND SALARY EMPLOYMENT Calendar Years 1997 through 2001

INDUSTRY CATEGORY	<u>1997</u>	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>
Mining	400	300	300	400	400
Construction	53,000	61,800	67,000	70,400	73,300
Manufacturing	123,100	127,600	128,100	129,700	129,900
Nondurable Goods	34,000	35,800	36,500	37,800	37,900
Durable Goods	89,100	91,800	91,600	91,900	92,000
Transportation,	41,600	47,000	51,300	50,900	51,100
Communications,					
Utilities ⁽¹⁾					
Trade	244,000	249,400	256,500	267,800	272,800
Wholesale	45,600	48,300	50,300	52,300	53,100
Retail	198,400	201,100	206,100	215,500	219,600
Finance, Insurance, Real	60,900	65,300		69,800	71,200
Estate			68,700		
Services	339,300	359,600	381,700	400,600	416,800
Government	192,000	194,500	199,300	206,800	214,500
Federal	44,600	43,300	42,500	42,600	41,100
State and Local	147,400	151,200	156,800	164,200	173,400
TOTAL	1,054,200	1,105,500	1,152,900	1,196,500	1,229,900
$NONAGRICULTURAL^{(2)}$					

⁽¹⁾ Includes trucking and transit services, telephone and broadcast/cable services, and gas and electric services.

Source: State of California Employment Development Department

Since the industry employment data referenced above is organized by standard industrial classification codes, employment in the various high tech categories, such as Telecommunications, Software and Biotechnology may not fall into a single employment sector alone. For example, some telecommunications firms appear in Manufacturing, while others appear in Services.

Several key industry categories exhibited strong employment growth in 2001. The Services sector (+16,200) alone represented approximately half of total employment growth for the County. Within the Services sector, Business Services and Engineering & Management continued to lead other components, with increases of 3,500 and 4,000 respectively. It should be noted that the Business Services and Engineering & Management components include many of the City's high tech employers. Other key employment growth sectors during 2001 included Construction (+2,900), Wholesale and Retail Trade (+5,000), and Government (+7,700).

The increase in the Government sector, which accounted for 17% of the total nonagricultural wage and salary employment in the County, occurred in State and local government agencies. Almost all of the increase in State and local government agencies is due to gains in public education and the Other Local Government category, which includes Special Districts and Indian Tribal Governments.

Taxable Sales

Taxable transactions at retail and other outlets in the City during calendar year 2000, the most recent year for which data are available from the California State Board of Equalization, totaled approximately \$16.1 billion, up 11.1% from 1999, and up 42.6% from 1996. Table 5 provides annual sales information by type of outlet for the period 1996 through 2000.

⁽²⁾ Figures may not add to total due to independent rounding.

Table 5 CITY OF SAN DIEGO TAXABLE TRANSACTIONS Calendar Years 1996 through 2000 (in thousands)

	<u>1996</u>	<u>1997</u>	<u>1998</u>	<u>1999</u>	$2000^{(1)}$
RETAIL STORES					
Apparel	\$451,984	\$485,551	\$530,734	\$542,041	\$588,012
General Merchandise	1,304,649	1,354,698	1,436,535	1,597,102	1,794,468
Food	521,014	554,625	582,183	622,909	662,346
Eating and Drinking	1,307,079	1,380,894	1,496,032	1,603,968	1,772,507
Home Furnishings	492,104	444,930	469,158	546,746	619,383
and Appliances					
Building Materials	469,293	603,365	716,231	809,022	944,386
and Farm					
Implements					
Auto Dealers &	1,089,331	1,189,462	1,331,411	1,519,137	1,745,186
Supplies					
Service Stations	672,559	673,078	614,156	742,143	977,675
Other	1,555,020	1,686,807	1,790,441	1,948,871	2,173,098
Total Retail Stores	7,863,033	8,373,410	8,966,881	9,931,939	11,277,061
All Other Outlets	3,426,610	4,024,433	4,343,598	4,563,715	4,822,132
TOTAL ALL	\$11,289,643	\$12,397,843	\$13,310,479	\$14,495,654	\$16,099,193
OUTLETS					

⁽¹⁾ Data for calendar year 2000 were calculated by adding quarterly reports published by the California State Board of Equalization, and may be subject to future revision.

Source: California State Board of Equalization

Tourism

According to the San Diego Chamber of Commerce, the visitor industry is the County's third largest industry in terms of income generation, behind manufacturing and the military. As shown in Table 6, visitor spending in the County totaled \$5.12 billion in 2001, up 17.2% from 1997 and down 2.1% from 2000. This decline in 2001 reflects the impact of the events of September 11, 2001; according to the San Diego Convention and Visitors Bureau, through the eight months ended August 31, 2001, visitor spending was up 4.1% over the same period in 2000.

Table 6
SAN DIEGO COUNTY
TOTAL VISITOR SPENDING⁽¹⁾
Calendar Years 1997 through 2001
(in billions)

Calendar Year	<u>Amount</u>
1997	\$4.37
1998	4.70
1999	4.88
2000	5.23
2001	5.12

⁽¹⁾ Visitor spending is an estimate of total direct and indirect visitor expenditures as derived from the Visitor Activity Model/Visitor Profile Study prepared by CIC Research, Inc. for the San Diego Convention and Visitors Bureau.

Source: San Diego Convention and Visitors Bureau

As shown in Table 7, the City's transient occupancy tax ("TOT") revenues have grown approximately 46% between Fiscal Year 1997 and Fiscal Year 2001, an average annual increase of 9.1%. In the Fiscal Year 2002 Adopted Budget, TOT revenues were projected to increase by 6% over TOT receipts for Fiscal Year 2001. The City Manager currently estimates that actual TOT receipts for Fiscal Year 2002 will be 4.9% less than Fiscal Year 2001 receipts due in part to the lingering effects of a weak economy and the events of September 11, 2001.

Table 7 CITY OF SAN DIEGO TRANSIENT OCCUPANCY TAX⁽¹⁾ Fiscal Years 1997 through 2001 (in thousands)

Fiscal Year	<u>Amount</u>
1997	\$ 75,476
1998	85,088
1999	92,128
2000	96,821
2001	109,879

⁽¹⁾ Includes both the General Fund portion of TOT $(5.5\phi \text{ of } 10.5\phi)$ and the balance $(5\phi \text{ of } 10.5\phi)$ allocated to Special Promotional Programs.

Source: City Auditor & Comptroller

The City is the focal point for tourism in the County. The Convention Center, approximately 70% of the County's hotel and motel rooms, and most of the County's major tourist attractions, including the world-renowned San Diego Zoo, the San Diego Wild Animal Park and Sea World, are located in the City. Other attractions located in the City include the Cabrillo National Monument on Point Loma, the historic Gaslamp Quarter in the downtown area, the Old Town State Park, and Balboa Park – home to the San Diego Zoo and a host of other cultural and recreational activities.

In addition to the many permanent attractions available to visitors, the City has also been host to a number of major events. The City annually hosts the Buick Invitational, a Professional Golfers' Association Tour Event played at the Torrey Pines Golf Course. Torrey Pines, which is owned and operated by the City of San Diego, is a world renowned golf course. In addition, since 1978, the City has annually hosted the Holiday Bowl, a post season contest of elite college football teams.

The City also hosted the America's Cup in 1992 and 1995, and the Super Bowl and World Series in 1998. In addition, the City was the site for the Republican National Convention held in August 1996. The Super Bowl is scheduled to return to San Diego in 2003. According to the San Diego Unified Port District, in 2001 there were 7.6 million passenger arrivals, down by approximately 4.2% from 2000.

In September 2001, the San Diego Convention Center expansion was completed, doubling the size of the existing facility to 2.6 million total gross square feet. According to the San Diego Convention Center Corporation, since opening in 1989, the Convention Center has generated \$4.5 billion in economic benefit for the San Diego regional economy through increased visitor spending, additional hotel room nights, and new jobs.

Military

Military and related defense spending is the second most important component of the San Diego economy, with only manufacturing making a larger contribution to San Diego County's Gross Regional Product. Prior to 1990, San Diego's civilian defense contractors were primarily concentrated in aerospace manufacturing. During the 1990's, the focus of local defense contracting shifted from aerospace manufacturing to research and development, with shipbuilding and repair remaining an important component. This transformation received additional impetus with the relocation to San Diego from

Virginia of the Space and Naval Warfare Systems Command (SPAWAR) in 1997. SPAWAR is responsible for administering contracts to meet the Navy's continuing need for state-of-the-art command and communications systems.

According to the San Diego Chamber of Commerce, defense related expenditures (active duty payroll, retirement benefits and civilian contract awards) in the County during the federal fiscal year ended September 30, 2000, totaled \$9.8 billion, up from \$9.5 billion in 1999. With a total military and civilian payroll of \$3.72 billion in the federal fiscal year 2000, San Diego continued to lead all counties in the nation in terms of combined military and civilian payrolls. Total civilian defense contracts awarded to County-based businesses totaled \$2.9 billion during the federal fiscal year 2000, up 17.4% from the previous year. The Department of Defense also spent \$1.3 billion on base operation expenses, \$1.04 billion on retirement benefits, and another \$0.85 billion on various classified contracts, subcontracts, and other contracts of less than \$1,000 each. The San Diego Chamber of Commerce estimates that as of June 1, 2000, total active duty military personnel in the County totaled 103,127 and the total civilian employment was 21,200.

International Trade

The table below is from the International Trade Administration's *Exporter Location Series*. This information is compiled on a f.a.s (free alongside ship) basis and includes domestic exports and re-exports. The total value of exports from the County during 1999, the most recent year for which data are available, totaled approximately \$9.0 billion, up 4.7% from 1998.

Table 8
VALUATION OF EXPORTS
ORIGINATING IN SAN DIEGO COUNTY
Calendar Years 1995 through 1999
(in billions)

Calendar Year	<u>Total Exports</u>
1995	\$5.9
1996	6.7
1997	7.8
1998	8.6
1999	9.0

Source: International Trade Administration

Major Employers

The City is host to a diverse mix of major employers representing industries ranging from education and health services, to diversified manufacturing, financial services, retail trade and amusement and recreation. Table 9 lists the City's major employers. The list is compiled from information gathered by the City of San Diego. All of the businesses listed in the table have their main offices in the City, with many having branch offices and/or production facilities in other areas of the County. Accordingly, not all employees of these businesses work within the City.

Table 9 CITY OF SAN DIEGO MAJOR EMPLOYERS⁽¹⁾ As of January 1, 2002

Employer Product/Service

10,000 or More Employees:

San Diego Unified School District Education

Sharp Health Care Health Care
University of California, San Diego Higher Education

5,000 - 9,999 Employees:

Kaiser Permanente Health Care

Qualcomm Wireless Communications

San Diego Community College District Higher Education Scripps Health Health Care

San Diego Gas & Electric/Sempra Energy Utility

Sharp Health Care Health Care

3,000 - 4,999 Employees:

ADDECO Employment Services Employment Services
Children's Hospital and Health Care Health Care

Cubic Corporation Electronic Systems

Pacific Bell Utility

Palomar Pomerado Health System Health Care

Samsung Electronics
San Diego State University Higher Education

Science Applications International Corporation Research and Development

Seaworld of California Entertainment

Solar Turbines Gas Turbine Manufacturing

Sony Technology Center Electronics

UCSD Health Care Health Care
United Parcel Service
University of San Diego Higher Education

2,000 - 2,999 Employees:

Jack in the Box Inc.RestaurantsHewlett Packard CompanyElectronic Instruments

Manpower Temporary Services

National Steel & Shipbuilding Company

Nordstrom

Scripps Research Institute

Employment Services

Shipbuilding, Repair

Department Store

Biomedical Research

YMCA of San Diego County

Family Recreation

Zoological Society of San Diego Entertainment

Source: City of San Diego

⁽¹⁾ Does not include various major public employers, including the City, the County, and the federal government with a combined total county employment of 116,100 as of January 1, 2002.

Effective Buying Income

Table 10 shows the per capita Effective Buying Income (EBI) for the City, the County, the State, and the United States for calendar years 1997 through 2001.

Table 10
PER CAPITA EFFECTIVE BUYING INCOME⁽¹⁾
Calendar Years 1996 through 2000

Calendar <u>Year</u>	City of San Diego	County of San Diego	State of California	United <u>States</u>
1997	15,804	15,618	15,797	16,281
1998	16,291	16,101	16,299	16,895
1999	17,443	17,270	17,245	17,691
2000	19,238	19,498	19,081	18,426
2001	19,723	19,092	18,652	18,491

Effective Buying Income is defined as the aggregate of wages, salaries, interest earnings, and all forms of public assistance income (such as Social Security and unemployment compensation) less personal tax payments, contributions to Social Security, and the value of income "in kind" from food stamps, public housing subsidies, medical care etc. Effective Buying Income is a proxy for "disposable" or "after-tax" income.

Source: Sales & Marketing Management Magazine "Survey of Buying Power"

Building Permits

Table 11 provides a summary of the building permit valuations, and the number of new dwelling units authorized in the City, for Fiscal Years 1998 through 2002. The valuation of non-residential permits includes both private, commercial construction and publicly funded, non-tax generating projects.

Table 11
CITY OF SAN DIEGO
BUILDING PERMIT VALUATIONS
AND NUMBER OF DWELLING UNITS
Fiscal Years Ended June 30, 1998 through 2002

	<u>1998</u>	<u>1999</u>	<u>2000</u>	<u>2001</u>	2002
Valuation (in thousands)					
Residential	\$890,476	\$857,747	\$1,185,999	\$1,181,385	\$1,244,917
Nonresidential	<u>576,170</u>	783,106	<u>960,479</u>	693,687	<u>854,831</u>
Total	<u>\$1,466,646</u>	\$1,640,853	<u>\$2,146,478</u>	<u>\$1,875,072</u>	<u>\$2,099,748</u>
Number of New Dwelling Units:					
Single Family	3,032	2,612	2,084	2,075	2,347
Multiple Family	<u>3,018</u>	<u>2,856</u>	<u>5,662</u>	<u>3,829</u>	<u>4,000</u>
Total	<u>6,050</u>	<u>5,468</u>	<u>7,746</u>	<u>5,904</u>	<u>6,347</u>

Source: City of San Diego, Planning and Development Review Department

Business Development Program

The City actively supports economic development and job creation activities. A key element of these activities is the Business Expansion and Retention Program (BEAR Program), a proactive effort on the part of the City to work directly with businesses to retain local firms and help them expand their investment and job growth. This program was created in 1995 by integrating the City's existing business development activities to provide centralized coordination and data management, and to expand operational relationships with partnership agencies such as the Economic Development Corporation and Sempra Energy. BEAR Program components include Business Incentives, Targeted Assistance, sales and use tax rebates through the Business Cooperation Program, Business Outreach, and Business Finance.

A further element of the City's overall business development effort has focused on streamlining the permitting process and, when feasible, eliminating or reducing fees and permits. A major component of this streamlining effort has been the creation of a "one-stop" permitting center which has in most cases reduced development permit processing time by one-half. The center eliminates the need for permit applicants to seek approval from several City departments by consolidating the review and permit process.

The City also operates the Office of Small Business, which provides a broad range of assistance programs for the many small businesses in the City. In 1995, the City Council reduced the annual Business License Tax for all businesses with 12 or fewer employees to a flat fee of \$34 per business with no per employee charge. The City charges an annual fee of \$125 plus \$5 per employee for businesses with 13 or more employees.

Transportation

San Diego has a well-developed highway system. Access in and out of the region is provided by five major freeways running north and south and three freeways running east and west.

Public transportation through the City and surrounding communities is provided by the San Diego Metropolitan Transit Development Board ("MTDB"). The San Diego Trolley, Inc. operates a fleet of electric trolleys that provides transportation for commuters and tourists from downtown San Diego to San Ysidro (adjacent to Tijuana), and from downtown San Diego to the southern part of the County and East County. The East Line extension to Santee was completed in 1996. This 3.6-mile extension connects the cities of El Cajon and Santee. The trolley also provides service from downtown San Diego to the waterfront area, including the Convention Center. An extension providing additional service from downtown to the historical Old Town section of the City was completed in 1996. In addition, the Mission Valley extension, which connects Old Town with Qualcomm Stadium and the Mission Valley shopping area, ending at the Mission San Diego, opened in 1997.

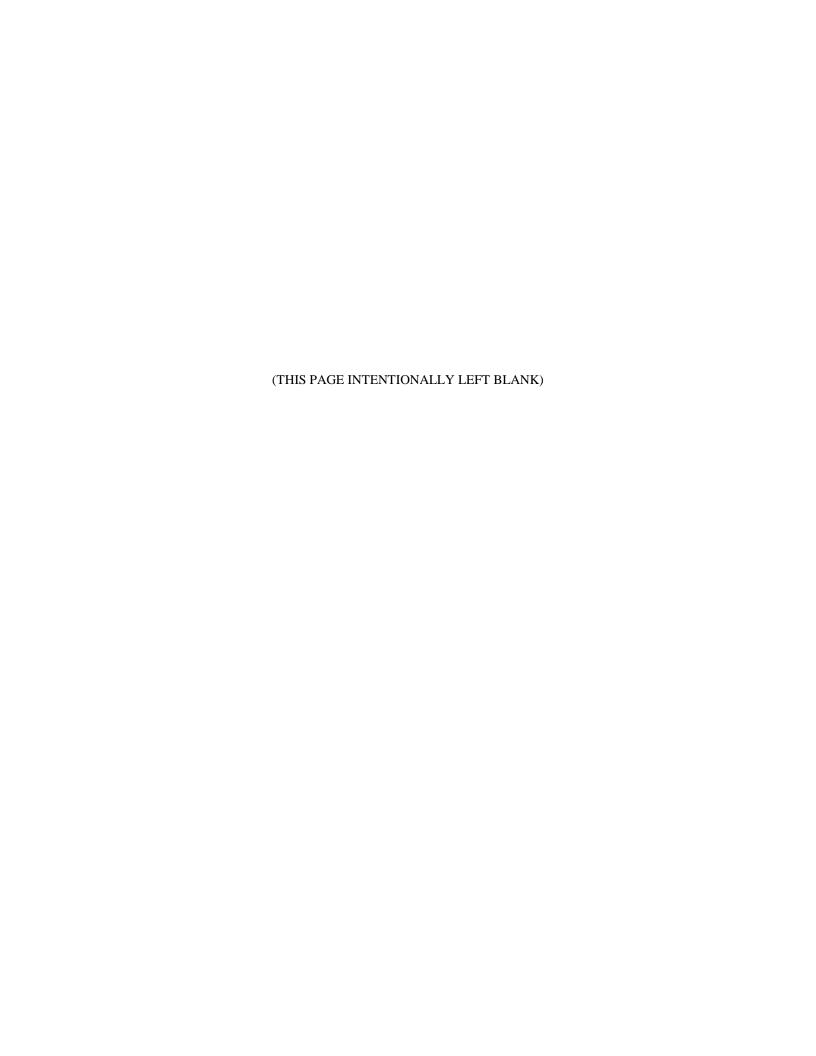
Construction has begun on the 6-mile Mission Valley East Trolley Extension. The project, scheduled for completion in 2004, will extend east from Qualcomm Stadium connecting Mission Valley with San Diego State University, La Mesa, and East County. The extension will include four new trolley stops, including a subterranean station at San Diego State University. The project is estimated to cost approximately \$435 million, including \$330 million in appropriations from the federal government.

A 43-mile Coaster Commuter rail line from Oceanside to downtown San Diego came into service in 1995. This line links communities along the coast from Oceanside to Del Mar with downtown San Diego and is operated by North County Transit District.

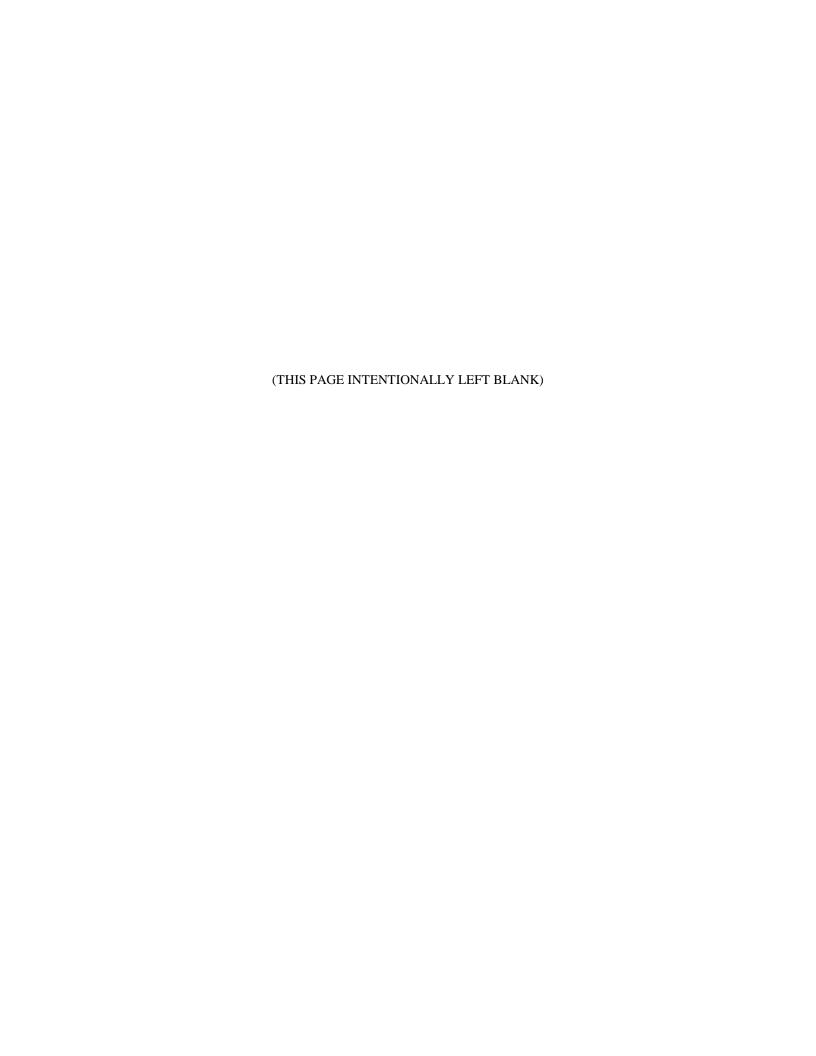
Recently, MTDB granted the rights to operate an east-west rail line to the Carrizo Gorge Railway. It is anticipated that the line, which will connect San Diego and northern Baja California with the rest of Mexico and the United States, will open and begin shipping freight in calendar year 2003. This additional rail line will complement already existing rail service coming into San Diego County from the north and reduce shipping rates and times for companies moving products between San Diego, Mexico, and the Southwest.

Proposition A, voter approved in November 1987, authorized a one-half cent increase to the local sales tax to fund transportation improvements for the San Diego region. The City's proposed budget for Fiscal Year 2003 includes \$28.1 million in Proposition A funds. The one-half cent increase to the local sales tax, authorized by Proposition A, is scheduled to expire in 2008.

State Propositions 108/111/116, voter approved in June 1990, increased the State gas tax and authorized the sale of rail bonds. The revenues generated from these measures are to be used to implement a comprehensive Statewide transportation funding program. The proposed budget for Fiscal Year 2003 projects that the City will receive \$22.9 million in Proposition 111 funds. Revenues from this source supplement the City's street maintenance and resurfacing program and other street related services, including traffic light and signal maintenance, median maintenance and traffic engineering to ensure efficient traffic flow.



APPENDIX C FORM OF CONTINUING DISCLOSURE AGREEMENT



APPENDIX C

FORM OF CONTINUING DISCLOSURE AGREEMENT

Relating to

\$286,945,000

PUBLIC FACILITIES FINANCING AUTHORITY OF THE CITY OF SAN DIEGO SUBORDINATED WATER REVENUE BONDS, SERIES 2002

(Payable Solely from Subordinated Installment Payments Secured By Net System Revenues of the Water Utility Fund)

This Continuing Disclosure Agreement (this "Disclosure Agreement") is executed and delivered by the City of San Diego (the "City") and the Wells Fargo Bank, National Association (the "Dissemination Agent") in connection with the execution and delivery of \$286,945,000 Public Facilities Financing Authority of the City of San Diego Subordinated Water Revenue Bonds, Series 2002 (Payable Solely from Subordinated Installment Payments Secured By Net System Revenues of the Water Utility Fund) (the "Bonds"). The Bonds are being issued pursuant to an Indenture, dated as of October 1, 2002 (the "Indenture"), between the Public Facilities Financing Authority of the City of San Diego (the "Authority") and Wells Fargo Bank, National Association, as trustee (the "Trustee"). Principal of and interest on the Bonds will be paid from the 2002 Subordinated Installment Payments made by the City pursuant to a Master Installment Purchase Agreement, dated as of August 1, 1998 (the "Master Installment Purchase Agreement"), between the San Diego Facilities and Equipment Leasing Corporation (the "Corporation") and the City, as amended by the 2002 Supplement (the "2002 Supplement"), dated as of October 1, 2002, and the First Amendatory Supplement, dated as of September 19, 2002, each between the City and the Corporation (collectively, the "Installment Purchase Agreement") and assigned by the Corporation to the Authority pursuant to an Assignment Agreement, dated as of October 1, 2002, between the Corporation and the Authority. Pursuant to Section 5.02 of the 2002 Supplement and Section 7.09 of the Indenture, the City and the Dissemination Agent covenant and agree as follows:

SECTION 1. <u>Purpose of the Disclosure Agreement</u>. This Disclosure Agreement is being executed and delivered by the City and the Dissemination Agent for the benefit of the Owners and Beneficial Owners of the Bonds and in order to assist the Participating Underwriters in complying with the Rule (defined below). The City and the Dissemination Agent acknowledge that the Authority has undertaken no responsibility with respect to any reports, notices or disclosures provided or required under this Disclosure Agreement, and has no liability to any person, including any Owner or Beneficial Owner of the Bonds, with respect to the Rule.

SECTION 2. <u>Definitions</u>. In addition to the definitions set forth in the Indenture, which apply to any capitalized term used in this Disclosure Agreement unless otherwise defined in this Section, the following capitalized terms shall have the following meanings:

"Annual Report" shall mean any Annual Report provided by the City pursuant to, and as described in, Sections 3 and 4 of this Disclosure Agreement.

"Beneficial Owner" shall mean any person which has or shares the power, directly or indirectly, to make investment decisions concerning ownership of any Bonds (including persons holding Bonds through nominees, depositories or other intermediaries).

"Disclosure Representative" shall mean the Deputy City Manager of the City or his or her designee, or such other person as the City shall designate in writing to the Dissemination Agent and the Trustee from time to time.

"Dissemination Agent" shall mean Wells Fargo Bank, National Association, or any successor Dissemination Agent designated in writing by the City which has filed with the Trustee a written acceptance of such designation.

"Listed Events" shall mean any of the events listed in Section 5(a) of this Disclosure Agreement.

"National Repository" shall mean any Nationally Recognized Municipal Securities Information Repository for purposes of the Rule.

"Participating Underwriter" shall mean any of the original underwriters of the Bonds required to comply with the Rule in connection with offering of the Bonds.

"Repository" shall mean each National Repository and the State Repository, if any.

"Rule" shall mean Rule 15c2-12(b)(5) adopted by the Securities and Exchange Commission under the Securities Exchange Act of 1934, as the same may be amended from time to time.

"State" shall mean the State of California.

"State Repository" shall mean any public or private repository or entity designated by the State as the state repository for the purpose of the Rule and recognized as such by the Securities and Exchange Commission. As of the date of this Disclosure Agreement, there is no State Repository.

SECTION 3. Provision of Annual Reports.

- (a) The City shall, or shall cause the Dissemination Agent to, not later than 270 days after the end of the City's fiscal year (which fiscal year presently ends June 30), commencing with the report for the fiscal year ended June 30, 2002, provide to each Repository and the Dissemination Agent an Annual Report which is consistent with the requirements of Section 4 of this Disclosure Agreement. The Dissemination Agent shall have no duty or obligation to review such Annual Report. The Annual Report may be submitted as a single document or as separate documents comprising a package, and may cross-reference other information as provided in Section 4 of this Disclosure Agreement; provided that the audited financial statements of the City may be submitted separately from the balance of the Annual Report and later than the date required above for the filing of the Annual Report if they are not available by that date. If the City's fiscal year changes, it shall give notice of such change in the same manner as for a Listed Event under Section 5(f).
- (b) Not later than fifteen (15) Business Days prior to the date specified in subsection (a) for providing the Annual Report to the Repositories, the City shall provide the Annual Report to the Dissemination Agent. If by such date the Dissemination Agent has not received a copy of the Annual Report, the Dissemination Agent shall contact the City to inquire if the City is in compliance with the first sentence of this subsection (b).
- (c) If the Dissemination Agent is unable to verify that an Annual Report has been provided to the Repositories by the date required in subsection (a), the Dissemination Agent shall send a notice to each Repository and the Municipal Securities Rulemaking Board in substantially the form attached as Exhibit A.

(d) The Dissemination Agent shall:

- (i) determine each year prior to the date established herein for providing the Annual Report the name and address of each National Repository and the State Repository, if any; and
- (ii) file a report with the City, the Authority and the Trustee certifying that the Annual Report has been provided pursuant to this Disclosure Agreement, stating the date it was provided, and listing all the Repositories to which it was provided.

SECTION 4. <u>Content of Annual Reports</u>. The City's Annual Report shall contain or include by reference the following:

- (a) The audited financial statements of the City of San Diego Water Department for the prior fiscal year, prepared in accordance with generally accepted accounting principles as promulgated from time to time by the Financial Accounting Standards Board or as otherwise required by applicable State law. If the City of San Diego Water Department audited financial statements are not available by the time the Annual Report is required to be filed pursuant to Section 3(a), the Annual Report shall contain unaudited financial statements in a format similar to the financial statements contained in the final Official Statement, following which the audited financial statements shall be filed in the same manner as the Annual Report when they become available.
- (b) An update of the information contained in Table 2 (entitled "Historical Number of Retail Connections To Water System") of the Official Statement, dated October 8, 2002 (the "Official Statement"), relating to the Bonds, for the five most recently completed fiscal years.
- (c) An update of the information contained in Table 4 (entitled "Water System Capital Improvement Program Estimated Expenditures") of the Official Statement for the 2003-2007 fiscal year period, as of the end of the most recently completed fiscal year.
- (d) An update of the information contained in Table 5 (entitled "Historical Sources of Water Service Revenues") of the Official Statement for the five most recently completed fiscal years.
- (e) An update of the information contained in Table 6 (entitled "Five-Year Water Service Charge History For Single Family Residential Units and Other Domestic, Commercial & Industrial") of the Official Statement for the five most recently completed fiscal years.
- (f) An update of the information contained in Table 7 (entitled "Water Customer Accounts Receivable And Shut-Offs By Fiscal Year") of the Official Statement for the five most recently completed fiscal years.
- (g) An update of the information contained in Table 8 (entitled "Water Utility Fund Historical Capacity Charge Revenues") of the Official Statement for the five most recently completed fiscal years.
- (h) An update of the information contained in Table 9 (entitled "Recent Rate History For Water Capacity Charges") of the Official Statement for the five most recently completed fiscal years.
- (i) Information contained in Table 10 (entitled "Water System Statement of Income") of the Official Statement will be available either in the City of San Diego Water Department audited financial statements, or will be updated in the Annual Report in tabular form similar to Table 10.
- (j) Information contained in Table 11 (entitled "Calculation Of Debt Service Coverage") of the Official Statement will be available either in the City of San Diego Water Department audited financial statements, or will be updated in the Annual Report in tabular form similar to Table 11.
- (k) Information contained in Table 12 (entitled "Financial Projections") of the Official Statement will be available either in the City of San Diego Water Department audited financial statements, or will be updated in the Annual Report in tabular form similar to Table 12 (except that such updated financial information shall state actual operating revenues and expenses on a cash basis (rather than projections)).
- (l) An update of the information contained in the Official Statement under the heading "PENSION PLAN" for the most recently completed fiscal year.
- (m) An update of the information contained in the Official Statement under the heading "LABOR RELATIONS" for the most recently completed fiscal year.

(n) An update of the information contained in the Official Statement under the heading "INVESTMENT OF FUNDS – Pool Liquidity and Other Characteristics," "– Derivatives" and "– Reverse Repurchase Agreements" and contained in Table 14 (entitled "City of San Diego Pooled Investment Fund") of the Official Statement as of the most recently completed fiscal year.

SECTION 5. Reporting of Significant Events.

- (a) The City shall give, or cause to be given, notice of the occurrence of any of the following events with respect to the Bonds, if material:
 - (i) principal and interest payment delinquencies;
 - (ii) non-payment related defaults;
 - (iii) modifications to rights of owners of the Bonds;
 - (iv) optional, contingent or unscheduled Bond calls;
 - (v) defeasances;
 - (vi) rating changes;
 - (vii) adverse tax opinions or events affecting the tax-exempt status of the Bonds;
 - (viii) unscheduled draws on debt service reserves reflecting financial difficulties.
 - (ix) unscheduled draws on credit enhancements reflecting financial difficulties;
 - (x) substitution of credit or liquidity providers, or their failure to perform;
 - (xi) release, substitution or sale of property securing repayment of the Bonds.
- (b) The Dissemination Agent shall, as soon as reasonably practicable after obtaining actual knowledge of the occurrence of any of the Listed Events contact the Disclosure Representative, inform such person of the event, and request that the City promptly notify the Dissemination Agent in writing whether or not to report the event pursuant to subsection (f) and promptly direct the Dissemination Agent whether or not to report such event to the owners of the Bonds. In the absence of such direction, the Dissemination Agent shall not report such event unless otherwise required to be reported by the Dissemination Agent in its capacity as Trustee under the Indenture. The Dissemination Agent may conclusively rely upon such direction (or lack thereof). For purposes of this Disclosure Agreement, "actual knowledge" of the occurrence of such Listed Events shall mean actual knowledge by the Dissemination Agent, if other than the Trustee, and if the Dissemination Agent is the Trustee, then by the officer at the corporate trust office of the Trustee with regular responsibility for the administration of matters related to the Indenture. The Dissemination Agent shall have no responsibility to determine the materiality of any of the Listed Events.
- (c) Whenever the City obtains knowledge of the occurrence of a Listed Event, whether because of a notice from the Dissemination Agent pursuant to subsection (b) or otherwise, the City shall as soon as possible determine if such event would be material under applicable federal securities laws.
- (d) If the City has determined that knowledge of the occurrence of a Listed Event would be material under applicable federal securities laws, the City shall promptly notify the Dissemination Agent in writing. Such notice shall instruct the Dissemination Agent to report the occurrence pursuant to subsection (f).

- (e) If in response to a request under subsection (b), the City determines that the Listed Event would not be material under applicable federal securities laws, the City shall so notify the Dissemination Agent in writing and instruct the Dissemination Agent not to report the occurrence pursuant to subsection (f).
- (f) If the Dissemination Agent has been instructed by the City to report the occurrence of a Listed Event, the Dissemination Agent shall file a notice of such occurrence with the Municipal Securities Rulemaking Board and the Repositories with a copy to the City. Notwithstanding the foregoing, notice of Listed Events described in subsections (a)(iv) and (v) need not be given under this subsection any earlier than the notice (if any) of the underlying event is given to the Owners of affected Bonds pursuant to the Indenture.
- SECTION 6. <u>Termination of Reporting Obligation</u>. The City's obligations under this Disclosure Agreement shall terminate upon the legal defeasance, prior redemption or payment in full of all of the Bonds. If the City's obligations under the Installment Purchase Agreement are assumed in full by some other entity, such person shall be responsible for compliance with this Disclosure Agreement in the same manner as if it were the City and the City shall have no further responsibility hereunder. If such termination occurs prior to the final maturity of the Bonds, the City shall give notice of such termination in the same manner as for a Listed Event under Section 5(f).
- SECTION 7. <u>Dissemination Agent</u>. The City may, from time to time, appoint or engage a Dissemination Agent to assist it in carrying out its obligations under this Disclosure Agreement, and may discharge any such Agent, with or without appointing a successor Dissemination Agent. The initial Dissemination Agent shall be Wells Fargo Bank, National Association The Dissemination Agent shall not be responsible in any manner for the content of any notice or report prepared by the City pursuant to this Disclosure Agreement.
- SECTION 8. <u>Amendment; Waiver</u>. Notwithstanding any other provision of this Disclosure Agreement, the City and the Dissemination Agent may amend this Disclosure Agreement (and the Dissemination Agent shall agree to any amendment so requested by the City, provided, the Dissemination Agent shall not be obligated to enter into any such amendment that modifies or increases its duties or obligations hereunder) and any provision of this Disclosure Agreement may be waived, provided that the following conditions are satisfied:
 - (a) If the amendment or waiver relates to the provisions of Sections 3(a), 4, or 5(a), it may only be made in connection with a change in circumstances that arises from a change in legal requirements, change in law, or change in the identity, nature or status of an obligated person with respect to the Bonds, or the type of business conducted;
 - (b) The undertaking, as amended or taking into account such waiver, would, in the opinion of nationally recognized bond counsel, have complied with the requirements of the Rule at the time of the original issuance of the Bonds, after taking into account any amendments or interpretations of the Rule, as well as any change in circumstances; and
 - (c) The amendment or waiver either (i) is approved by the Owners of the Bonds in the same manner as provided in the Indenture for amendments to the Indenture with the consent of Owners, or (ii) does not, in the opinion of the Dissemination Agent or nationally recognized bond counsel, materially impair the interests of the Owners or Beneficial Owners of the Bonds.

In the event of any amendment or waiver of a provision of this Disclosure Agreement, the City shall describe such amendment in the next Annual Report, and shall include, as applicable, a narrative explanation of the reason for the amendment or waiver and its impact on the type (or, in the case of a change of accounting principles, on the presentation) of financial information or operating data being presented by the City. In addition, if the amendment relates to the accounting principles to be followed in preparing financial statements, (i) notice of such change shall be given in the same manner as for a Listed Event under Section 5(f), and (ii) the Annual Report for the year in which the change is made should present a comparison (in narrative form and also, if feasible, in quantitative form) between the financial statements as prepared on the basis of the new accounting principles and those prepared on the basis of the former accounting principles.

SECTION 9. <u>Additional Information</u>. Nothing in this Disclosure Agreement shall be deemed to prevent the City from disseminating any other information, using the means of dissemination set forth in this Disclosure Agreement or any other means of communication, or including any other information in any Annual Report or notice of occurrence of a Listed Event, in addition to that which is required by this Disclosure Agreement. If the City chooses to include any information in any Annual Report or notice of occurrence of a Listed Event, in addition to that which is specifically required by this Disclosure Agreement, the City shall have no obligation under this Disclosure Agreement to update such information or include it in any future Annual Report or notice of occurrence of a Listed Event.

SECTION 10. <u>Default</u>. In the event of a failure of the City or the Dissemination Agent to comply with any provision of this Disclosure Agreement, pursuant to Section 7.09 of the Indenture, the Trustee may (and, at the request of any Participating Underwriter or the Owners of at least 25% in aggregate principal amount of Outstanding Bonds, shall), or any Owner or Beneficial Owner of the Bonds may take such actions as may be necessary and appropriate, including seeking mandate or specific performance by court order, to cause the City or the Dissemination Agent, as the case may be, to comply with its obligations under this Disclosure Agreement. A default under this Disclosure Agreement shall not be deemed an Event of Default under the Indenture or the Installment Purchase Agreement, and the sole remedy under this Disclosure Agreement in the event of any failure of the City or the Dissemination Agent to comply with this Disclosure Agreement shall be an action to compel performance.

SECTION 11. <u>Duties, Immunities and Liabilities of Dissemination Agent.</u> The Dissemination Agent shall have only such duties as are specifically set forth in this Disclosure Agreement, and the City agrees to indemnify and save the Dissemination Agent, its officers, directors, employees and agents, harmless against any loss, expense and liabilities which it may incur arising out of or in the exercise or performance of its powers and duties hereunder, including the costs and expenses (including attorneys fees) of defending against any claim of liability, but excluding liabilities due to the Dissemination Agent's negligence or willful misconduct. The Dissemination Agent shall have no duty or obligation to review any information provided to it hereunder and shall not be deemed to be acting in any fiduciary capacity for the City, the Corporation, the Owners of the Bonds or any other party. The Dissemination Agent shall not have any liability to the Owners of the Bonds or any other party for any monetary damages or financial liability of any kind whatsoever related to or arising from this Disclosure Agreement. The obligations of the City under this Section shall survive resignation or removal of the Dissemination Agent and payment of the Bonds.

SECTION 12. <u>Notices</u>. Any notices or communications to or among any of the parties related to this Disclosure Agreement may be given as follows:

To the City: City of San Diego

Financial and Management Department

202 C Street, M.S. 9-B

San Diego, California 92101-3868

Attention: Deputy City Manager, Financial and Management Services

Telephone: (619) 236-6070 Fax: (619) 236-7344

To the Dissemination Agent: Wells Fargo Bank, National Association

707 Wilshire Blvd., 17th Floor Los Angeles, California 90017

Attention: Corporate Trust Department

Telephone: (213) 614-3353 Fax: (213) 614-3355

Any person may, by written notice to the other persons listed above, designate a different address or telephone number(s) to which subsequent notices or communications should be sent.

SECTION 13. <u>Beneficiaries</u>. This Disclosure Agreement shall inure solely to the benefit of the City, the Authority, the Dissemination Agent, the Participating Underwriters and Owners and Beneficial Owners from time to time of the Bonds, and shall create no rights in any other person or entity.

SECTION 14. <u>Counterparts</u>. This Disclosure Agreement may be executed in several counterparts, each of which shall be an original and all of which shall constitute but one and the same instrument.

By:_

Dated: October 1, 2002

CITY OF SAN DIEGO

By
Title: Deputy City Manager
WELLS FARGO BANK, NATIONAL
ASSOCIATION
as Trustee,
ASSOCIATION

Authorized Officer

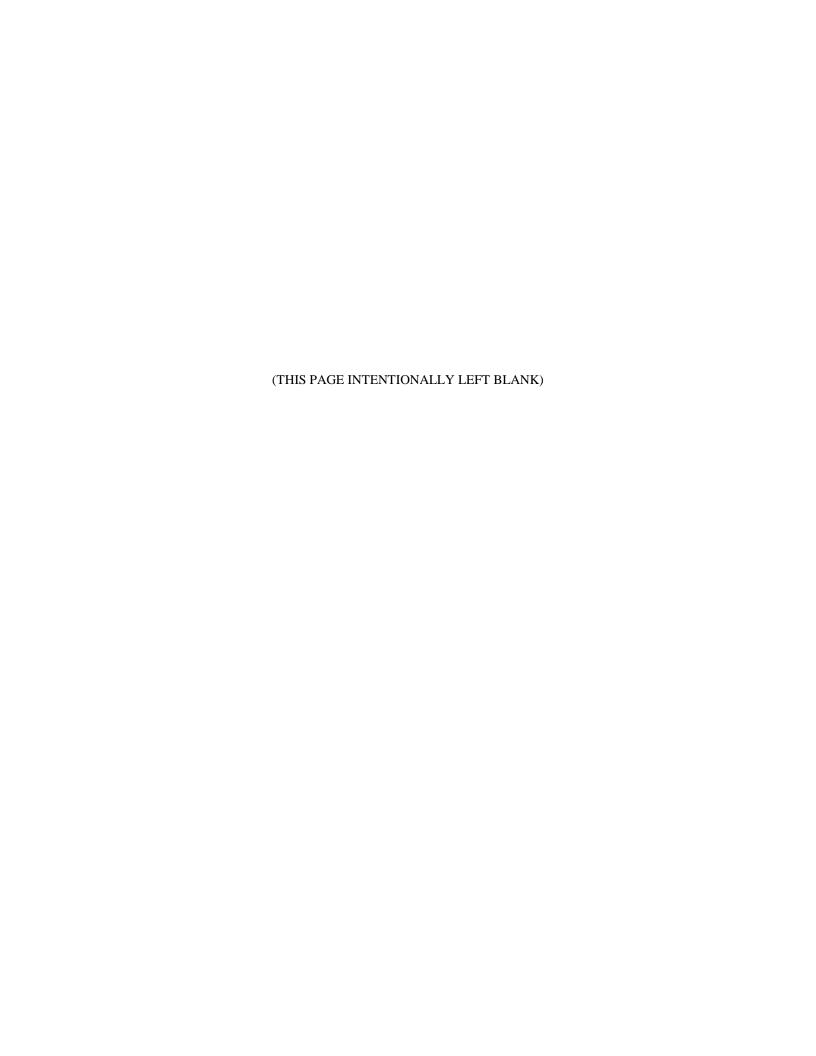
EXHIBIT A

NOTICE TO REPOSITORIES OF FAILURE TO FILE ANNUAL REPORT

Name of Issuer:	City of San Diego
Name of Issue:	Public Facilities Financing Authority of the City of San Diego Subordinated Water Revenue Bonds, Series 2002 (Payable Solely from Subordinated Installment Payments Payable From Net System Revenues of the Water Utility Fund of the City of San Diego, California)
Name of Obligated Person:	City of San Diego
Date of Issuance:	, 2002
respect to the above-named Bonds as rec Purchase Agreement, dated as of Augu Equipment Leasing Corporation and the	GIVEN that the City of San Diego has not provided an Annual Report with puired by Section 5.02 of the 2002 Supplement to the Master Installment st 1, 1998, as amended, by and between the San Diego Facilities and e City. The City anticipates that the Annual Report will be filed by
Dated:	WELLS FARGO BANK, NATIONAL ASSOCIATION, as Dissemination Agent, on behalf of the City of San Diego
	Ву:

cc: City of San Diego

APPENDIX D ENGINEER'S STATEMENT OF FEASIBILITY



Report

Engineer's Statement of Feasibility

City of San Diego



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Summary

This Engineer's Statement of Feasibility summarizes the results of an independent review of the City of San Diego Water Department's (the Department) actual expenditures during the period from 1998 to 2002 and proposed expenditures during the period from 2003 to 2007 under its Capital Improvement Program (CIP) for its potable and reclaimed water supply, treatment, storage and distribution system. The CIP is being implemented by the Department, which formed separate divisions, the Water Policy, CIP Finance & Planning Division, and the CIP Program Management Division, to plan and manage the necessary projects. The CIP which was included in this review includes those projects which have been completed or started since the origination of the CIP in 1998, as well as those currently planned to be undertaken through 2007. This review examined the Department's performance in implementing projects since 1998, as well as its ability to implement the currently planned projects through 2007, and to provide adequate resources to operate and maintain the facilities in its water system, both now and in the future. The Office of the City Treasurer's Financing Services Division requested that O'Brien & Gere review the following aspects of the proposed program:

CIP Scheduling and Execution Review: Review the Department's success in implementing the CIP projects that were planned in 1998, including performance in meeting planned schedules and completing projects within the costs estimated. Assess the Department's ability to meet the dates set in the California Department of Health Services Compliance Order.

Cost Estimation Review: Review the performance of the Department's Cost Estimating Guidelines, developed in 1998, by comparing the actual project costs to the estimates developed by using the guidelines. Review the use of the pooled contingency fund in the period since 1998 to assess its acceptability. Review changes that have been made to the guidelines since 1998 to improve performance.

Operations and Maintenance Review: Review the Department's progress since 1998 in implementing improvements to its Operations and Maintenance program as well as the adequacy of current plans to operate and maintain the water system.

Revenue Program Evaluation: Review the Office of the City Treasurer's Financing Services Division rate case for the proposed financing and assess the adequacy of approved rates and future increases to provide sufficient revenues to cover forecasted expenditures, including those necessary to design and construct facilities; to operate and maintain facilities; to repay annual debt service including meeting the coverage target; and to cover other funding requirements that may arise.

Opinion:

Based on our evaluation of the above-described areas, it is our opinion that the proposed CIP is feasible, and can be funded and completed within the timetables described in the documents provided for review. Specifically, the plan is adequate with respect to the following areas:

CIP Execution: The Department has the ability to plan, design and construct the proposed capital improvements to the water system. The planned projects will allow the Department to continue to meet the requirements of the Safe Drinking Water Act (SDWA) as well as those of the California Department of Health Services Compliance Order No. 04-14-96CO-022 as amended through Amendment No. 8 dated August 6, 2002.

Cost Estimating: The Department's cost estimating guidelines and practices produce estimates that are within acceptable ranges at the various project phases and have been revised to reflect more current information.

Operations and Maintenance: The Department's Operations and Maintenance program is adequate. The qualifications, training and continuing competency requirements that the Operations and Maintenance staff must satisfy are adequate to provide appropriately qualified personnel to operate and maintain the water system.

Revenue Program: Based on the CIP reviewed, the Department's revenue and cost assumptions, and the resulting forecasted revenue stream, are reasonable. The forecasted revenues are adequate to fund projected debt service requirements, operations and maintenance expenditures, coverage requirements, payments to reserve accounts and capital expenditures. The financing plan is feasible based on current information and the anticipated conditions for the planning period through 2007.

1. Introduction

1.1. Scope of Services

The City of San Diego retained O'Brien & Gere Engineers, Inc., in association with Damon S. Williams Associates and Mac. Perez Consulting Engineers to prepare an update to the Engineer's Statement of Feasibility, originally completed in June 1998 as part of the process in the City's financing of improvements to its water system. These three firms comprise the Feasibility Engineering Evaluation Team (the Engineering Team). The purpose of this Engineer's Statement of Feasibility is to provide an independent assessment of the CIP, the Department's progress in completing projects planned for the 1998- 2002 time period, and the Department's current plans for completing projects for the remainder of the planning period (through 2007). In order to provide this assessment, four specific areas were reviewed by the Engineering Team with respect to the CIP: the scheduling and execution of projects in the 1998-2002 time period as well as the Department's ability to execute in the forecast period; cost estimating procedures and techniques used by the Department; the Department's capability to operate and maintain the water system as well as its progress in implementing plans to staff and train its operations and maintenance group; and the adequacy of the revenue program to fund a portion of the CIP and to fund the operating and maintenance costs of the water system.

In conducting its evaluation, the Engineering Team met with key City personnel, including the Utilities General Manager; Department management staff; the CIP Program Manager; City Treasurer's financing Department staff in planning, engineering, The Engineering operations/maintenance and program management. Team toured completed projects and the Alvarado Water Treatment plant, currently undergoing a major upgrade and expansion. Engineering Team conducted interviews with key personnel to discuss the CIP, the Department's progress in completing the work that had been scheduled for the 1998-2002 time period, issues that have arisen during this time, and the actions that the Department has taken to address these issues. A listing of the documents reviewed is included in Appendix A.

In completing this update of the Engineer's Statement of Feasibility, the Engineering Team has relied on the accuracy and reliability of documents prepared by other parties and furnished to us by the City. Where it was believed to be appropriate, more critical review of certain items such as financial data, cost estimates, and project costs to date was completed. Many documents, such as reports, memos, organization charts, cost and scheduling data were presumed to be accurate for the purposes of our review, and were not independently verified. Where necessary, additional information was requested and reviewed.

1.2. Consultant Qualifications

The Engineering Team performed its activities for this review under the direction of O'Brien & Gere Engineers, consistent with the requirements of the Department.

O'Brien & Gere Engineers, Inc. (O'Brien & Gere) is a nationally recognized consulting engineering firm which has provided municipal engineering services to many municipal agencies in its 56 year history. It is a privately owned firm with 25 offices in the United States and abroad. It provides services including studies and evaluations; design; construction review and construction management; construction inspection; and facility startup and commissioning. In addition to the engineering firm, the O'Brien & Gere companies offer laboratory analytical services; contract operation services; construction management and design/build services.

O'Brien & Gere has provided water system engineering services to a number of large water purveyors, including studies, design and construction review services. O'Brien & Gere has also acted as independent engineer for, among others, the Birmingham Water Works and Sewer Board, the Monroe County Water Authority, the Onondaga County Water Authority, the Metropolitan Water Board in Syracuse, NY and the Upper Mohawk Valley Regional Water Board in Utica, NY. In this role, reviews similar to those required by the City have been provided to these clients.

For this Statement of Feasibility, Damon S. Williams Associates (DSWA) of Phoenix, Arizona reviewed the Department's progress in implementing plans to staff and train the Operations and Maintenance department, as well as the Department's capability to operate and maintain the water system. The firm specializes in water and wastewater planning, engineering, operations and maintenance, cost estimating, design and construction management, and has provided similar services

Status: Final September 27, 2002

to the City related to the Engineer's Statements of Feasibility for the wastewater system improvements. DSWA provided the review of the Operations and Maintenance program for the 1998 Statement of Feasibility for the Department's CIP.

Mac. Perez Consulting Engineers performed the cost estimating review for this Statement of Feasibility. Mac. Perez is a small business enterprise, providing services in civil and environmental engineering. The range of professional services provided spans from the conceptual stage through design and construction management services. Mac. Perez Consulting Engineers provided the review of the cost estimating procedures and guidelines for the 1998 Statement of Feasibility.

All other review areas were undertaken by O'Brien & Gere Engineers.

1.3. Introduction/history

The Department currently provides potable water to a service area which includes all of the area within the City boundaries, as shown on the following Figure 1-1. The Department also supplies treated water on a wholesale basis to the California-American Water Company and the City of Del Mar, and untreated water to the Santa Fe and San Dieguito Irrigation Districts.

The current municipal ownership of the water system began at the turn of the century when the City purchased the privately-owned San Diego Water Company. Between 1913 and 1935, the City purchased a number of reservoirs to supplement its raw water supply. In the early 1940's, as the City's population grew to over 400,000, the City began to import raw water from the Colorado River Aqueduct, completed in 1941 by the Metropolitan Water District of Southern California (MWD). Shortly thereafter, the San Diego County Water Authority (CWA) was formed to deliver Colorado River water to San Diego County. The CWA became a member of the MWD in 1946, and the First San Diego Aqueduct was completed in 1947. The CWA receives imported water from the San Joaquin-Sacramento Delta area in northern California as a member of the MWD and in turn supplies this water to its customers. On average, up to 90% of the City's water is imported via the CWA from these sources; ten percent is derived from local runoff.



CITY OF SAN DIEGO • WATER DEPARTMENT CAPITAL IMPROVEMENTS PROGRAM MAJOR PROJECTS





As a result of a 1993 sanitary survey of the City of San Diego Water Utilities Department (a predecessor agency to the current Department), the California Department of Health Services concluded that, while there were no violations of water quality standards, deficiencies existed in the City's physical facilities which required correction. The Department of Health Services subsequently worked with the Department to develop a compliance agreement, which was ultimately converted to a Compliance Order dated January 22, 1997. This Compliance Order requires that the Department complete the design and construction of capital projects including water system reservoirs, water treatment plants, pump stations, transmission pipelines, and water mains.

Recognizing that it would be undertaking a large capital improvement program involving all facets of its water system, the Department commenced the preparation of its Strategic Plan for Water Supply in May 1996. This plan, which was prepared by the Department with the assistance of consultants, and with the participation of numerous community leaders that composed the Public Advisory Group (PAG), examined alternatives for providing an adequate supply of potable water to the area through the year 2015. The planning process was formulated to gain community and public support for the necessary capital improvement program. The City Council approved the Strategic Plan in August 1997 after an intensive process of review and selection of alternatives. The Strategic Plan alternatives focused on system-wide strategies, not just individual projects. The resulting document identified a recommended alternative based on a number of criteria. The PAG considered the recommended alternative to be an optimum plan for meeting the area's water supply needs through 2015. Strategic Plan concluded that the Department did not have adequate treatment plant capacity to meet then-current and projected water demands. Therefore the Department needed to purchase treated water to meet current peak demands.

After the approval of the Strategic Plan by the City Council in August 1997, the City began the process of implementing the recommended alternative by forming a division (later subdivided into two separate divisions) within the Department to plan and manage the CIP, retaining the services of Parsons Infrastructure & Technology Group, Inc. (Parsons) to act as the Engineering Program Manager, and completing the financing in 1998, of \$385 million to provide funds for the CIP. Since 1998, the Department has completed the study, design and construction of certain projects in the water system, and has begun the study, design or construction of other projects included in the CIP.

In December 1997, the Department created the CIP Management Division to manage all aspects of the CIP. In July 1999, this division

Status: Final September 27, 2002

was further subdivided into two divisions: the CIP Program Management Division and the Water Policy, CIP Finance & Planning Division. This reorganization was intended to provide enhanced focus on CIP project management and additional emphasis on water policy issues, particularly development of alternative sources of supply and long-range planning for the CIP.

The CIP Program Management Division is responsible for providing a safe and reliable water treatment and distribution system incorporating state-of-the-art facilities at the lowest possible cost to customers. This Division oversees the project management, engineering and other technical aspects of the CIP in order to accomplish the timely and cost-effective upgrade and expansion of the water system. The Water Policy, CIP Finance & Planning Division is responsible for ensuring an adequate, safe and reliable water system by preparing capital project planning studies, developing the long-range capital program, coordinating with local, state and federal agencies, reviewing and developing policies related to water supply and development of local sources, managing the financial needs of the water capital program, and general administrative support for the capital program such as data systems, contract administration, and public information.

An organization chart for the Department is provided as Figure 1-2.

CITY OF SAN DIEGO PUBLIC WORKS BUSINESS CENTER

CURRENT FINANCIAL ORGANIZATIONAL STRUCTURE (REPORTING RELATIONSHIPS)

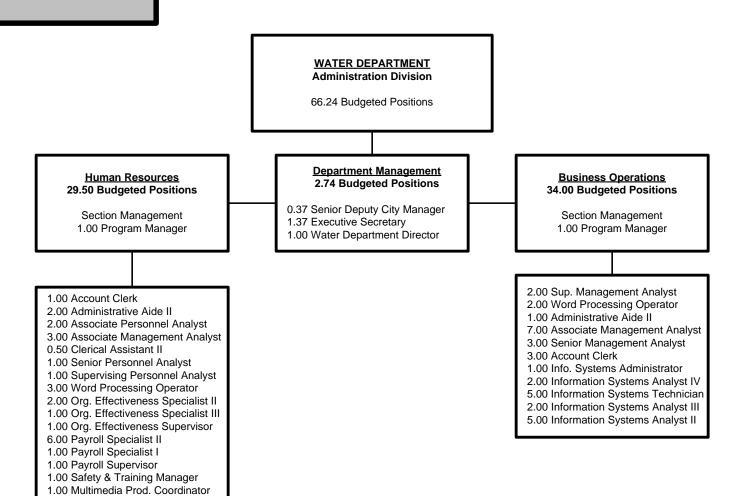
July 1, 2002

WATER DEPARTMENT 855.74 Total Budgeted Positions

ADMINISTRATION DIVISION 66.24 Budgeted Positions DEPARTMENT DIRECTOR **BUSINESS OPERATIONS PROGRAM HUMAN RESOURCES PROGRAM** Larry Gardner PROGRAM MANAGER / CFO PROGRAM MANAGER Charles Yackly Paulette Mormino **WATER POLICY, CIP, FINANCE &** CIP PROGRAM MANAGEMENT DIVISION **CUSTOMER SUPPORT DIVISION** WATER OPERATIONS DIVISION PLANNING DIVISION 207.00 Budgeted Positions 34.00 Budgeted Positions 488.00 Budgeted Positions 60.50 Budgeted Positions DEPUTY DIRECTOR DEPUTY DIRECTOR DEPUTY DIRECTOR DEPUTY DIRECTOR Alex Ruiz Vic Bianes Mark Stone Marsi Steirer

Administration Division

1.00 Training Supervisor



Customer Support Division

WATER DEPARTMENT **Customer Support Division**

207.00 Budgeted Positions

Division Administration 6.00 Budgeted Positions

- 1.00 Deputy Director
- 1.00 Assistant Deputy Director
- 1.00 Supervising Public Info. Officer
- 1.00 Senior Management Analyst
- 2.00 Word Processing Operator

Recycled Water Program 8.50 Budgeted Positions

Section Management 1.00 Senior Civil Engineer

- 1.00 Assoc Engineer Civil
- 1.00 Administrative Aide II
- 1.00 Word Processing Oper.
- 2.00 Senior Engineering Aide
- 1.00 Principal Engineering Aide
- 1.00 Assistant Engineer Civil
- 0.50 Public Information Officer

Water Resource Management 18.50 Budgeted Positions

Section Management

- 1.00 Recycling Program Manager
- 1.00 Supv. Management Analyst
- 1.00 Senior Clerk/Typist
- 1.00 Clerical Assistant II

1.00 Claims and Insurance Manager

- 3.00 Associate Mgmt. Analyst
- 1.00 Word Processing Operator
- 1.00 Associate Engineer Mech.
- 1.00 Administrative Aide II
- 1.00 Senior Management Analyst
- 1.00 Administrative Aide I
- 0.50 Public Information Officer
- 1.00 Clerical Assistant II
- 1.00 Supervising Field Rep.
- 4.00 Field Representative

Customer Services - Office 58.00 Budgeted Positions

Section Management

2.00 Customer Service Supervisor

- 1.00 Associate Mgmt. Analyst
- 2.00 Word Processing Operator
- 5.00 Sr. Customer Service Rep.
- 38.00 Customer Service Rep.
- 2.00 Clerical Assistant II
- 1.00 Senior Clerk / Typist
- 1.00 Administrative Aide II
- 5.00 Cashier

Field Services & Investigations 47.00 Budgeted Positions

Section Management 1.00 Claims and Insurance Manager 1.00 Clerical Assistant II

1.00 Senior Water Utility Supervisor

- 4.00 Code Compliance Officer
- 14.00 Field Representative
- 1.00 Supervising Field Rep.
- 1.00 Supervising Meter Reader
- 1.00 Senior Meter Reader
- 17.00 Meter Reader
- 1.00 Principal Engineering Aide
- 2.00 Senior Engineering Aide
- 1.00 Customer Services Rep
- 1.00 Water Utility Supervisor
- 1.00 Associate Mgmt. Analyst

Meter Services 69.00 Budgeted Positions

Section Management 1.00 Principal Water Utility Supervisor

3.00 Sr. Water Utility Supervisor

- 1.00 Water Utility Supervisor
- 1.00 Equipment Technician III
- 6.00 Equipment Technician II
- 13.00 Equipment Technician I
- 8.00 Water Utility Worker
- 25.00 Utility Worker I
- 2.00 Clerical Assistant II
- 1.00 Principal Engineering Aide
- 5.00 Senior Engineering Aide
- 1.00 Word Processing Operator
- 2.00 Field Representatives

Water Operations Division

WATER DEPARTMENT Water Operations Division

488.00 Budgeted Positions

Operations Support 12.00 Budgeted Positions

2.00 Senior Clerk Typist 6.00 Word Processing Operator 1.00 Data Entry Operator 2.00 Clerical Assistant II 1.00 Public Information Clerk

Division Management 7.00 Budgeted Positions

1.00 Deputy Director

1.00 Assistant Deputy Director

1.00 Sup Management Analyst

2.00 Associate Management Analyst

2.00 Administrative Aide II

Safety Program 6.00 Budgeted Positions

1.00 Safety & Training Manager 3.00 Safety Representative II

1.00 Administrative Aide II

1.00 Assoc, Management Analyst

Public Outreach/Information 4.00 Budgeted Positions

1.00 Public Information Officer 1.00 Sup. Public Information Officer 2.00 Grounds Maintenance

Worker II

Water System Engineering 50.00 Budgeted Positions

Section Management 1.00 Engineering Program Manager

1.00 Senior Engineer - Electrical

8.00 Associate Engineer - Civil 1.00 Principal Engineering Aide

2.00 Senior Engineering Aide

9.00 Assistant Engineer - Civil

1.00 Hydrography Aide

1.00 Senior Engineer - Civil

1.00 Principal Water Utility Sup

2.00 Sr. Water Utility Supervisor

8.00 Water Utility Worker

9.00 Senior Drafting Aide

3.00 Principal Drafting Aide

1.00 Water Utility Supervisor

1.00 Utility Worker I

1.00 Info. Systems Analyst II

Water Laboratory 51.00 Budgeted Positions

Section Management 1.00 Water Production Superintendent

5.00 Associate Chemist

16.00 Assistant Chemist

8.00 Biologist II

1.00 Senior Chemist

10.00 Laboratory Technician

1.00 Senior Biologist

4.00 Biologist III

1.00 Assistant Lab Technician

1.00 Stock Clerk

1.00 Building Servs. Supervisor

1.00 Equipment Technician I

1.00 Storekeeper

Water Construction 181.00 Budgeted Positions

Section Management 1.00 Construction Program Manager

3.00 Principal Water Utility Sup 8.00 Senior Water Utility Sup 20.00 Water Utility Supervisor 1.00 Equipment Operator III 11.00 Equipment Operator II 1.00 Equipment Technician II

12.00 Equipment Technician I 47.00 Water Utility Worker 72.00 Utility Worker I

1.00 Storekeeper I

2.00 Cement Finisher

2.00 Heavy Truck Driver I

System Operations 132.00 Budgeted Positions

Section Management 1.00 System Operations Program Manager

1.00 Principal Water Utility Supr.

4.00 Senior Water Utility Supervisor

5.00 Water Utility Supervisor 12.00 Equipment Technician I

15.00 Equipment Technician II

3.00 Equipment Operator II

1.00 Electrician

1.00 Electronics Technician

4.00 Welder

2.00 Carpenter

10.00 Water Utility Worker

12.00 Utility Worker I

1.00 Associate Engineer - Electrical

1.00 Instrument & Control Supervisor

8.00 Instrument & Control Technician

1.00 Plant Process Control Supv.

3.00 Plant Process Control

Electrician

3.00 Senior Water Operations Sup

3.00 Water Operations Supervisor

17.00 Water Plant Operator

3.00 Plant Technician Supervisor

3.00 Plant Technician III

3.00 Plant Technician II

5.00 Plant Technician I

2.00 Tank Service Technician II

8.00 Tank Service Technician I

Reservoirs & Recreation 45.00 Budgeted Positions

Section Management 1.00 Lakes Program Manager

1.00 Senior Water Utility Supervisor

1.00 Ranger / Diver Supervisor

2.00 Ranger / Diver II

1.00 Equipment Mechanic

8.00 Reservoir Keeper

9.00 Assistant Reservoir Keeper

15.00 Lake Aide II

4.00 Ranger / Diver I

1.00 Utility Supervisor

1.00 Utility Worker I

1.00 Biologist III

CIP Program Management Division

<u>WATER DEPARTMENT</u> CIP Program Management Division

34.00 Budgeted Positions

<u>Division Management</u> 1.00 Budgeted Positions

1.00 Deputy Director

Project Management Water Treatment Plants 9.00 Budgeted Positions

Section Management 1.00 Senior Engineer - Civil

3.00 Associate Engineer - Civil 4.00 Assistant Engineer - Civil 1.00 Principal Engineering Aide

Project Management North 8.00 Budgeted Positions

Section Management
1.00 Senior Engineer - Civil

3.00 Associate Engineer - Civil 3.00 Assistant Engineer - Civil 1.00 Principal Engineering Aide

Special Projects 1.00 Budgeted Position

Section Management 1.00 Project Officer

Project Management South 10.00 Budgeted Positions

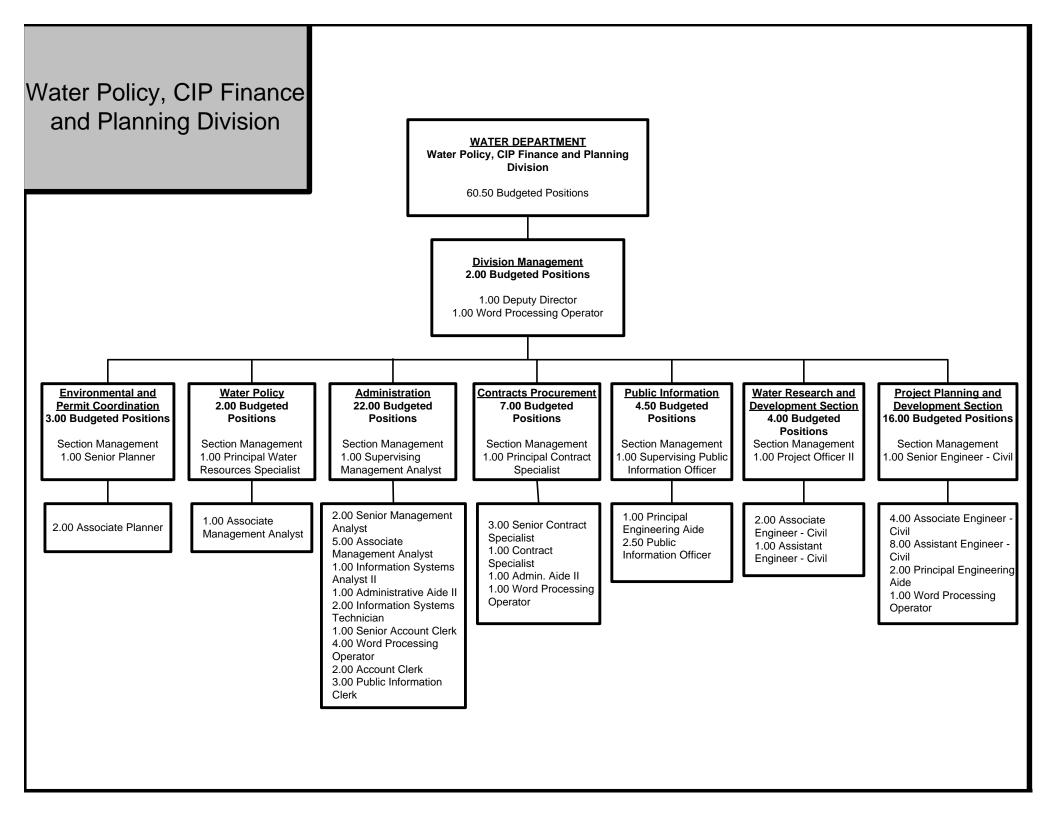
Section Management 1.00 Senior Engineer - Civil

5.00 Associate Engineer - Civil 3.00 Assistant Engineer - Civil 1.00 Principal Engineering Aide

Operations Liaison 5.00 Budgeted Positions

Section Management 1.00 Senior Engineer - Civil

- 1.00 Senior Water Utility Supervisor
- 1.00 Senior Water Operations Supervisor
- 1.00 Associate Engineer Civil 1.00 Assistant Engineer - Civil



1.4. Current water system description

A typical water supply system draws raw water from a source, provides treatment to the water to remove impurities and provide disinfection to inactivate microorganisms, and then conveys the treated water to customers via a network of pipelines referred to as the transmission and distribution system. The transmission and distribution system typically contains pumping facilities to maintain water system pressure and to convey water throughout the system, and it also contains water storage facilities which provide a "reserve" of water to meet peak demands and fire fighting requirements. The water system which the City owns and operates is typical in that it contains these elements. It is an extensive supply, treatment, storage and distribution system, which includes:

- Nine local surface raw water storage reservoirs
- Connections to CWA aqueducts, which supply both raw and treated water to the City
- Three water treatment plants
- Twenty-nine treated water storage facilities
- Approximately 3,460 miles of water transmission and distribution piping
- Forty-five water pump stations

The City obtains raw water via its surface water storage reservoirs and from the CWA via its supply system. The City also has the ability at present to take treated water from the CWA to supplement its local supplies. Given the semi-arid nature of the San Diego area, and its limited surface and ground water supplies, approximately 90% of the City's water historically has been supplied from distant sources, such as the Colorado River and the California State Water Project via CWA facilities.

The Department operates three water treatment plants with a total current rated capacity of 296 million gallons per day (mgd). The treatment plants serve different areas of the City. The Miramar Treatment Plant, which serves the northern portion of the City, is the largest plant, and has a rated capacity of 140 mgd. The plant was originally constructed in 1962 and has been expanded since then to its current rated capacity.

Raw water is provided to the plant from the CWA through the 48-inch diameter Miramar Pipeline and the 69-inch diameter CWA Second Aqueduct. Treated water flows from the plant through the 66-inch diameter Miramar Pipeline. The plant is considered a conventional treatment plant, and contains rapid mix, coagulation, flocculation, sedimentation basins, filtration and disinfection facilities. Disinfection is provided through chloramination, a process in which chlorine and ammonia are added to the treated water. Chloramination provides a longer-lasting chlorine residual than the use of chlorine alone, thus helping to maintain the high quality of the water in the distribution system. Treated water is stored on site in two reservoirs which have capacities of 21 and 31 million gallons, respectively.

The Alvarado Plant, located at Lake Murray, serves the central portion of the City and has a rated capacity of 120 mgd. It was originally constructed in 1950 with a capacity of 66 mgd and has been expanded to attain its current rated capacity. It receives raw water from several sources: the CWA, Lake Murray, and the El Capitan and San Vicente Reservoirs. This water is conveyed to the plant through the CWA First and Second Aqueducts and the El Monte Pipeline. Treated water flows from the plant to the water system through the Trojan Pipeline (54" diameter) and the Murray Pipeline (48" diameter). conventional plant, and has rapid mix, coagulation, flocculation, sedimentation, filtration and disinfection facilities. As with the Miramar plant, chloramination is used for disinfection. The plant has three treated water reservoirs: the 35 million-gallon Earl Thomas Reservoir, and two 21 million gallon reservoirs which were recently constructed. The Earl Thomas Reservoir was removed from service in November 2001 after it was found via inspection that significant structural problems existed in the reservoir. The CIP was subsequently modified to include a project for the replacement of the reservoir.

The Otay Plant, located in the southern-most part of the City, receives raw water from the CWA and the Otay, Barrett and Morena Reservoirs, and has a rated capacity of 36 mgd. It is the smallest of the Department's plants and serves the southern-most portions of the water system. The plant was originally constructed in 1914, with a rated capacity of 14 mgd, and has been improved and expanded to the current capacity. The CWA Second Aqueduct conveys raw water to the plant, while the Otay #2 and #3 pipelines (30 and 54 inch diameters, respectively) convey treated water to the water system. Plant processes include rapid mix, coagulation, flocculation, sedimentation, filtration and disinfection through chloramination. There is a treated water reservoir (the South San Diego Reservoir) with a capacity of 15 million gallons.

The total treated water storage volume currently available at the three treatment facilities (Earl Thomas Reservoir out of service) is 109 million gallons.

The storage tanks and reservoirs in the water system provide additional treated water storage which assists in maintaining water system pressure, as well as in meeting peak and fire flow demands. There are 30 such facilities in the water system, with a combined storage volume of approximately 80 million gallons. Many of these storage facilities are approaching the end of their useful lives and must be rehabilitated or replaced. Additional storage capacity must also be added in certain areas to meet water system demands.

The water system consists of approximately 3,460 miles of pipeline, with transmission mains of up to 72 inches in diameter. Portions of the transmission and distribution system are approaching the end of their useful lives, or are not optimally sized to meet current and future demands. These lines must be rehabilitated or replaced, or, in some cases, paralleled with new lines to provide adequate capacity. The City also has undertaken a program to systematically replace the old cast iron mains in its water system, approximately 150 miles of which remain.

Forty-five pump stations located throughout the water system boost water to areas of higher elevations. As with the other physical facilities in the water system, some of the pump stations are approaching the end of their useful lives, or require expansion or upgrade to meet projected demands. Eleven pump stations are scheduled for such work in the CIP.

1.5. CIP overview and planned water system upgrades

The CIP projects can be classified into one of eight categories as they relate to the water system. The categories for these projects are:

- Water Treatment Plants
- Pipelines
- Pump Stations
- Water Storage Facilities
- Reclaimed Water Facilities
- Miscellaneous

- Program Management
- Pooled Contingencies

Each project has been described in detail in individual project profile sheets. Each project has been assigned a CIP number which is the basis for identifying the project and is the level at which costs are assigned as the project proceeds. The following is a brief summary of the projects included in the CIP.

Water Treatment Plants:

The largest share of the costs in the CIP is for treatment plant upgrades and expansion.

The Alvarado Plant is currently undergoing a major upgrade and expansion project to increase its rated capacity from 120 mgd to 200 mgd to meet projected water demands through 2050. The project as it was planned in 1998 has been modified in some respects to better meet City needs. The project has been split into two phases to provide increased water filtration in the near term, in response to a regional shortage of treated water capacity. The "Phase 1 Project" includes the rehabilitation of existing filters, the construction of new filters and chemical storage facilities, and upgrades to the control building, and is currently scheduled to be complete in October 2002. Completion of the Phase 1 Project will result in treatment capacity of 150 mgd at the Alvarado Plant. Phase 2 work will be undertaken after the completion of the Phase 1 work, and generally includes the rehabilitation of existing flocculation and sedimentation basins, providing the tankage and piping necessary for future ozonation. The plant capacity will be increased to 200 mgd under Phase 2, which is scheduled to be completed in April 2008.

The Miramar Plant will undergo extensive renovation and upgrade on a schedule that will slightly overlap the completion of the work at the Alvarado Plant, including expansion of plant capacity to 215 mgd to meet projected water demands through 2030. Certain off-site pipeline work has been separated from the water plant work, to minimize impacts to areas surrounding the plant. The projects, known as the Miramar Early Start Improvements Phase 1 and 2, will be completed prior to the major plant work. The Miramar Early Start Improvements Phase 1 are scheduled to be completed by November 2002, and Phase 2 is scheduled to be completed by December 2004. The plant work will upgrade or replace existing mixing, flocculation and sedimentation basins, filters, pumping and chemical feed facilities, and will provide for the future addition of ozonation to meet SDWA requirements. The Miramar Plant project is scheduled to be completed by March 2009.

The Otay Plant will be upgraded to meet SDWA requirements, including provision for future ultraviolet (UV) disinfection. Additional assessment of treatment technologies, including review by a panel of nationally recognized water treatment experts, has led to the revision of the plans to treat water at the Otay Plant, to better meet known future requirements. The Department currently estimates that upgrades to the Otay Plant, scheduled to be completed by March 2008, will add 4 mgd of rated capacity which will be consistent with the design capacity of 40 mgd.

Pipeline Projects:

Fifteen pipeline projects are scheduled to be undertaken as part of the CIP. The pipeline projects are further divided into distribution and transmission lines.

Distribution lines are the smaller diameter pipelines that directly service the residential and commercial customers connected to a meter. The water system currently retains approximately 150 miles of its original inventory of over 650 miles of cast iron distribution lines. Although still operating, these lines have exceeded their anticipated service life of 40 to 50 years. The Department is continuing its program of replacing its entire inventory of cast iron lines.

Transmission lines are larger diameter pipelines conveying raw water to the treatment facilities and treated water from the plants to storage facilities in the water system. The transmission line projects in the CIP in general include pipeline rehabilitation, pipeline replacement, and installation of new mains to satisfy water demands and to increase redundancy and reliability.

Pump Stations:

The City currently has 45 pump stations. The CIP includes projects that will replace, rehabilitate and construct new pump stations throughout the water system. Of the eleven pump stations included in the CIP, five have been completed and the Waring Road Pump Station is near completion. The five remaining pump stations (Canyonside Pump Station, Catalina Pump Station, Otay Pump Station Pump Conversion, Parkland Pump Station, and Rancho Bernardo Pump Station Number 2) will be completed by 2007.

Water Storage Facilities:

The CIP includes projects that will improve and upgrade the raw water outlet structures on the Lower Otay Reservoir, Barrett Reservoir and Morena Reservoir. Ten completed reservoir projects and four completed standpipe projects have increased the treated water storage capacity by 75%, and have also extended the useful life of treated water storage

facilities. An additional four reservoir projects will increase treated water storage capacity by 23% by 2007.

Reclaimed Water Facilities:

The Department has been given the responsibility for the completion of a number of reclaimed water facilities to provide additional infrastructure for the storage and distribution of reclaimed water. The CIP includes projects that will add 15 miles of reclaimed water distribution mains by 2007. Significant work has been completed or is in progress, including optimization of the North City Water Reclamation Plant storage and distribution system, extension of distribution mains to identified service areas and construction of pumping facilities.

Miscellaneous Projects:

Some of the CIP projects are improvements and additions which will benefit the water system as a whole. Corrosion protection enhancements will be incorporated at several facilities, and improvements at several raw water surface reservoirs are planned, along with modernization of larger water service meters. Approximately 429 existing air and vacuum release valves and air release valves have been relocated from below grade vaults to above ground enclosures mounted on concrete pads. This reduces the chance of cross connections or contamination of the potable water system, and improves access for maintenance.

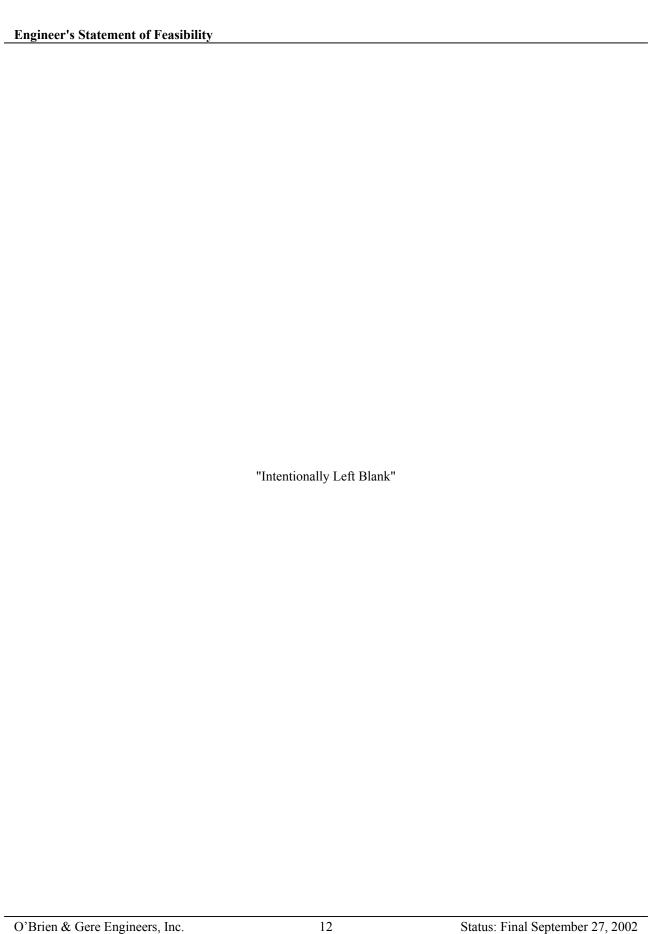
To improve its ability to remotely control facilities in the water transmission and distribution system, the City completed an extensive upgrade of the telemetry system City-wide. The new system upgraded and centralized all telemetry system controls into one location (the Alvarado Plant) to facilitate control, monitoring and tracking of data, and improve service and emergency response time. As new or renovated facilities are constructed, connection to the telemetry system is made.

Program Management:

Program Management services for the CIP are being provided by Parsons, and include cost estimating, program controls and design review.

Pooled Contingencies:

Pooled contingencies are contingency amounts identified for each project in order to protect against uncertainties in the construction of each project. Rather than carrying this contingency in each project, the Department has aggregated the amount into a single contingency pool.



2. CIP Scheduling and Execution Review

2.1. Introduction

The purpose of the CIP Scheduling and Execution Review was to review the projects in the current CIP and the changes that have been made to the CIP projects since 1998; to review updated cost information (either actual cost to date or revised projected costs); and to assess the Department's continued ability to plan, design and construct the CIP.

2.2. Summary of CIP Review

In 1998, Parsons prepared a Program Management Plan (PMP) which contained status and content summaries of each project included in the CIP. For this review, the Engineering Team reviewed Project Summary sheets, dated May 2002, and provided by the Department, which provided pertinent information on the scope and status of each individual project currently in the CIP. In addition, the Department provided a detailed comparison of the projected costs and schedules of projects anticipated in the 1998 PMP to actual cost and schedule for completed projects, and to currently projected costs and schedules for projects still in progress. Interviews were conducted with project managers and senior civil engineers from the Department to gather information on specific projects where changes in project schedule or budget appeared significant.

When it was originally developed in 1998, the CIP was estimated at \$778 million for the period through 2006. Current estimates for the CIP for the period from 1998 through 2007 now total \$889 million, an increase of approximately 16%. A comparison of the CIP as structured in 1998, and the current planned CIP, is contained in Appendix B.

In general, projects were not as well defined in 1998 as the Department would have liked, and scheduling delays ensued as a result of the need to more completely define the details of projects prior to design and construction. Changes to the project scope, cost or scheduling were due to one or more of the following:

- Further definition of the project through completion of planning studies or design, or use of the Department's hydraulic model of the water system indicated that the scope of the project should be adjusted to provide a better finished project, or that, in some instances, new projects were required.
- Further definition of the project through completion of planning studies or use of the Department's hydraulic model of the water system indicated that the scheduling or sequencing of projects should be adjusted to minimize impacts on the operations and maintenance of the water system during the construction.
- During the course of planning, design or construction, issues raised by neighborhood groups relative to construction impacts required changes to the scope or phasing of a project.
- Further development of SDWA requirements resulted in the need to re-evaluate the scope of treatment plant projects, and in some cases to provide different or higher levels of treatment to the raw water.
- During the course of the construction, differing field conditions necessitated performance of additional work.
- During construction, outside factors, such as changing requirements of San Diego Gas & Electric, necessitated changes to a project.
- After further development of the Department's Supervisory Control and Data Acquisition (SCADA) system, it was determined that additional controls at remote facilities would result in better operations and maintenance capabilities for the water system.
- The need for additional storage and conveyance capacity, and the decision to move responsibility for the reclaimed water distribution system to the Department caused an increase in the CIP of approximately \$43 million but was necessary for the City to meet its obligations to the EPA as to the use of reclaimed water.

The reasons for changes to individual projects, when reviewed with Department staff, appear to be reasonable and based on sound engineering judgment. The formulation of the CIP in 1998 included the best estimates available at the time for projects, based on preliminary development of project detail in many cases. The further development of planning tools such as the hydraulic model of the water system allowed more accurate assessment of project impacts and led to adjustment to many individual projects. The use of these planning tools now allows

more accurate definition of the projects at the concept stage. The accumulation of a growing database of actual project costs also allows the cost estimating process to be more precise over time.

Changes to the water treatment plant projects are the most significant in terms of cost and schedule impacts to the CIP. These projects were reviewed in detail with the Department, and the documentation provided indicates that the changes were necessary and in accordance with sound engineering judgment. There is now a reasonable and sound plan for completion of the water treatment plant projects which is expected to provide the Department and its customers with reliable treatment of water in accordance with the requirements of the SDWA.

The implementation of change management and control procedures will allow the Department to proactively manage projects to the budgets available for the planning period. The Department has implemented a program controls system that includes tools, procedures and requirements for cost estimating (see Section 3), Schedule Control, Cost Control and Change Control. Three schedulers located at the CIP offices keep schedule information up to date and the scheduling system is integrated with the City's Project Cost Information System (PCIS) to allow timely updating of cost data from the City's financial system. The City's Project Cost Information System (PCIS) integrates information from project schedules and accounting period actuals to accurately track cost and schedule data and highlight program trends. Project managers and other users have available on their computer desktop access to the PCIS database; users of the PCIS database can select from numerous available reports or customize reports to their specific needs.

The Department has instituted strict procedures for the review and approval of changes to projects in order to control costs to those currently projected. It uses an on-line change control system whereby approvals must be obtained from the CIP management team prior to proceeding with a change to a project. The Department is committed to the management of changes and has assigned the responsibility for this to a deputy director of the Department.

The Engineering Team found the current CIP to be sound and reasonable, and the changes made since 1998 to be based on sound engineering judgment. This conclusion is based on our review of the individual projects in question as well as our discussions with Department staff.

2.3. Scheduling and Execution

It took four years as opposed to the projected three years to expend the proceeds of the Certificates of Undivided Interest delivered in 1998. This was the result of the Department making adjustments to projects as they progressed through the planning and design phases, based on the further development of planning tools such as the hydraulic model of the water system. With these tools now in place and being used for project planning, the impact of such adjustments to projects is expected to be minimized. Projects where there was significant change in scope or budget were reviewed individually with senior civil engineers and project managers, and in all cases, the changes that were made to projects were found by the Engineering Team to be reasonable changes that provided a better product to the Department and its customers.

The Department's reorganization in 1999 to create two divisions to manage all aspects of the CIP provides enhanced focus on CIP management within the CIP Program Management Division. The Water Policy, CIP Finance & Planning Division provides focus on the planning of the long range program as well as individual projects, and provides financial and general administrative support for the CIP. The CIP Program Management Division, which is responsible for overseeing the design and construction of CIP projects, has instituted appropriate project controls programs, as further reviewed herein, to manage CIP projects to the scope, schedule and budget that are established. The separation of the planning and execution functions allows each group to focus on its specific area of responsibility and expertise.

The Engineering Team reviewed the contents of the seven volume Guidelines and Standards manual which includes Department policies, procedures and requirements to be followed by consultants and Department staff during the completion of projects in the CIP, cost estimating guidelines (see section 3), standard details and specifications, and scheduling requirements. The manual provides adequate guidance and/or standards that appear to be in accordance with good engineering practice for completion of all phases of the projects.

The 2001 San Diego Water Department Management Review Study prepared by Black & Veatch found that the Department's performance as a whole is average among water utilities of its size. Areas of particular focus in the Management Review included: Organizational Structure and Management; CIP Management; Customer Service; Maintenance and Operations; and Benchmarking. It found that the Department is structured and staffed appropriately and that the CIP Program Management Division is well-organized and well-run.

The City is in compliance with the requirements of DHS Compliance Order #04-14-96CO-022, as amended through Amendment No. 8. The City submits an Annual Report detailing the status of each item in the Compliance Order, and as of June 30, 2002, had met each obligation of the Order or was working with the DHS to amend dates in a mutually satisfactory manner. The DHS has worked cooperatively with the Department to adjust completion dates for individual projects when justified and when no adverse impact on the water system or customers will result. The Engineering Team believes that the adjustments that have been made to the schedule in the Compliance Order have been reasonable, based on sound engineering practice, and have resulted in no adverse impacts to the water system or its customers.

Timely completion of projects once they enter the construction phase does not appear to be an issue in the Department's execution of the CIP. Where changes to schedule were made during construction, the changes were minimal and for reasons typical of construction programs of this nature: completing construction work on a water system of the age of the Department's is complex and can be faced with field challenges as a result of dealing with old infrastructure; unforeseen field conditions are a normal occurrence; and lack of accurate records on the water system and other old utilities is not uncommon for cities of this size.

The Engineering Team reviewed cost figures and justifications for change orders on the CIP, to date. The CIP has experienced change orders of approximately 11.7% to date, a figure which is considered to be slightly higher than the commonly used 10% benchmark. It should be noted that 75% (\$15 million out of \$20 million total) of the total change order cost to date is due to changes associated with the Alvarado WTP Phase 1 construction. Review of the details of the change orders on this project reveals that the majority of the amount is due to owner-initiated changes, including the replacement of the washwater tank, additional operations building improvements, the addition of existing filter rehabilitation to the scope, and relocation of caustic soda tanks to a central chemical delivery and storage area at the plant. The Engineering Team found that the owner initiated changes that had the greatest impact on project cost were reasonable and resulted in facilities that are safer and more reliable. When the impact of these changes is removed from the cost figures, the change orders fall well within accepted standards for a capital improvement program of the nature and size of the Department's.

In FY 2001, the Department completed approximately \$116 million of work on the CIP, and in FY 2002, the Department was on track to complete an estimated \$125 to 130 million in work on the CIP, prior to it becoming evident that the City Council would delay approval of rate increases required for the further execution of the projects. As a result, the Department took action to defer some or all phases of certain projects in the CIP, according to the schedule under which it was believed that funds would become available. In conducting this review, the Engineering Team discussed the process by which the Department reviewed projects and made decisions regarding deferral. It is the opinion of the Engineering Team that the decisions made by the Department were in accordance with sound engineering judgment and did not result in adverse impacts on the water system or the Department's customers. Because the City Council, in April 2002, approved a series of rate increases that will increase water sales revenues by 6% per year for the next 5 years, the Department can now plan and execute the CIP on a basis consistent with the funds that will be available through 2007.

2.4. Conclusions

The documents and programs that were reviewed by the Engineering Team have been summarized above. The Engineering Team found that:

- The CIP has been constantly reviewed and refined, based on well-documented need and in accordance with sound engineering practice since its inception in 1998. The CIP is sound and reasonable.
- The Department continues to adequately address the need to optimize the treatment plant process design and capacity in response to changes in regulatory requirements and local conditions.
- The Department continues to assess the needs associated with pipeline, pumping and storage projects and to adjust project scope or scheduling as needed to optimize the project results and minimize impacts on water system operations and maintenance during construction.
- The changes that have been made to individual projects have been for sound reasons in accordance with good engineering practice.
- The cost of change orders to date is considered acceptable.
- The Department has implemented cost, schedule and change control procedures that are sound and reasonable.

- The Department has allowed itself the flexibility to adapt the CIP to changing conditions and requirements
- The Department effectively plans and prioritizes future improvements based on projected demands, defined needs, and minimization of adverse water system impacts during construction.
- The planned projects will allow the Department to continue to meet the requirements of the SDWA and to meet projected demands in the service area.
- The Department is in compliance with the requirements of DHS Compliance Order #04-14-96CO-022, as amended through Amendment No. 8 dated August 6, 2002.
- The CIP projects will continue to increase the reliability of the water supply, treatment, pumping, storage and distribution systems and will extend the useful life of facilities in the water system.
- With the receipt of financing proceeds assumed in the City's model (see section 5) in the second half of calendar year 2002, the schedule upon which the CIP is based can be met.



3. Cost Estimation Review

3.1. Background

As part of the 1998 Statement of Feasibility, a review of the cost estimating guidelines developed by the Department for the CIP was completed. The review concluded that the guidelines were reasonable, in accordance with sound engineering practice, and could reasonably be expected to accurately forecast costs within the planning limits required. The original 1997/1998 cost estimating guidelines were based on cost estimating techniques developed by Parsons for the Department. These were essentially formulas or unit cost equations for deriving various costs for major construction components. Empirical cost factors were developed for non-construction project activities, including cost markups based on past project programming and/or project planning experience.

The purpose of this cost estimation review is to:

- Review the original cost estimating guidelines prepared by the Department's Engineering Program Manager, as well as the actual resulting cost estimates for specific projects.
- Compare the cost estimates derived from the guidelines to actual costs to date for projects that have been started or completed.
- Review the use of the separate contingency fund established by the Department for use on the CIP.
- Review changes that have been made to cost estimating guidelines and practices since the inception of the CIP in order to improve the accuracy of cost estimates.
- Provide an opinion of the current cost estimating process, guidelines and techniques, and the likelihood that they will produce reasonably accurate estimates for the various project phases.

3.2. Cost Estimation Review

3.2.1 Review of the 1997/98 CIP Cost Estimating Guidelines

The Department provides guidelines, procedures, and definitions for how cost estimates are to be prepared in the "City of San Diego Water Department Capital Improvements Program Guidelines and Standards, Book 1", issued in December, 1998. The guidelines are to be used in the preparation of project cost estimates in order to achieve uniformity in the development of the estimates and to facilitate review by the various project participants.

3.2.2 Definition and Types of Cost Estimates

The Department's cost estimating guidelines utilize the American Association of Cost Engineers' (AACE) definition of Cost Estimate Types/Classes to categorize the different types and stages of construction cost estimates. The types of cost estimates used by the Department are:

Table 3.1. Cost Estimate Types

Type of Estimate	Class of Estimate	Design Level	Expected Accuracy	Contingency	Task Performance	
30% Submittal Estimate (Budget level of cost estimate)	"C"	30%	+30% to -15%	20%	Design Consultant Reviewed by CIP	
70% Submittal Estimate	"B"	75%	+20% to -10%	15%	Design Consultant Reviewed by CIP	
(Management directed and corrected scope of work)					Reviewed by CIP	
90% and 100% Submittal Estimate	"A"	90% and	+10% to -10%	10%	Design Consultant Reviewed by CIP	
(Definitive Estimate)	100%		.0%			
Source:	_					
(Table by Mac. Perez & Associates)						

Class "C" Cost Estimate

A Class "C" cost estimate is developed at or near the completion of preliminary design and is referred to as the Budget Level cost estimate. It is the first construction budget developed from project-specific design criteria. This estimate is submitted at 30% design completion. The framework of this estimate is based on quantities and unit price models developed from the design criteria, site layout, soils reports and the completed Predesign Report. The Class "C" cost estimate has an expected accuracy of +30% to -15% of the actual cost of construction.

Class "B" Cost Estimate

A Class "B" cost estimate is an extension of the Class "C" cost estimate. It is the interim budget cost estimate developed to conform to the latest project-specific design criteria. This estimate is submitted at 75% design completion. The framework of this estimate is based on quantities and unit price models further refined or revised assumptions from the design criteria, site layout, soils reports and the completed Predesign Report. The Class "B" cost estimate has an expected accuracy of +20% to -10% of the actual cost of construction.

Class "A" Cost Estimate

A Class "A" cost estimate is referred to as the definitive estimate or the final Engineer's Estimate. This estimate is usually independent of the earlier budget level estimates and serves as the final check on the expected construction cost of the project. This level of cost estimate is submitted at both 90% and 100% design completion. The estimate is intended to serve as the final project cost plan and as a comparison to the interim budget level cost estimate and for the Analysis of Construction Bids. The Class "A" cost estimate has an expected accuracy of +10% to-10% of the actual cost of construction.

The Department's cost estimating guidelines also recommend the following allowances be used at various stages of cost estimating in order to account for known cost items that cannot be quantified because of lack of detail:

• 30% design complete estimates: 15% allowance

• 75% design complete estimates: 10% allowance

• 90% design complete estimates: 5% allowance

• 100% design complete estimates: no allowance

3.2.3. Analysis and Opinion

Upon review of the Department's cost estimating guidelines, the Engineering Team is of the opinion that:

• The use of the American Association of Cost Engineers' (AACE) definitions for Cost Estimates Types/Classes to define and categorize types of cost estimates used by the Department is appropriate and consistent with sound and standard engineering practice.

- The use of allowances to account for known cost items that cannot be quantified because of lack of detail, and the amount of the allowances recommended at different stages of project completion, is appropriate and consistent with sound and standard engineering practice.
- Documentation for the basis of cost estimates, including drawings and specifications, equipment lists, qualifications, assumptions, exclusions, inclusions, quantity takeoffs, unit price data, use of the Engineering News Record (ENR) construction cost index (CCI) for escalation, and written price quotations from manufacturers and/or suppliers is appropriate and consistent with sound and standard engineering practice.
- The use of CSI format and divisions, and the sample format for cost estimate reports included in the guidelines is appropriate and consistent with sound and standard engineering practice.
- The level of detail for cost estimate reports required by the Department's guidelines, the list of cost items allocated as a percentage of other total cost components, the additional reports to be submitted as appropriate, and the requirement to document source material is appropriate and consistent with sound and standard engineering practice.
- The Department's guidelines for cost estimating are consistent with sound and standard engineering practice and, if followed, can be expected to produce reasonably accurate engineering cost estimates for the purposes of budgeting and forecasting construction costs within the expected accuracy.

3.3. Review Changes to the Cost Estimating Guidelines

The Department produces preliminary budget level cost estimates with the use of cost formulas listed in the Department's Program Management Plan (PMP). The PMP was completed in 1997 and was reviewed in 1998 by the Engineering Team for the Statement of Feasibility, concluding that "The cost curves can reasonably be expected to accurately forecast project construction costs within planning limits required." At that time it was understood that, as more cost data was accumulated for the CIP, the cost estimating formulas would be adjusted in accordance with this new data, since cost estimating takes place in a fluid environment, subject to many influencing forces.

3.3.1. Summary of Changes to the Cost Estimating Guidelines

Since the PMP's adoption in 1998, the Department has modified four of the cost formulas and added three additional formulas to the PMP. The original formulas, as well as the updated formulas, are summarized in Appendix C.

These cost formulas are used in the planning stages of projects. Projects that are in the design stages utilize a detailed estimating process based on material quantity take-offs. The cost formulas summarized in Appendix C are the result of additional bid information on the CIP. The results generated by these new formulas, given the limited data available, are included in Appendix C for selected sample projects.

The modified formulas produce more accurate results for the actual costs obtained recently for the CIP. These changes have resulted in closing the gap between the original planning level CIP estimates and actual costs and will result in more accurate planning estimates for the future.

3.3.2. Conclusions

The Engineering Team is of the opinion that:

- It was recognized in 1998 that modifications to the original cost formulas listed in the PMP could and should be made to adapt to an ever-changing economic environment. Modifications have been made based on updated cost information.
- The Department's modifications to the original cost formulas, upon receipt of specific bid information, are entirely appropriate as this more clearly and accurately forecasts the cost outcomes for these projects.
- The City's modified cost formulas can reasonably be expected to accurately forecast project construction costs within the planning limits required.

3.4. CIP Estimates From the 1997/98 Cost Estimating Guidelines

This section will compare the CIP cost estimates derived from the 1997/98 Cost Estimating Guidelines to the actual construction costs for specific projects. A total of sixteen specific projects were reviewed, ten of which had actual or forecast construction costs that were outside the

target accuracy of +/-10%. This review was conducted to assess the success of the Department's original cost estimating guidelines and procedures in producing estimates of acceptable accuracy. Where estimates fell outside the target accuracy, the project was specifically reviewed with the Department to assess the reasons for the variance. The projects are categorized into four major types of facility:

- Pipelines
- Pump Stations
- Reservoirs
- Water Treatment Plants

In addition to review of relevant documents provided to us by the Department, the Engineering Team also verified the facts used in the analyses in this review through interviews with CIP management personnel, particularly Jeff Weien, CIP Engineering Program Manager, and Eugene Anong, CIP Chief Estimator.

3.4.1. Comparison of the CIP Estimates Derived from the Guidelines to Actual and/or Forecast Costs to Date.

The CIP estimates for specific capital projects derived from the 1997/98 cost estimating guidelines ("CIP Estimate") were compared with actual and/or forecast costs to date ("ACT/FCST"). As defined by the CIP Engineering Program Manager, these estimates represent the "check estimate value" that the CIP Chief Estimator prepared using the design consultant's cost estimate at 100% submittal. The check estimate values listed in the 100% column of the CIP Estimate Performance to Winning Bid and Actual/Forecast Costs (see List of Documents Reviewed) were used in this review, with the exception of the two Alvarado WTP projects, which were revised as explained later in this section.

3.4.2. Pipelines

There were seven pipeline projects studied with a cumulative total CIP Estimate of \$34,394,634. The aggregate ACT/FCST cost was \$29,258,380, with a variance of (\$5,136,254), or 18% less than the forecast value.

Three projects out of the seven were outside of the target accuracy of +/-10%, and thus were reviewed in greater detail. Those projects were:

Table 3.2. Pipeline Projects Outside of the Target Accuracy

Pipelines	CIP Estimate	ACT/FCST	Variance	% Variance		
Mid-City Pipeline(Pipeline only)	\$16,933,318	\$14,168,385	(\$2,764,933)	(20%)		
Miramar Rd. Pipeline	\$12,253,645	\$9,191,054	(\$3,062,591)	(33%)		
Torrey Pines Rd. Pipeline	\$2,321,405	\$2,956,742	\$635,337	22%		
Source: Table by Mac. Perez & Associates						

Mid-City Pipeline

The CIP Estimate was for steel pipe, while the low bidder chose to bid on the concrete cylinder pipe option. The low bidder's proposal, therefore, came in significantly lower than the more expensive steel pipe option. The project opened bids in July 1999, with five bidders submitting proposals. The range of bids varied from \$14.733 million to \$24.669 million. Only the low bidder chose to submit for the concrete cylinder pipe option, the use of which is considered acceptable for a water pipeline project.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Miramar Road Pipeline

• The variance for the Miramar Road Pipeline Project was excessive because: the low bidder appeared to have underestimated and/or did not include major items of work including night work, traffic control, shoring, bonding, earthwork, trench resurfacing, and tunnel jacking representing over \$2.7 million (such work was required by the Department to be completed by the contractor under the terms of the contract);and it was a very competitive bid environment at the time bids were received.

The Miramar Road Pipeline Project opened bids in October 2000, and had ten firms submitting proposals ranging in price from \$9.2 million to \$12.7 million. The CIP Estimate was within the range of bids submitted and the Department may have benefited from a very favorable bid environment.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Torrey Pines Road Pipeline

• The variance for the Torrey Pines Road Pipeline Project was excessive because: the PVC pipe unit cost bid was higher than that projected in the CIP Estimate; additional amendments to the General Requirements were added to the project during the advertising period, totaling approximately \$200,000, that were not accounted for in the CIP Estimate; and it was a very unfavorable and non-competitive bid environment.

The Torrey Pines Road Pipeline Project opened bids in October 2001, and had only three firms submitting proposals ranging in price from \$2.7 million to \$3.3 million. The CIP Estimate was 22% below the low bidder. Several factors added greater complexity than anticipated to this relatively small pipeline project (16-inch diameter). These included constrained working conditions due to high traffic volumes along a heavily traveled roadway (which required work to be done at night during periods when traffic volumes were lower), close proximity to residential and commercial developments, and complex scheduling and sequencing requirements due to the critical nature of the roadways involved. The requirements to address these complex conditions, the cost of which was estimated at \$200,000, were added to the contract by amending the General Requirements after the CIP Estimate had been prepared. If these amendments had been properly accounted for in the CIP Estimate, the variance would have been reduced to less than 15%.

As previously mentioned, there were only three bidders for the Torrey Pines Road Pipeline Project. It is believed that the Department may have suffered from a non-favorable bid environment, and that the market price at the time was nominally 5% higher than normal.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Summary:

There were seven pipeline projects studied with three projects falling outside of the target accuracy of +/- 10%. The total variance for all pipeline projects is \$5,136,254, which is 18% below the total CIP Estimate

Further study of the three pipeline projects falling outside of the target accuracy of +/- 10% reveals reasonable explanations for the variances.

Given the foregoing, the Engineering Team is of the opinion that:

- The Department's Cost Estimating Guidelines produced pipeline cost estimates that were within acceptable limits,
- It can reasonably be expected that the Department's Pipeline Cost Estimating Guidelines will continue to produce cost estimates within acceptable limits.

3.4.3. Pump Stations

There were three pump station projects studied with a cumulative total CIP Estimate of \$5,414,476. The aggregate ACT/FCST cost was \$5,817,064, with a variance of \$402,588 or 7% greater than the CIP Estimate. Individually, all three pump station projects studied were outside of the target accuracy of +/- 10%. Those projects were:

 Table 3.3. Pump Station Projects Outside of the Target Accuracy

Pump Stations	CIP Estimate	ACT/FCST	Variance	% Variance
Del Cerro Highlands	\$806,935	\$938,131	\$131,196	14%
65th Street & Herrick	\$2,083,606	\$1,820,807	(\$262,799)	(14%)
Adobe Falls (Waring Rd.)	\$2,523,935	\$3,058,000	\$534,065	17%
Source:				
Table by Mac. Perez & Associates	S			

Del Cerro Highlands Pump Station Project

The variance for the Del Cerro Highlands Pump Station Project was due to a significant amount of field change orders issued during the project's construction. The change orders on this project were related to items that are considered by the Engineering Team to be beyond the control of the Department. During construction, equipment failure unrelated to the construction work caused flooding of the station, and the contractor was compensated for the additional expense incurred as a result (approximately \$52,300). Additionally, changed requirements from the electrical utility resulted in two change orders worth approximately \$79,000 on this project.

The Del Cerro Highland Pump Station Project opened bids in September 1998, and had five firms submitting proposals ranging in price from \$832,000 to \$1.192 million. Therefore, the CIP Estimate was within 3% of the low bidder.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

65th Street and Herrick Pump Station Project

Bids for the 65th Street and Herrick Pump Station Project came in a very favorable and competitive bid environment. The 65th Street and Herrick Pump Station Project opened bids in April 1999, and had eight firms submitting proposals ranging in price from \$1.541 million to \$1.986 million. Therefore, the CIP Estimate had a variance of less than 5% of the high bidder and 14% of the ACT/FCST cost.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Adobe Falls (Waring Road) Pump Station Project

The Adobe Falls (Waring Road) Pump Station Project opened bids in July 2001, and had five firms submitting proposals ranging in price from \$3.058 million to \$3.746 million. The CIP Estimate was 17% below the low bidder. The variance for the Adobe Falls (Waring Road) pump Station project was due to modifications to the bid package after the submittal of the CIP Estimate. These modifications significantly changed the scope of the project and increased project costs.

Subsequent to the submittal of the CIP Estimate of \$2.524 million, changes were made to the bid documents which included additional site work and General Requirement changes which increased the project cost an estimated \$410,000. When the CIP Estimate is adjusted to reflect these unaccounted changes, the estimate is revised to \$2.934 million, or an acceptable 4% variance.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Summary:

There were three pump station projects studied with all three projects falling outside of the target accuracy of $\pm 10\%$. The total aggregate variance for pump station projects is \$402,588, which on average is an acceptable $\pm 7\%$ above the total CIP Estimate.

Further study of the three pump station projects falling outside of the target accuracy of $\pm 10\%$ reveals reasonable explanations for the variances. The total variance for all pump station projects of $\pm 10\%$ is within the target accuracy of $\pm 10\%$.

The Engineering Team is of the opinion that:

- The Department's Cost Estimating Guidelines produced pump station cost estimates that were within acceptable limits,
- It can reasonably be expected that the Department's Pump Station Cost Estimating Guidelines will continue to produce cost estimates within acceptable limits.

3.4.4. Reservoirs

There were two reservoir projects studied with a cumulative total CIP Estimate of \$19,158,650. The ACT/FCST cost was \$25,750,963, with a variance of \$6,592,313, or 26% greater than the CIP Estimate.

Only one reservoir project studied was outside of the target accuracy of +/- 10%. That project was:

Table 3.4. Reservoir Project Outside the Target Accuracy

Reservoirs	CIP Estimate	ACT/FCST	Variance	% Variance	
Black Mountain	\$11,644,924	\$18,602,227	\$6,957,303	37%	
Source: Table by Mac. Perez & Associates					

The Black Mountain Reservoir Project opened bids in February 2000, and had four firms submitting proposals ranging in price from \$9.95 million to \$11.02 million. An additional sitework and yard piping capital project was added to the Black Mountain Reservoir project after the submittal of the CIP Estimate, and subsequent to contract award; thus resulting in a significant variance between actual cost and the original CIP estimate.

Considering just the cost of the reservoir contract included in the CIP Estimate, the CIP Estimate had a variance of less than 6% from the high bidder, and a variance of 15% from the low bid. The ACT/FCST cost of \$18,602,227 shown in Table 3.4 includes the cost of sitework, rock blasting and yard piping that were separate contracts, the cost of which were added to the final cost of the Black Mountain Reservoir.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST cost is reasonably explained and that

the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Summary:

There were two reservoir projects studied with only one project falling outside of the target accuracy of +/- 10%. Further study of the reservoir project falling outside of the target accuracy of +/- 10% reveals a reasonable explanation for the variance.

Given the foregoing, the Engineering Team is of the opinion that:

- The Department's Cost Estimating Guidelines produced reservoir cost estimates that were within acceptable limits,
- It can reasonably be expected that the Department's Reservoir Cost Estimating Guidelines will continue to produce cost estimates within acceptable limits.

3.4.5. Water Treatment Plants

There were four Water Treatment Plant projects studied, with a cumulative total CIP Estimate of \$100,594,943. The actual/forecast cost was \$123,834,469, with a variance of \$23,239,526, or 19% greater than the CIP Estimate.

Three projects out of the four were outside of the target accuracy of $\pm 10\%$. Those projects were:

Table 3.5. Water Treatment Plant Projects Outside of the Target Accuracy

Accuracy				
Wastewater	CIP Estimate	ACT/FCST	Variance	% Variance
Alvarado Expansion	\$43,168,400	\$49,237,000	\$6,068,600	12%
Miramar ES Phase 1	\$14,311,293	\$8,835,750	(\$5,475,543)	(62%)
Alvarado WTP - Earl Thomas Reservoir	\$22,519,000	\$25,358,732	\$2,839,732	11%
Source: Table by Mac. Perez &	- Associates			

Alvarado Water Treatment Plant Expansion Project, Phase I

The Alvarado WTP Expansion Project consists of two phases; the first phase is currently in construction, while the second phase is at 90% of final design. The Alvarado Water Treatment Plant Phase 1 Expansion Project opened bids in August, 1998, and had four firms submitting proposals ranging in price from \$35.8 million to \$41.32 million. Therefore, the CIP Estimate had a variance of less than 5% of the high

bidder and 12% less than the ACT/FCST cost. During the course of construction, field change orders were issued, raising the ACT/FCST cost to the present level of \$49.2 million. These field change orders were largely for owner-initiated changes to the project, in response to further development of the CIP as the Alvarado WTP project progressed.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST costs is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Miramar Water Treatment Plant Early Start (ES) Phase 1 Project The Miramar Water Treatment Plant Early Start (ES) Phase 1 Project opened bids in February, 2001, and had six firms submitting proposals ranging in price from \$8.836 million to \$10.04 million. The CIP

In the post-bid analysis, several reasons were given by the CIP Chief Estimator for the variance in the Miramar Water Treatment Plant Early

Estimate was 62% above the low bidder.

Start (ES) Phase 1 Project costs. The estimate provided by the consultant retained by the Department to provide design services including the preparation of plans, specifications and construction cost estimates, had the following deficiencies:

- The estimate inadvertently included \$700,000 worth of ownersupplied pipeline material,
- The estimate over-estimated the amount of pipe welding by \$1.15 million.
- The estimate over-estimated the labor costs by \$1.1 million,
- The estimate inadvertently included a contingency of \$1.28 million,
- The estimate's vard piping cost differed from the low bid by \$500,000, and
- The estimate's pump station cost differed from the low bid by \$500,000.

The sum of the cost differences, as enumerated and pointed out earlier by the CIP Chief Estimator, amounted to \$5.23 million. When the CIP Estimate is adjusted by this amount, the variance is reduced to less than 3%.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST cost is a case of substandard effort by the design consultant, and that the large variance was not caused by any fault in the Department's Cost Estimating Guidelines and that the guidelines, if properly utilized, will produce cost estimates that are within acceptable limits.

Alvarado Water Treatment Plant – Earl Thomas Reservoir Project

The Alvarado Water Treatment Plant – Earl Thomas Reservoir Project opened bids in December 2001, and had only three firms submitting proposals ranging in price from \$25.36 million to \$25.57 million. All three firms listed the same material supplier, indicating a lack of competitive bid prices from the manufacturer. There was only one material supplier available in the region for the required Tank Reservoir. Another tank constructor from out of the region elected not to bid the project. This resulted in a higher than anticipated material cost for this item. The increased reservoir material cost is estimated at \$2.25 million. When the CIP Estimate is adjusted to reflect the higher than anticipated material cost, the variance is reduced to 2%.

The Engineering Team is of the opinion that the variance between the CIP Estimate and the ACT/FCST cost is reasonably explained and that the cost estimate derived from the Department's Cost Estimating Guidelines produced a cost estimate that was within acceptable limits.

Summary:

There were four water treatment plant projects studied, with three of the four projects falling outside of the target accuracy of +/- 10%. Further study of the three water treatment plant projects falling outside of the target accuracy of +/- 10% reveals that reasonable explanations exist for the cause of the variances and/or the variances were created by consultant error.

Given the foregoing, the Engineering Team is of the opinion that:

- The Department's Cost Estimating Guidelines, if properly utilized, will produce water treatment plant cost estimates that will be within acceptable limits, and
- It can reasonably be expected that the Department's Water Treatment Plant Cost Estimating Guidelines will continue to produce cost estimates that are within acceptable limits.

Status: Final September 27, 2002

Conclusion:

The Engineering Team finds the following:

- The Department's Cost Estimating Guidelines for Pipelines, Pump Stations, Reservoirs, and Water Treatment Plants have generally produced cost estimates that were within acceptable limits.
- There were instances where projects fell outside of the target accuracy of +/- 10%.
- The reasons for projects falling outside of the target accuracy were varied, but included contract amendments made subsequent to submittal of the CIP Estimate, reporting error, consultant error, and favorable or unfavorable market conditions.
- It can reasonably be expected that the Department's Cost Estimating Guidelines, as amended, will continue to produce cost estimates that are within acceptable limits.
- There is no evidence at this time to indicate that modifications to the City's Cost Estimating Guidelines are required.

3.5. Review of the Use of the Contingency Fund

This section will review the use of the separate contingency fund established by the Department for use on the Water Capital Improvement Program.

3.5.1. Contingency Fund Use

Contingency Fund use, categorized by major facility type, is summarized as follows:

Table 3.6. Contingency Fund Use By Water Facility

,	,	•			
Water Facility Type	Authorized by City Council (1)	Earmarked by Awarding Document (2)	Used (3)	To be Earmarked (4)	Earmarked Funds Available (5)
Pipelines	\$2,364,435	\$2,134,745	\$1,104,437	\$229,690	\$1,030,308
Pump Stations	\$511,000	\$486,000	\$336,000	\$25,000	\$150,000
Reservoirs	\$645,817	\$645,817	\$362,548	\$0	\$283,269
Water Treatment Plants	\$10,109,183	\$3,858,780	\$3,215,116	\$6,250,403	\$643,664
TOTALS	\$13,630,435	\$7,125,342	\$5,018,101	\$6,505,093	\$2,107,241
Source: Table by Mac. Perez & Associates					

Explanatory Column Notes:

- (1) The amount authorized by the City Council for pooled contingency at the time the City Council authorized the construction contract.
- (2) These are funds that are obligated for the specific project.
- (3) This amount is what has been actually expended out of the obligated funds.
- (4) This is the remaining amount from the authorized funds or (1) (2).
- (5) This is the remaining balance after partial expenditures from obligated funds, or (2) (3).

From the data provided, it is apparent that water treatment plant projects use the majority of the contingency funds. Pipelines also have a significant impact on contingency fund use, with pump stations and reservoirs currently having a relatively minor impact.

Use of the contingency fund does not appear to be excessive. The contingency funds authorized by City Council are generally 5% of total estimated construction costs. The range for contingency fund use by facility is approximately 4% of construction costs for water treatment plants and 2.5% for pipelines; which is within standard engineering practice.

3.5.2. Conclusions

Upon review of the data on pooled contingency fund use, the Engineering Team believes:

- There is no evidence that any major facility program (i.e., pipelines, pump stations, etc.) is expending contingency funds that are not consistent with sound engineering practice and/or standards.
- Construction project over-runs and resultant change orders and contingency fund use are greatly dependent on the quality of the contract plans and specifications. Continued use of effective design quality control plans by design consultants will reduce design changes during construction requiring field change orders.

3.6. Final Conclusions

The Engineering Team has reviewed the cost estimating process, guidelines and techniques used by the Department and concludes that the cost estimating process, guidelines and techniques used have provided, and can continue to provide, reasonably accurate cost estimates for the purpose of budgeting, and for the various phases of a capital improvement project.

- The procedures, techniques, and directions given in the Department's 1997/98 Cost Estimating Guidelines, as amended, are consistent with sound and standard engineering practice and, if followed, can be expected to produce reasonably accurate engineering cost estimates for the purposes of budgeting and forecasting construction bids within the expected accuracies.
- Upon receipt of project specific bid information, the Department made modifications to the existing cost formulas listed in the Project Management Plan (PMP), that more accurately forecasts the cost outcomes for these types of projects. This was appropriate and in accordance with standard engineering practices.
- The Department's Cost Estimating Guidelines, since their adoption in 1998, have subsequently produced cost estimates that were within acceptable limits for major capital projects, including pipelines, pump stations, reservoirs, and water treatment plants.
- In those instances where projects fell outside of the target accuracy of +/- 10%, the reasons were varied, but did not include substandard procedures listed in the Department's Cost Estimating Guidelines.
- It can reasonably be expected that the Department's Cost Estimating Guidelines will continue to produce cost estimates that are within acceptable limits if there are no significant

- changes to the economic environment or significant technological or construction method advances.
- There is no evidence at this time to indicate that modifications to the Department's Cost Estimating Guidelines are required.
- There is no evidence that any major facility program (i.e., pipelines, pump stations, etc.) is expending contingency funds on a basis that is not consistent with sound engineering practice and/or standards.
- The programming, budgeting and cost estimating processes established in the 1997/1998 CIP Program Management Plan (PMP) are sound and have shown flexibility to adapt to changing conditions as an historical database grows with each specific project.

4. Operations and Maintenance

4.1. Introduction and Background

The evaluation of the Operations and Maintenance (O&M) programs for the Water Department included reviews of O&M costs, staffing levels, and general staff qualifications in order to arrive at an opinion of the adequacy of the Department's current and proposed future programs. The Engineering Team interviewed the management team for the Water Operations Division, reviewed budgeted and actual O&M expenditures for Fiscal Year (FY) 1998 through 2002, and reviewed current and proposed future staffing plans and competitive performance assurance programs. The Engineering Team review was performed to assess the adequacy and reasonableness of the O&M program and this section presents the results of the review.

In the 1998 Statement of Feasibility, the Operations and Maintenance section focused extensively on the comparison between the Department's O&M budgets and staffing levels and the budgets and staffing levels at other water facilities. This process is called benchmarking, which is a systematic method of numerically comparing performance parameters of an individual utility to other comparable utilities. The other facilities used in the previous evaluation were comparable in size to the Department's water system and treatment facilities and were operated by utility agencies and municipalities in the western and southwestern United States. The 1998 Statement of Feasibility reached the conclusion that the O&M costs and the staffing levels for the Department were well within the average of the utilities surveyed.

The 2001 San Diego Water Department Management Review Study prepared by Black & Veatch (the 2001 Study) was undertaken at the direction of the City Council prior to approving a series of water rate increases and focused on several specific areas, including Water Operations & Maintenance and Benchmarking. The 2001 Study found the performance of the Department fell in the middle of the range for other similar sized municipal water systems.

The updated benchmark findings of the 2001 Study confirmed that the conclusions of the 1998 Statement of Feasibility, in regards to the Department's O&M costs and staffing levels being comparable to other similar utilities, were still valid. Therefore, this section of the 2002 Statement of Feasibility will not update the benchmarking performed in the 1998 Statement, but will review and rely upon the results of the 2001 Study.

4.2. Operations & Maintenance Costs for Water Operations Division

The Water Operations Division of the Department has responsibility for the O&M of the water system. The Water Operations Division is under the leadership of the Water Operations Deputy Director and the Assistant Deputy Director. The Deputy Director is responsible for the following nine programs or sections:

- Systems Operations
- Water Construction
- Water Systems Engineering
- Lakes and Recreation/Reservoir Management
- Water Laboratory
- Safety Program
- Stormwater/Watershed Management
- Public Information
- Administration Support

The two programs that have primary responsibility for O&M of the water system are the Systems Operations Program and the Water Construction Program.

The Systems Operations Program is under the leadership of a Program Manager who is responsible for the Treatment Plant Operations, Facility Maintenance, Distribution Operations/Power & Control, and Computerized Maintenance Management departments. This program is primarily responsible for the operations and maintenance of the treatment plants and the operation of the water transmission and distribution system.

The Water Construction Program is under the leadership of a Program Manager who is responsible for the maintenance and repair of the water distribution system (e.g., water main break repair, water service installations, valve maintenance, etc.), repair of the water transmission system (water main break repair only), and construction activities to support the projects in the CIP Program (e.g., highline installation/removal, cut & plugs, service connections, etc). The Water Construction Program is divided into three sections responsible for the southern Council Districts, the northern Council Districts and support for the CIP Program.

4.2.1 Present Costs

The actual and budgeted costs for the Water Operations Division were obtained from City staff for FY 1998, 1999, 2000, 2001, and 2002. Table 4.1 presents a summary of the operations cost and the variance between the actual and budget costs. Included are personnel, non-personnel, fuel and utilities, and chemical costs for the Division. The cost of purchasing raw and treated water from the San Diego County Water Authority are budgeted separately and are not included. Also not included are non-commodity charges (infrastructure access charges, readiness-to-serve charges, payments in-lieu-of-taxes, operating reserve costs, bond debt service payments and monies allocated to CIP projects.

Table 4.1. Operations Cost Summary

Operations Cost	FY 1998 ¹	FY 1999 ¹	FY 2000 ²	FY 2001	FY 2002 ³
Budget	\$57,664,217	\$57,249,021	\$85,945,910	\$83,834,415	\$86,330,593
Actual	\$60,150,184	\$68,613,359	\$87,379,094	\$87,910,575	\$86,368,259
Difference	(\$2,485,967)	(\$11,364,338)	(\$1,433,184)	(\$4,076,160)	(\$37,666)

¹Water Operations Division was formed in FY 1999. Prior to this, there were two divisions (Water Distribution and Water Production). The two divisional budgets and actuals are combined in FY 1998.

Source: (Table by Damon S. Williams Associates)

While the Water Operations Division exceeded its budget in each of the fiscal years presented in Table 4.1, the Division overage is less than 5 percent of the yearly budget, with the exception of FY 1999. The

²In FY 2001 the Enterprise Management Fund activity was transferred to the Water Operations Division from the Management Services Division. The FY 2000 budget was increased by \$22,347,559 to add FY 2000 Enterprise Management Fund costs in anticipation of the FY 2001 budget.

³FY 2002 actual costs are estimates based upon unaudited fiscal year ending financial status reports as of June 30, 2002. Actuals are subject to final adjustments by the City Auditor.

Division budget overage is a result of small surpluses and deficits in the hundreds of budget activity accounts. The surpluses and deficits are considered reasonable in that there arise during a given year circumstances that are unforeseen and beyond the control of the Department when the budgets are set. For example, energy costs and chemical costs are subject to market forces and the actual volume of water treated is subject to customer demand. Reasonable projections are made during the budgeting process but the Department must accommodate actual conditions throughout a given year to provide water for its customers.

Table 4.1 also shows that the FY 2002 actual operations cost virtually matches the budget amount. From FY 2001 to FY 2002 there was a 40% drop in the number of water main breaks, a direct result of the water pipeline replacement program in the CIP. This had a direct impact on the Division expenditures due to less required overtime to fix breaks.

The budget overage in FY 1999 was the result of unanticipated expenditures in four categories. The Water Department paid a settlement of \$2,750,000 related to a traffic accident involving a Water Operations Division employee, equipment, and vehicle. The magnitude of this settlement caused the \$1,200,000 Claims and Liability budget to be insufficient to cover this particular claim in addition to the other claims received in the fiscal year. The second category included an unbudgeted charge of approximately \$2,130,000 as a result of the County Water Authority infrastructure access charge starting in January 1999. The Department began budgeting for the infrastructure access charge in FY The third budget overage category included approximately \$1,800,000 in Management Information Systems (MIS) activity. This deficit occurred for several reasons, including overruns in program enhancements, new projects and/or requirements that were not budgeted, and added requirements for divisional moves and increased performance. The last major category of budget overruns included Communications and Right-of-Way activity, with an approximate overrun amount of \$1,650,000. This budget activity includes property rental and right-of-way fees, support services billed by other City departments, and other miscellaneous Water Department expenses. The main contributors to the budget overrun in this category were higher than anticipated property rental costs, safety program costs, support and service charges from other City departments. The remainder of the FY 1999 budget overage was due to miscellaneous items, primarily unbudgeted overtime.

Status: Final September 27, 2002

4.2.2 Projected Costs

As described in Section 1.5 of this Statement of Feasibility the CIP includes significant treatment process upgrades and capacity expansions for the three WTPs. In addition to the treatment plant upgrades and capacity expansions, the CIP projects will add new pumping plants, storage reservoirs, and water transmission and distribution lines.

There are five fundamental driving forces behind expanding and upgrading the water system. The first is to meet the service needs of the City's continuing growth in population. The second is to upgrade the treatment and distribution facilities to meet the increasing stringent standards of the SDWA. The third is to replace or renovate the deteriorated physical components of the water system that are inflating the O&M costs of the Water Operations Division. The fourth is to increase the use of reclaimed water as an alternate water resource in order to reduce the demand for imported water. The fifth is to meet the requirement of the DHS Compliance Order.

The projected O&M costs are expected to increase annually based upon normal escalation factors of 3 to 4% for the planning period. The Engineering Team reviewed the Water Operations Division's projected O&M costs for the planning period and found them to be reasonable.

The projections anticipate the cost impacts due to the expansion and upgrade of the water system and reflect the significant improvements to the water system that will reduce the O&M cost impact. The aging process equipment at the three treatment plants is being replaced by equipment that is more automated and requires less labor to operate and maintain. The water system will also benefit from the installation of advanced computer control technology in the treatment plants. These state-of-the-art systems will allow more automated control of the plant. The water distribution system will have a Supervisory Control and Data Acquisition (SCADA) system that automatically controls and monitors the remote reservoirs, pump stations, and control valves. The treatment plant control systems will be connected to the distribution system SCADA to provide the Water Operations Division the capability to operate and maintain its extensive water system in a cost-effective manner.

The Department anticipates that certain projects in the CIP will reduce O&M costs to repair water main breaks. The Division has seen a significant reduction in breaks as the aging, deteriorated water mains are replaced. It is expected the number of breaks will continue to decrease as additional mains are replaced in the planning period.

4.3 Operations & Maintenance Staffing for Water Operations Division

4.3.1 Present Staffing Needs/Levels

The number of full time equivalent (FTE) positions in the Water Operation Division for FY 2000, 2001, and 2002 is presented in Table 4.2.

Table 4.2. Staffing Level Summary

Water Operations	FY 2000	FY 2001	FY 2002			
Division FTE Positions	464	487	488			
Source: Table by Damon S. Williams Associates						

The 5% increase in FTEs between FY 2000 and FY 2002 appears reasonable given the growth in the water system and the improvements constructed under the CIP to date. The staffing level is reasonable and adequate to operate facilities efficiently.

4.3.2 Projected Staffing Needs/Levels

The Engineering Team reviewed the Water Operation Division's projected staffing levels for the planning period and found them to be reasonable. One area in which the Division believes it is understaffed is the number of operators for the three water treatment plants. Currently, a total of 18 operators plus 6 frontline supervisors are responsible for staffing the 24-hour per day, seven day per week operation of three plants. The 2001 Study benchmarking confirms the extremely lean operator staffing of the treatment plants. The Division is in the process of adding 3 operators in order to provide better shift coverage and reduce overtime. The Engineering Team agrees that the additional operator staffing is reasonable, especially considering the 52% increase in water treatment capacity that will occur as a result of the CIP. The Department is under a mandate by the City Council not to add staff without Council approval. Additional staff required to operate and maintain the water system must be presented to the Council for approval.

4.4 Water Operations Division Initiatives

There are several notable initiatives that the Water Operations Division is undertaking to strengthen its position in operating and maintaining the water system.

4.4.1 Bid-to-Goal Program

The Water Operations Division, in conjunction with the Financial Management Department Optimization Program, began working in 2001

on the Bid-to-Goal (BTG) Program. The City has had success in BTG at its Metropolitan Wastewater Department. The BTG program will establish credible and defensible performance targets and goals that are acceptable to both the employees of the Water Operations Division and the City Council and City Manager. Performance and pricing data will be drawn from both the public and private sectors that operate and maintain water systems. BTG will establish benchmarks to measure the Water Operations Division performance against the agreed-upon targets and goals. It also will establish an employee gainsharing program for the employees if the targets and goals are met or exceeded.

It is anticipated the BTG program will span three fiscal years before it is fully implemented in FY 2005. BTG has received conceptual approval from the labor unions and the labor relations board. Based upon BTG's viability in the Metropolitan Wastewater Department and other water agencies, it appears the program, when fully implemented, will be adequate to maintain the O&M costs well within the average of similar utilities.

4.4.2 Water Systems Technician Series of Classification

The Water Systems Technician (WST) series of classification will condense 16 existing work classifications into 6 broader classifications. The WST series will also compress 4 supervisory classifications into 2 levels, which will broaden the span of control for a supervisor. The key concept behind the WST series is to provide greater flexibility in the daily O&M activities while providing the workers with a broader and more complex skill set. In order to perform more diverse tasks and perform them more efficiently, increased training for the operators and maintenance workers and a formal rotation plan are included in this program. The training program will also incorporate the additional training needed by the water distribution system workers in order to allow them to become certified in accordance with the State of California mandatory requirement implemented on January 1, 2001. There is a seven-year window for the water distribution system workers to come into compliance with this requirement.

The concept planning for the WST series of classification started in 1999 and it has been approved by the City Council and appropriate City agencies and commissions. It is anticipated the Water Operations Division will have fully implemented the WST series by FY 2006. While it is expected that implementing the WST series will increase O&M budgets in the near term due to higher worker pay classifications, it is anticipated the higher wage rates will be offset by increased worker productivity.

4.5 Conclusions

Based upon the information provided by the City, the following conclusions have been reached:

- The O&M costs for the City of San Diego Water Department appear reasonable. The Department has met its budgeted O&M cost targets reasonably well within the past five years and appears to be able to continue to do so in the future. The Department operates and maintains the water system well within the average cost benchmarks of similar utilities.
- The Department falls within the range of other similar utilities in regards to O&M staffing.
- The treatment plant operators are required to obtain appropriate levels of State of California certification as dictated by their duties. The water distribution system operators will also be required to obtain appropriate levels of certification by 2008. Overall, it appears that the O&M staff is adequately experienced and receives appropriate training.
- The Department appears to be a progressive water utility that is committed to a process of continuous improvement in operating and maintaining its extensive, complex water system.
- The qualifications, training and continuing competency requirements that the Operations and Maintenance staff must satisfy are adequate to provide appropriately qualified personnel to operate the water treatment and distribution systems and the reclaimed water system.

5. City Financial Projections

The City has developed and uses a financial planning model to produce financial projections that test and evaluate different financial scenarios for its planned CIP and related financing. This section discusses the review that was undertaken and the resultant opinion of the adequacy of the City's financial projection process.

We have reviewed the City's model and financial projections through discussions with the City's financial staff; reviewing principal assumptions and input data for the model; and evaluating results produced by the model. We did not review the equations, algorithms, or resulting program functions that comprise the model, nor did we independently check the model by calculating financial estimates and comparing the results to those in the City's model output. A summary of our review, findings and conclusions is presented in this section.

5.1. Description of the City's Model

The City's financial model was developed by Brown and Caldwell Consulting Engineers, beginning in fiscal year 1990, and has been modified and updated over time by the City Treasurer's staff in consultation with various financial advisors. The model is capable of calculating estimates using diverse input variables, allowing the City to run sensitivity analyses for different variables, and to optimize the model for key financial objectives or parameters such a debt coverage ratio.

The model is large and complex, and appears to incorporate applicable financial elements of the City's Water Department operations, including revenues, interest income, expenditures, sources and uses of capital funds, reserve account transactions and balances, rate increase by customer category, debt service and debt coverage ratios, population and inflation growth estimates, water conservation and reclaimed water reuse impacts, interest rates and asset accounts.

Based on our interviews, City staff used the model to run scenarios evaluating the rate increases approved by the City Council in April 2002, which included rate increases that average 6% per year across user

classes for the next 5 years. We reviewed preliminary model runs, as well as the final model run dated September 27, 2002, which resulted in the financial projections presented in this review. Because the CIP and its financing are spread out over several years, the City has flexibility in delaying or modifying capital expenditures should revenue shortfalls occur, subject to modification to the schedule contained in the Department of Health Services Compliance Order, as amended.

The City's financial projections used in our review are summarized in Tables 5-1 through 5-5. All financial projections extend through FY 2007. The tables presented contain information from five of the 22 tables contained in the City's model.

5.2. Water Rate Requirements

For ten years prior to August 1997, water rates were regularly increased to compensate for increases in the cost of water purchased from the CWA, however capital projects were funded from available net income. This policy was largely the product of the Council's concern about the impact of water rate increases on an already depressed local economy which was also struggling with the impact of long-term drought and a call for voluntary conservation.

On August 12th, 1997, the Council adopted a series of water rate increases for fiscal years 1998, 1999 and 2000. The adopted water rate increases were designed to increase revenues generated by retail water sales within the City by 6% per year. At the time of the adoption of these rate increases, it was contemplated that additional increases would be required in subsequent years in order to provide continued funding for the CIP.

On April 30, 2002, the City Council adopted a five-year plan for water rate increases, beginning on July 1, 2002. Revenues are projected to increase by 6% per year for each of the five years ending July 1, 2007. The application of the rate increase to different classes of users will produce differing impacts on the classes, with an average increase of 6% across all user classes.

Because the rate increase plan covers a period of 5 years, through FY 2007, future increases in Water Department operating revenues for the CIP planning period can be forecast based on assumptions regarding the volume of water to be sold over this time. Sales of water to single family domestic users are projected to increase by 1.1% over the five-year

TABLE 5-1 SUMMARY CITY OF SAN DIEGO WATER REVENUE FUND REVENUE, EXPENDITURES, CASH BALANCES, ETC.

(Escalated Dollars in Thousands)

		P	ROJECTED		
DESCRIPTION	2003	2004	2005	2006	2007
	=======================================	======= =:	======= ==	======= ==	======
Revenue					
Balance from Prior Year	7,846	178,402	91,947	23,036	74,082
Bond Proceeds	193,418	0	0	121,189	0
Sale of Water	209,164	226,612	243,129	261,674	283,228
Sale of Reclaimed Water	2,050	4,019	5,514	7,601	8,006
Water System Capacity Charges	16,902	16,522	16,894	16,574	16,578
Grants	3,632	1,600	0	0	0
Interest Earnings	14,275	8,935	8,776	12,423	9,356
Other Revenue	33,122	27,957	16,805	15,568	17,862
Total Revenue	480,409	464,047	383,065	458,065	409,112
Expenditures					
Capital Appropriations	52,995	110,929	86,462	92,034	90,277
Water Purchases	104,349	107,102	109,081	113,052	117,913
Operating and Maintenance Expenses	116,440	120,331	125,655	131,047	136,384
Debt Service	27,150	34,826	34,826	42,924	47,537
Other Expenditures	1,073	(1,088)	3,315	3,544	3,696
Total Expenditures	302,007	372,100	359,338	382,601	395,807
Unrestricted Balance	178,402	91,947	23,727	75,464	13,306
Restricted Accounts					
Operating Reserve	19,375	19,856	20,513	21,179	21,838
Water Purchase Reserve	10,435	6,426	6,545	6,783	7,075
Debt Service Reserve	47,224	47,224	47,224	57,300	57,300
Restricted Balance	77,034	73,506	74,282	85,262	86,212
Year End Cash Balance	219,826	195,475	183,066	173,745	177,991
Total Debt Issuance	603,290	603,290	603,290	738,225	738,225
SFD Monthly Bill, 14 HCF	\$32.14	\$34.35	\$36.64	\$39.32	\$42.27
General Rate Increase, Percent	10.93%	10.25%	9.80%	9.35%	9.05%
Overall Rate Increase, Percent	6.88%	6.88%	6.68%	7.32%	7.50%
Capacity Charge, EDU	\$2,000	\$2,000	\$2,000	\$2,000	\$2,000
Increase, Percent	0.00%	0.00%	0.00%	0.00%	0.00%

TABLE 5-2 CITY OF SAN DIEGO WATER REVENUE FUND OPERATING REVENUES AND EXPENSES

(Escalated Dollars in Thousands)

		F	PROJECTED		
DESCRIPTION	2003	2004	2005	2006	2007
	=======================================	=======================================			=======
OPERATING REVENUES	000 404	000 040	040 400	004.074	000 000
Sale of Water	209,164	226,612	243,129	261,674	283,228
Service Charges Fire Hydrant Rentals	445 0	453 0	462 0	471 0	480 0
Land and Building Rentals	3,530	3,597	3,665	3,735	3,806
New Water Services	1,469	1,497	1,525	1,554	1,584
Refund of Prior Years' Expenditures	0	0	0	0	0
Services Rendered Other Funds	0	0	0	0	0
Services Rendered to Others	7,376	7,516	7,659	7,804	7,953
Recreation Program and Fees	1,109	1,130	1,152	1,173	1,196
Other Revenue	362	369	376	383	390
Reclaimed Water Sales	2,050	4,019	5,514	7,601	8,006
TOTAL OPERATING REVENUE	225,505	245,194	263,482	284,396	306,642
OPERATING EXPENSES					
Water Purchases	104,349	107,102	109,081	113,052	117,913
Operation and Maintenance Expenses	116,440	120,331	125,655	131,047	136,384
TOTAL OPERATING EXPENSES	220,789	227,433	234,736	244,099	254,297
OPERATING INCOME	4,716	17,761	28,746	40,297	52,345
OTHER INCOME (CHARGES)					
Prior Year Encumbrances Cancelled	2,000	2,000	2,000	2,000	2,000
Sale of Discarded Materials and Facilities	18	18	19	19	19
Sale of Sand and Gravel	0	0	0	0	0
Interest Earnings (a)	9,740	4,153	5,678	5,352	5,276
Damages Recovered	310	316	322	328	334
Water Main Area Charges	16.003	16.522	0	0 16 574	16.570
Water System Capacity Charges Sale of Land	16,902 367	16,522 100	16,894 100	16,574 100	16,578 100
Rate Stabilization Fund Transfer	6,000	9,000	0	0	2,000
Nate Stabilization Fund Transfer					
TOTAL OTHER INCOME	35,337	32,109	25,013	24,373	26,308
NET REV. AVAIL. DEBT SVC.	40,053	49,870	53,759	64,671	78,654
ADDITIONAL CHARCES					
ADDITIONAL CHARGES	(46)	480	657	666	659
Contribution to Operating Reserve Contribution to Secondary Purchase Reserve	(46) (1,228)	(4,009)	119	238	292
Emergency Reserve	(1,220)	(4,009)	0	0	0
Net Debt Service (Less DSRF Interest)	25,606	32,584	32,584	40,217	44,791
Addition to Continuing Appropriations	0	4,916	0	0	11,119
Incr./(Decr.) in Desig. for Future Yr Exp.	26,814	(166,481)	(81,328)	(19,099)	(80,273)
Addition to Accd Ann. Lv. and Sick Lv.	0	O O	O O	O O	O O
SRF Debt Service	0	0	691	1,382	1,382
Unallocated Reserve	2,347	2,441	2,539	2,640	2,746
	53,494	(130,068)	(44,738)	26,044	(19,284)
NET REVENUE AVAIL. FOR SYS. ASSETS	(13,441)	179,939	98,497	38,626	97,938

TABLE 5-3
CITY OF SAN DIEGO • CONSOLIDATED WATER CAPITAL FINANCING

(Escalated Dollars in Thousands)

		PI	ROJECTED		
DESCRIPTION	2003	2004	2005	2006	2007
Consolidated Capital Expend. Less Inelgible for Financing	115,111	108,012	104,024	102,274	81,158
(1) Prior Year Construction	0	0	0	0	0
(2) Grant Receipts & Cont. In Aid	3,335	1,600	691	1,382	1,382
(3) Other Inelgible	21,699	11,762	5,525	4,000	3,539
Net Financeable	90,077	94,650	97,808	96,891	76,236
Consolidated % Debt Financed	70.00%	70.00%	70.00%	70.00%	70.00%
PAY-AS-YOU-GO EXPEND.	27,023	28,395	29,342	29,067	22,871
AMOUNT DEBT FINANCED	63,054	66,255	68,466	67,824	53,365
TOTAL EXPENDITURES	90,077	94,650	97,808	96,891	76,236
SOURCE OF DEBT					
Bond Issue	218,290	0	0	134,935	0
Commercial Paper + Earnings on Construction Fund	2,991	2,540	856	4,364	1,334
Construction Fund Drawdown	0	143,742	80,026	12,416	70,145
TOTAL SOURCES	221,281	146,281	80,882	151,715	71,480
USE OF DEBT					
Current Year Capital Expenditures	49,626	66,255	68,466	67,824	53,365
Commercial Paper Takeout	0	0	0	0	0
Reimb. for Prior Year Capital Expenditures	19,182	0	0	0	0
Debt Service Reserve Fund	21,850	0	0	10,076	0
Issue Costs	3,022	0	0	3,670	0
Construction Fund	143,742	80,026	12,416	70,145	18,114
TOTAL USES	237,422	146,281	80,882	151,715	71,480
Debt Service Reserve Fund Balance	46,446	46,446	46,446	56,523	56,523
Earnings on Debt Service Reserve Fund	1,543	2,242	2,242	2,707	2,746
Earnings on Funds Awaiting Expenditure	2,991	2,540	856	4,364	1,334
PRINCIPAL REPAYMENT					
Annual Debt Service	27,150	34,826	34,826	42,924	47,537
Principle Repayment	7,055	7,640	7,950	8,285	13,305
Debt Outstanding	627,798	622,698	615,604	746,618	734,647

TABLE 5-4
CITY OF SAN DIEGO WATER REVENUE FUND
GROWTH ESTIMATES AND FINANCIAL PARAMETERS

			PROJECTED -		
DESCRIPTION	2003	2004	2005	2006	2007
GROWTH ESTIMATES (a)	=======================================	======= :	=======	======= :	========
Population, City of San Diego Cumulative Percentage Change	1,271,858 11.26%	1,288,225 12.69%	1,304,801 14.14%	1,321,591 15.61%	1,339,342 17.16%
Projected Permit Activity (EDU's Sold)	8,301	8,261	8,447	8,287	8,289
INTEREST RATES					
Earnings on Fund Balance	2.00%	2.00%	3.00%	3.00%	3.00%
Municipal Bond Rate	4.85%	4.85%	4.85%	6.00%	6.00%
BOND TERM	30	30	30	30	30
INFLATION FACTOR	1.000	1.040	1.082	1.125	1.170
In-lieu Taxes	\$1,105	\$1,215	\$1,337	\$1,437	\$1,545
WATER PURCHASES (AF)	205,826	206,960	208,552	210,690	212,834
COST OF PURCH. WATER (\$/AF)	\$484	\$490	\$495	\$508	\$525
COST OF PURCH. RECL. WATER (\$/AF)	\$0	\$0	\$0	\$0	\$0
COST OF PURCH. REPUR. WATER (\$/AF)	\$0	\$0	\$0	\$0	\$0

NOTES:

⁽a) - Source: Fiscal Year 1994 - 2001, City of San Diego Planning Department; Fiscal Year 2002 through 2007, based on historical increases which are more conservative than the SANDAG Regional Growth Forecast.

TABLE 5-5 CITY OF SAN DIEGO WATER DEMAND AND MARKET COMPOSITION

		P	ROJECTED		
DESCRIPTION	2003	2004	2005	2006	2007
WATER SALES (Earned Sales in Millions of Cubic I					
Single Family Domestic	3,429.3	3,446.7	3,471.8	3,504.7	3,539.9
Other Domestic	2,280.8	2,292.5	2,309.1	2,331.0	2,354.5
Commercial	3,168.0	3,184.2	3,207.3	3,237.7	3,270.3
Industrial	448.9	451.2	454.5	458.8	463.4
Outside City Services	16.0	16.1	16.2	16.3	16.5
Other Utilities	612.1	615.2	619.7	625.5	631.8
Irrigation Districts					
Total, Water Sales	9,955.1	10,005.8	10,078.6	10,174.2	10,276.4
WATER CONSERVATION (% Of Normal Consumpt	ion Based o	n 1989 Usage <i>i</i>	Adjusted for G	Growth)	
	8.80%	9.50%	10.00%	10.30%	10.60%
METER SIZE DISTRIBUTION					
Less than 1 Inch	226,991	229,912	232,870	235,867	239,035
1 Inch	19,643	19,895	20,151	20,411	20,685
1 1/2 Inch	10,349	10,483	10,618	10,754	10,899
2 Inch	11,782	11,933	12,087	12,242	12,407
3 Inch	329	333	338	342	347
4 Inch	402	407	413	418	423
6 Inch	221	224	227	229	233
8 Inch	111	113	114	116	117
10 Inch	38	39	39	40	41
12 Inch	2	2	2	2	2
16 Inch	1	1	1	1	1
Total, City Water Meters	269,870	273,342	276,860	280,422	284,189
SINGLE FAMILY ACCOUNTS	215,691	218,467	221,278	224,125	227,136
RECLAIMED WATER SALES (Millions of Cubic Fee	t)				
North City and San Pasqual	120.7	184.6	273.4	348.5	359.4
South Bay	21.8	43.6	43.6	130.7	152.5
RECLAIMED WATER METER SIZE DISTRIBUTION					
1 Inch and Smaller	1	1	1	1	1
1 1/2 Inch	2	2	2	2	2
2 Inch	266	286	306	306	306
3 Inch	0	0	0	0	0
4 Inch	10	10	10	10	10
6 Inch	2	2	2	2	2
8 Inch	1	1	1	1	1
10 Inch	1	1	1	1	1
12 Inch	0	0	0	0	0
16 Inch	1	1	1	1	1
Total, City of San Diego Reclaimed Water Meters	284	304	324	324	324

period, while commercial/industrial use is expected to increase by 1.5% over the same period. Overall, potable water sales are projected to increase by 3.3% over the five-year period, while reclaimed water sales are projected to increase nearly four-fold as a result of concerted efforts to promote the use of reclaimed water by commercial users.

5.3. Model Assumptions

The financial projections presented by the City for review are based on the following key assumptions:

- All projects contained in the CIP, plus reimbursements for prior eligible projects, plus continuing expenditures for other, non-CIP Water Department projects, are included in the projections.
- Rate increases authorized by the City Council are included for Fiscal Years 2003 through 2007.
- A total of \$318,964,000 in project costs will be financed via a series of issues of long term installment obligations through 2007. An interest rate of 4.85% for the bonds issued in 2003 and 6% thereafter was used for these issues, with 30-year amortization periods for each.
- Funds are included for an operating reserve, unallocated reserve, rate stabilization fund, emergency reserve and water purchase reserve.
- Interest earnings on fund balances are assumed to be 2% in FY 2003 and 2004 and 3% per year thereafter.
- Annual cost escalation factors for expenditures were assumed at 4% for 2002 through 2007.
- The CIP projects are completed in accordance with the schedules and cost estimates set forth in section 2.
- Population growth between 2002 and 2007 totals an estimated cumulative 6.6% (83,642 increase on a 1,255,700 base).
- Beginning in FY 2004, the City's estimates for water purchases are based on a normal percentage of about 94% of the City's total water requirements being purchased from the CWA. A purchase reserve is

maintained to allow the City to purchase up to 100% of its water in a given year should extreme circumstances require.

- The cost of purchased water has a significant impact on annual operating costs. The cost escalation factors for purchased water were derived by the City based on the long term agreement with the CWA. In 2007, estimated water purchase expenditures of \$117,913,000 represent over 46% of the total annual operating (non-capital, non-debt service) expenditures.
- A homeowner's cost for water service and water consumption, assuming 14 HCF of consumption, will increase by \$10.30, from \$31.97/month in July 2002 to \$42.27/month in 2007, based on the approved rate increases.
- The City's initiative and ongoing program to distribute and sell reclaimed water is estimated by the City to generate \$8,006,000 of revenue in 2007. The total 2001 sales were \$2,496,000. Use of reclaimed water reduces the amount of imported- water purchases.

Based on our review, the assumptions made to produce the financial model results presented in Tables 5-1 through 5-5are reasonable and appropriately conservative, for the purposes of this analysis. It is important to note that neither the City nor the Engineering Team makes any representations that the assumptions will in fact occur. In addition, while we believe that the information provided to us by the City is reasonably accurate from a materiality perspective, we have not independently verified such information and cannot provide any assurances as to its accuracy and completeness. It can be anticipated that actual future conditions will vary from those assumed in the model, and the actual results will vary from the forecast projections.

5.4. Conclusions

The Engineering Team reviewed the City's financial model, assumptions used in the model, the Water Department's CIP and associated schedule, and the results of the model run presented in Tables 5-1 through 5-5. Based on this review, we have reached the following conclusions and opinion:

 The City's overall assumptions and basis for the assumptions are reasonable. The financial projections presented by the City

- accurately summarize costs and revenue by source and function through 2007.
- The results of the financial projections appear to be achievable, based on the information and conditions presented at the present time. Annual operations and maintenance costs are reasonable and are estimated to increase at rates that are appropriate based on recent historical inflationary trends. Revenue projections are based on rate increases through 2007 that have been approved by the City Council.
- The use of capital funds and the acquisition of these funds through revenue bond sales are based on the CIP cost estimates and schedule.

List of Documents Reviewed

- 1. Water Department Briefing Binder, 2001, Miscellaneous Materials
- 2. Water Department Annual Financial Report, 2001
- 3. CIP Project Summary Sheets, May 2002
- 4. Service Level Agreements, FY 2002 prepared by Business Operations Section
- 5. Financial Information Prepared for the Management Review, Notebook #170M
- 6. FY 2001 FMIS Detailed Line Item Budget, Notebooks 171M and 172M
- 7. FY 2001 FMIS Detailed Line Item Budget, Notebooks 171M and 172M
- 8. Water Department Guidelines and Standards, Water CIP, Seven volumes:
 - General Design Guidelines
 - Facility Design Guidelines
 - Standard and Guide Details
 - Standard and Guide Specifications (2 Volumes)
 - CADD Standards
 - Construction Administration Guide
 - Recycled Water System Guidelines
- 9. Updated Water Reclamation Master Plan, John Powell & Associates, Dec. 2000
- 10. Water Department Studies & Key Measures Prepared for Management Review
- 11. Competitive Assessment Report on the Water Distribution System, City of San Diego Water Department, 4/14/99
- 12. Evaluation of Cost Analysis and Estimating, Engineer's Statement of Feasibility for CIP, City of San Diego, 10 February 1998, Mac. Perez & Associates
- 13. Engineer's Statement of Feasibility, City of San Diego, June 1998, O'Brien & Gere Engineers, Inc.
- 14. Monthly Progress Reports, Capital Improvements Program, City of San Diego Water Department
 - June 2002
 - May 2002
 - April 2002
 - March 2002
 - February 2002
 - December 2001-January 2002
 - November 2001
 - October 2001
 - September 2001
 - June 2001
- 15. Comparison of Original Expenditures vs Modified, Water Department Capital Improvements Program Master Installment Purchase Agreement-Exhibit A (10 pages)
- 16. CIP Estimate Performance to Winning Bid and Actual/Forecast Costs, 4/26/02
- 17. MEMORANDUM, City of San Diego, November 19, 2001. Subject: Miramar WTP Early Start Improvement Project, Phase 2 CIP-732842, Construction Cost Estimate (100%) W/attachments
- 18. MEMORANDUM, City of San Diego, January 14, 2002. Subject: Reservoir Quality Improvements (San Vicente Reservoir), CIP-732910, 100% Cost Estimate W/attachments
- 19. Water Fund Capital Improvement Program Water Strategic Plan Compared to Current Program (Print date: 6/4/02)

- 20. Water Department Capital Improvements Program Detail Monthly Cost Reports for April 2002 (319 pages)
- 21. San Diego Water Department Management Review Study, Black & Veatch Corporation, October 2001
- 22. Water Department Rate Case model, dated September 27, 2002
- 23. City of San Diego Managers Report by Richard Mendes dated January 9, 2002
- 24. City of San Diego Water Systems Technician Implementation Process Update PowerPoint presentation dated June 2001
- 25. Competitive Assessment Report on the Water Distribution System, City of San Diego Water Department, April 14, 1999
- 26. City of San Diego Water Department Operations Division Bid to Goal Program PowerPoint presentation dated 2002
- 27. Exhibit A Scope of Work, San Diego Water Department Water Operations Division Bid to Goal Development and Implementation HDR Engineering, Inc., May 24, 2002
- 28. Budgeted versus Actual Expenditure Summary for Fiscal Years 1998 through 2002 for the City of San Diego Water Department/Operations Division
- 29. City of San Diego Water Department/Operations Division May 10, 2002 Updated Organizational Chart
- 30. City of San Diego Service Efforts and Accomplishments document, Water Department section (pp. 113 130), April 2002
- 31. Otay Water Treatment Plant Competition Performance information, Actual Fiscal Year 1999 and Estimated Fiscal Year 2000 Table 1
- 32. Otay Water Treatment Plant Competition Performance information, Actual Fiscal Year 2000 Annual Performance Report
- 33. City of San Diego Water Department Studies and Key Measures prepared for the Management Review, undated
- 34. City of San Diego Water Department/Water Operations Division Data Binders, Volume II: Work Standards, Performance Measures and Safety, undated

Comparison of Original (1998) and Current CIP

SUMMARY	ORIGINAL	CURRENT	
	1998 Estimate	2002 Estimate	Increase
	FY 1999-2007	FY 1999-2007	(Decrease)
TOTAL	778,225,431	899,701,892	121,476,461
		PERCENT	16%

	CURRENT CIP 2002 ESTIMATE	ORIGINAL RATE CASE	ORIGINAL RATE CASE	CURRENT P3 F209	CURRENT P3 F209	ORIGINAL 1998 Estimate	CURRENT 2002 Estimate	Increase
732290	DESCRIPTION 65th & Herrick Water Pump Station	ES FY99	EF FY01	ES FY99	EF FY03	FY 1999-2007 1,960,944	FY 1999-2007 2,876,297	(Decrease) 915,353
732230	ostir a ricinick water r ump station	1 133	1101	1 100	1 103	1,500,544	2,070,207	313,000
733330	AA - Air Valve Adjustments	FY99	FY02	FY02	FY02	1,671,679	199,959	(1,471,720)
733100	AA - Corrosion	FY00	FY07	FY00	FY02	7,579,630	186,415	(7,393,215)
730240	AA - Freeway Relocations	FY99	FY07	FY99	FY02	1,072,158	221,425	(850,733)
709420	AA - Pooled Contingencies - RWDS	FY99	FY00	FY02	FY12	127,326	566,332	439,007
733310	AA - Pooled Contingencies - Water	FY99	FY07	FY02	FY12	102,917,242	23,568,475	(79,348,766)
709490	AA - Reclaimed Water Extension	FY99	FY06			9,118,241	0	(9,118,241)
732770	AA - Standpipes and Reservoirs	FY99	FY07	FY02	FY02	7,784,875	27,692	(7,757,183)
732300	AA - Various Lakes and Docks			FY03	FY03	0	3,351,919	3,351,919
730830	AA - Water Main Replacements	FY99	FY06	FY99	FY12	98,902,567	119,568,215	20,665,648
759250	AA - Water Meter & Vault Replacement			FY02	FY05	0	1,846,324	1,846,324
732630	AA - Water Pump Station Rehabilitations	FY99	FY03	FY02	FY12	1,679,641	659,949	(1,019,692)
709410	AA- Reclaimed Water Retrofit System	FY99	FY01	FY99	FY04	13,218,326	12,212,098	(1,006,229)
732614	Alvarado WTP - Phase 1A - Earl Thomas Reservoir			FY02	FY06	0	33,772,130	33,772,130
732610	Alvarado WTP Expansion Phase 1	FY99	FY07	FY99	FY03	103,526,048	62,818,669	(40,707,379)
732613	Alvarado WTP Expansion Phase 2			FY99	FY09	0	68,010,697	68,010,697
	Annual Allocation- Water Service Meter Replacement	FY99	FY04			4,117,037	0	(4,117,037)
759330	Barrett Flume Cover			FY06	FY07	0	388,589	388,589
733170	Barrett Reservoir Outlet Tower Upgrade	FY01	FY06	FY01	FY03	816,074	547,284	(268,790)
732360	Bayview Reservoir Reconstruction	FY99	FY04	FY99	FY03	12,399,249	9,699,302	(2,699,947)
732650	Bayview Water Pump Station	FY99	FY00	FY99	FY01	611,952	1,002,973	391,021
732160	Black Mountain Reservoir	FY99	FY01	FY99	FY04	10,276,083	19,055,053	8,778,970
709542	Black Mountain Road - Gap Section			FY01	FY05	0	2,995,181	2,995,181
733410	Black Mountain Road Pipelines (Potable Segment)	FY99	FY03	FY99	FY04	14,336,458	21,332,294	6,995,836
709541	Black Mountain Road Pipelines (Reclaimed Segment)			FY01	FY04	0	11,172,887	11,172,887
729200	Black Mountain WTP Property Acquisition			FY99	FY04	0	3,224,330	3,224,330
709543	BMR Reclaimed Water Storage Tank			FY01	FY09	0	1,637,596	1,637,596
709200	Bonita Pipeline - Phase II	FY99	FY04	FY99	FY04	10,681,706	2,221,291	(8,460,415)
709546	Canyonside Reclaimed Water Pump Station			FY01	FY05	0	2,512,133	2,512,133
709545	Carmel Valley Reclaimed Water Pipeline			FY01	FY09	0	1,538,847	1,538,847
759105	Catalina Standpipe Connection / Navy					0	214,827	214,827

							·	(1998) and Cu
	CURRENT CIP 2002 ESTIMATE	ORIGINAL RATE CASE	ORIGINAL RATE CASE	CURRENT P3 F209	CURRENT P3 F209	ORIGINAL 1998 Estimate	CURRENT 2002 Estimate	Increase
SUBCIP 734006	DESCRIPTION Catalina Standpipe Renovation	ES	EF	ES FY99	FY02	FY 1999-2007	FY 1999-2007 340,853	(Decrease) 340,853
732633	Catalina Water Pump Station			FY00	FY05	0	5,107,265	5,107,265
733094	Restoration Chesterton Standpipe Removal			FY99	FY03	0	435,009	435,009
709492	Copley Drive Reclaimed Water Line			FY00	FY04	0	327,126	327,126
		E)/00	E)/00				Ť	
733140	CWA Flow Control & Pump Station 17 (SD 17)	FY99	FY02	FY01	FY03	18,371,993	1,236,991	(17,135,002)
733350	Dams & Appurtenances Mod Study	FY00	FY02			1,591,350	0	(1,591,350)
732680	Deerfield Water Pump Station	FY99	FY02	FY99	FY02	5,636,861	6,624,243	987,382
738424	Del Cerro Highlands Pump Station			FY99	FY02	0	1,189,376	1,189,376
733091	Del Cerro Reservoir Rehabilitation					0	61,384	61,384
739003	Del Mar Heights Pressure Reduction Station			FY05	FY06	0	702,102	702,102
	Del Mar Heights Road Pipeline	FY01	FY05			1,681,404	0	(1,681,404)
739002	Eastgate Court Pressure Reduction Station			FY03	FY04	0	959,492	959,492
733180	El Capitan Boating Facility	FY99	FY99	FY99	FY02	1,234	1,059,434	1,058,200
759280	El Capitan Dam Piezometers			FY01	FY03	0	213,005	213,005
733190	Replacement El Capitan Reservoir Rd Improvements	FY99	FY03	FY99	FY02	587,602	412,943	(174,659)
733097	Emerald Hills Standpipe Removal			FY99	FY03	0	112,948	112,948
709520	Encanto Park Pipeline			FY99	FY03	0	1,720,756	1,720,756
734000	Encanto Standpipe Removal			FY99	FY02	0	259,222	259,222
739001	Genetic Center Dr. Pressure Reduction			FY04	FY05	0	1,020,246	1,020,246
709549	Station Greystone Torrey Highlands			FY03	FY03	0	156,000	156,000
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759320	Groundwater Asset Development Program			FY01	FY12	0	4,029,763	4,029,763
709493	Group 2 Reclaimed Water Pipeline			FY00	FY04	0	734,842	734,842
733360	Joint Lab Standby Emergency Power					0	308,813	308,813
734002	La Jolla Country Club Reservoir			FY99	FY05	0	423,101	423,101
734008	La Jolla Exchange Place Reservoir			FY01	FY02	0	63,819	63,819
	La Jolla Shores Pipeline			1/0/00	1/0/00	0	2,038	2,038
734007	La Jolla View Reservoir			FY99	FY10	0	145,998	145,998
733098	Lomita Village Standpipe Removal			FY99	FY02	0	551,661	551,661
709548	Los Penasquitos Canyon Reclaimed			FY02	FY11	0	52,860	52,860
733430	Water Pipeline Lower Otay Reservoir - Emergency	FY01	FY04	FY01	FY03	378,568	562,716	184,148
732460	Outlet Improvmt Mid-City Pipeline	FY99	FY02	FY99	FY04	20,223,960	18,313,902	(1,910,058)
	Miramar Pipeline Improvements	FY99	FY05			27,513,731	1,923,149	(25,590,582)
709103	(Changed/Phased) Miramar Pipeline Improvements -			FY99	FY02	0	2,916,847	2,916,847
709105	Phase II Miramar Pipeline Improvements -			FY99	FY10	0	7,617,648	7,617,648
	Phase III							

SUBCIP 709106	CURRENT CIP 2002 ESTIMATE	ORIGINAL	ODIONAL	1	1	ESCALATED	ESCALATED	ESCALATED
	2002 ESTIMATE	RATE CASE	ORIGINAL RATE CASE	CURRENT P3 F209	CURRENT P3 F209	ORIGINAL 1998 Estimate	CURRENT 2002 Estimate	Increase
709106	DESCRIPTION	ES	EF	ES	EF	FY 1999-2007	FY 1999-2007	(Decrease)
	Miramar Pipeline Improvements - Phase IV			FY00	FY10	0	1,511,693	1,511,693
733370	Miramar Pipeline No. 2A	FY99	FY03			3,032,704	598	(3,032,106)
709450	Miramar Road Pipeline			FY00	FY03	0	12,072,944	12,072,944
	Miramar Road Pipeline (Changed/Phased)	FY02	FY07			6,047,412	0	(6,047,412)
732840	Miramar Water Treatment Plant	FY99	FY05	FY99	FY10	114,215,858	119,208,222	4,992,364
732841	Miramar WTP Early Start Improv Phase			FY99	FY03	0	15,539,322	15,539,322
732842	Miramar WTP Early Start Improv Phase			FY01	FY06	0	22,973,986	22,973,986
733210	Morena Reservoir Outlet Tower Upgrade	FY02	FY06	FY01	FY11	2,863,962	528,065	(2,335,897)
759351	North City Master Plan			FY03	FY04	0	327,621	327,621
709630	North City Pipeline Improvements			FY03	FY07	0	1,598,480	1,598,480
709540	North City Reclamation System			FY01	FY02	0	745,844	745,844
732632	Ocean View Hills Parkway Pump Station			FY99	FY02	0	10,361	10,361
732860	Otay 2nd Pipeline - Improvements	FY99	FY06	FY99	FY02	30,514,449	1,654,821	(28,859,628)
732866	Otay 2nd PL - Cast Iron Replacement			FY02	FY08	0	13,929,913	13,929,913
732863	Otay 2nd PL - Cathodic Protection			FY02	FY06	0	2,566,515	2,566,515
732869	Otay 2nd PL- Alta View Replacement			FY02	FY07	0	704,552	704,552
732865	Otay 2nd PL-Cathodic Protection-Otay Ranch			FY02	FY09	0	85,840	85,840
732868	Otay 2nd PL-Chollas, Uplands & Weaver Repl.			FY03	FY07	0	4,663,531	4,663,531
732864	Otay 2nd PL-Isolate Services- Sweetwater			FY04	FY08	0	760,992	760,992
732867	Otay 2nd PL-Otay Ranch Replacement			FY02	FY02	0	759,091	759,091
	Otay Filtration Plant-Raw Water Aqueduct Connection	FY99	FY00			9,626	188,004	178,378
749752	Otay Spillway Bridge			FY01	FY03	0	400,712	400,712
709500	Otay WTP Backwash Drain Relocation					0	88,683	88,683
733390	Otay WTP Basin Corrosion Repairs	FY99	FY99			339,031	42,801	(296,230)
732851	Otay WTP Chlorine Vapor Scrubber			FY01	FY05	0	506,337	506,337
732500	Otay WTP Clearwell Storage			FY00	FY06	0	19,018,317	19,018,317
733220	Otay WTP Raw Water Pump Conversion	FY00	FY02	FY99	FY05	444,513	656,893	212,380
732852	Otay WTP Seismic Upgrade			FY04	FY08	0	491,104	491,104
732850	Otay WTP Upgrade	FY01	FY06	FY00	FY09	14,873,716	21,419,974	6,546,258
749255	Pacific Beach Reservoir			FY02	FY02	0	59,325	59,325
733099	Paradise Hills Standpipe Removal			FY99	FY01	0	139,640	139,640
759352	Paradise Mesa Pressure Zone Master Plan			FY03	FY04	0	312,021	312,021
734005	Paradise Mesa Standpipe Rehabilitation			FY99	FY02	0	413,409	413,409
733460	Parkland Pump Station	FY99	FY03	FY00	FY03	1,221,389	435,089	(786,300)

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	CURRENT CIP	ORIGINAL	ORIGINAL	CURRENT	CURRENT	ORIGINAL ORIGINAL	ESCALATED CURRENT	ESCALATED
	2002 ESTIMATE	RATE CASE	RATE CASE	P3 F209	P3 F209	1998 Estimate	2002 Estimate	Increase
SUBCIP 749251	DESCRIPTION Penasquitos Reservoir Upgrade	ES	EF	ES FY00	EF FY04	FY 1999-2007	FY 1999-2007 2,121,513	(Decrease) 2,121,513
							, ,-	
733092	Point Loma Reservoir Upgrade			FY99	FY02	0	3,033,356	3,033,356
734004	Pomerado Park Reservoir Upgrade			FY99	FY05	0	1,561,266	1,561,266
732480	Pomerado Pipeline No. 2	FY99	FY01	FY99	FY09	3,079,123	7,865	(3,071,258)
733400	Potable Water Storage Recirculation	FY99	FY04	FY01	FY03	1,876,390	45,113	(1,831,277)
733470	Program Management (Parsons)	FY99	FY06	FY99	FY07	39,572,397	47,408,690	7,836,293
733420	Rancho Bernardo Pump Station No. 2	FY99	FY03	FY01	FY07	3,666,882	4,125,672	458,790
749253	Rancho Bernardo Reservoir			FY99	FY01	0	59,934	59,934
733280	Rancho Bernardo Reservoir Upgrade	FY00	FY05	FY00	FY08	3,433,633	9,242,116	5,808,483
732830	Raw Water Master Plan	FY99	FY02	FY00	FY02	11,146,540	291,472	(10,855,068)
733096	Redwood Village Standpipe - Phase I					0	2,552	2,552
738472	Redwood Village Standpipe - Phase II Piping					0	83,619	83,619
	Reservoir Facilities Gas Tanks (complete)					0	216	216
732912	Reservoir Water Quality Imp El Capitan Res.			FY02	FY13	0	4,058	4,058
732911	Reservoir Water Quality Imp Otay Res.			FY02	FY11	0	132,932	132,932
732910	Reservoir Water Quality Imp San Vicente Res.	FY01	FY03	FY01	FY05	375,670	2,782,609	2,406,939
	RWDS- Genesee Ave. Subsystems					0	368,224	368,224
	RWDS- Miramar Road Extension Subsystem					0	265,906	265,906
	RWDS- Miramar Road Subsystem					0	123,486	123,486
	RWDS- Miramar Storage Tansk and Water Connection					0	1,165,746	1,165,746
	RWDS- Scripps Ranch Blvd./I-15 Subsystem					0	304,500	304,500
	RWDS- Sorrento Valley/Carroll Canyon Subsystem	FY99	FY01			2,499,104	2,344,796	(154,309)
	RWDS- University City Subsystems					0	359,852	359,852
	RWDS- Scripps Poway Pkwy. Subsystem					0	270,138	270,138
749252	San Carlos Reservoir Rehabilitation			FY99	FY02	0	1,400,192	1,400,192
	San Pasqual Aquatic Treatment Facility- Phase II					0	30,480	30,480
709550	San Pasqual Water Reclamation System			FY01	FY04	0	1,315,271	1,315,271
709559	Santaluz, LLC Participation Agreement			FY02	FY03	0	5,580,869	5,580,869
709491	Science Center Dr Reclaimed Water Pipeline			FY99	FY04	0	917,423	917,423
759270	SD 18 Flow Control Facility (Mid City)			FY99	FY02	0	3,099,626	3,099,626
733010	Serra Mesa Pump Station	FY99	FY03	FY00	FY09	2,189,429	612,335	(1,577,094)
732720	Soledad Reservoir Rehabilitation	FY99	FY02	FY99	FY03	1,490,934	1,801,059	310,125
	Sorrento Valley Road Pipeline Relocation	FY99	FY01			1,420,627	439,987	(980,640)
709560	South Bay Reclamation System			FY02	FY04	0	1,972,643	1,972,643

						ESCALATED	ESCALATED	ESCALATED
	CURRENT CIP	ORIGINAL	ORIGINAL	CURRENT	CURRENT	ORIGINAL	CURRENT	
	2002 ESTIMATE	RATE CASE	RATE CASE	P3 F209	P3 F209	1998 Estimate	2002 Estimate	Increase
SUBCIP	DESCRIPTION	ES	EF	ES	EF	FY 1999-2007	FY 1999-2007	(Decrease)
709547	South Rancho Bernardo Reclaimed Water Pipeline			FY02	FY02	0	10,870	10,870
732490	South San Diego Pipeline No. 2	FY99	FY02	FY99	FY04	15,961,232	33,200,359	17,239,127
	South San Diego Reservoir No. 2	FY99	FY03			6,655,466	0	(6,655,466)
749254	South San Diego Reservoir Upgrade			FY00	FY13	0	21,704	21,704
709544	State Route 56 Reclaimed Water Pipeline			FY01	FY06	0	1,475,888	1,475,888
749753	Sutherland Bridge			FY01	FY03	0	225,234	225,234
	Sutherland Reservoir Boating Facility II	FY99	FY99			123	4,345	4,222
733080	Telem Control Sys - SCADA - Phase I	FY99	FY03			3,390,107	1,098,446	(2,291,661)
733480	Telem Control Sys - SCADA - Phase II			FY00	FY03	0	12,578,858	12,578,858
733290	Tierrasanta Norte Water Pump Station	FY03	FY07			1,063,717	0	(1,063,717)
709530	Torrey Pines Rd/La Jolla Blvd					0	352,185	352,185
709531	Torrey Pines Rd/La Jolla Blvd - Phase			FY01	FY04	0	4,667,181	4,667,181
709532	Torrey Pines Rd/La Jolla Blvd - Phase 2			FY01	FY07	0	7,263,571	7,263,571
709534	Torrey Pines Rd/La Jolla Blvd - Phase 3			FY01	FY08	0	1,792,359	1,792,359
709510	Town View Lane Pipeline			FY00	FY02	0	219,168	219,168
734001	University Heights Elevated Tank			FY00	FY00	0	1,436	1,436
733270	Waring Road Pump Station - Upgrade	FY99	FY03	FY99	FY04	621,322	4,341,504	3,720,182
759310	Water Dept. Security Upgrades			FY01	FY05	0	4,495,550	4,495,550
733500	Water Flow Meter Installation			FY99	FY03	0	201,768	201,768
733380	Water Operations Central Facility	FY99	FY05	FY99	FY02	27,436,135	22,373,557	(5,062,578)
709558	Western Pacific Participation Agreement			FY03	FY04	0	1,272,960	1,272,960

GRAND TOTAL 778,225,431 899,701,892 121,476,461

Cost Estimating Formulas

Appendix C Cost Estimating Formulas

Cost Estimating Formulas

Facility	Original Formula	Modified Formula			
1 acmity					
Reservoirs	Cost per Gallon = $0.79(V)^{-0.29}$	Cost per Gallon = $1.0442(V)^{-0.1666}$			
Water Treatment Plants (New)	Cost per Gallon = 1.88 (V) ^{-0.25}	Cost per Gallon = 1.044(V) ^{-0.12495}			
Water Treatment Plants (30% rehab.)	None	Cost per Gallon = 1.044(V) ^{-0.28322}			
Water Treatment Plants (50% rehab.)	None	Cost per Gallon = 1.044(V) ^{-0.24990}			
Water Treatment Plants (70% rehab.)	None	Cost per Gallon = 1.044(V) ^{-0.21658}			
Pipelines (8" to 20" dia.)	Cost per LF = $17.21 (D)^{0.60}$	Cost per LF = $17.21 (D)^{0.780}$			
Pipelines (24" to 144" dia.)	Cost per LF = 0.60 (D) ^{1.67}	Cost per LF = $17.21 (D)^{0.803}$			
Source:Table by Mac. Perez & Associates					

Appendix C Cost Estimating Formulas

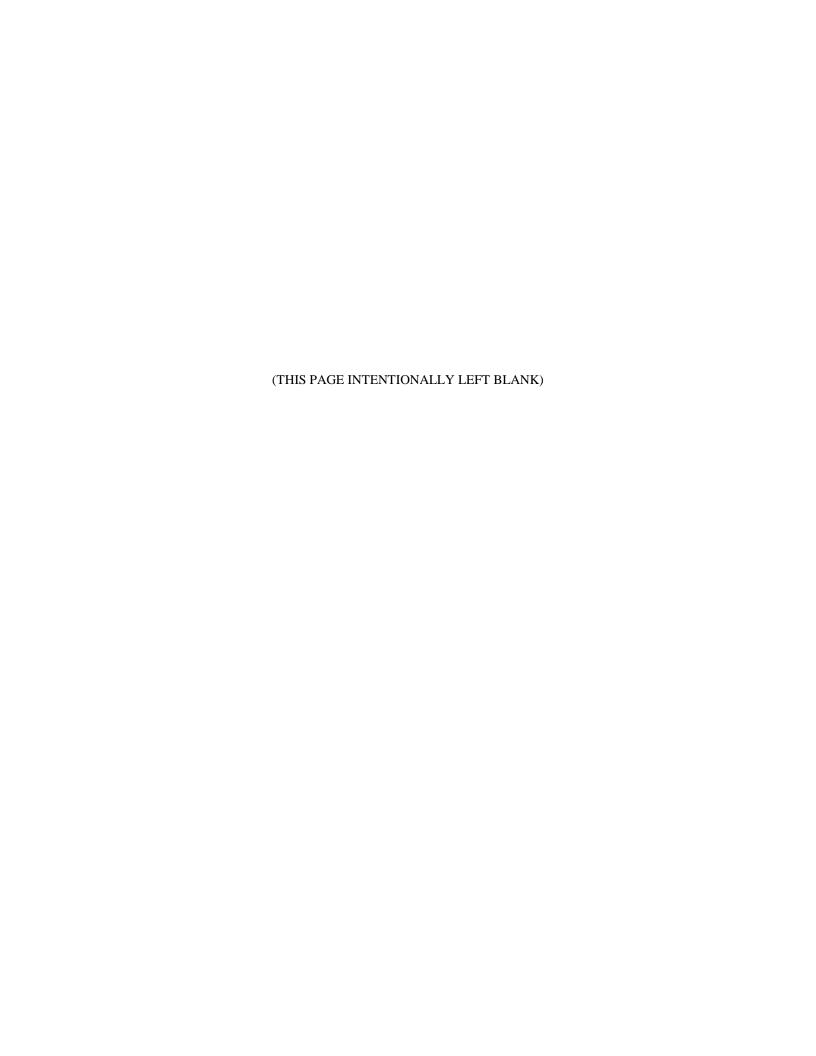
Selected Sample Projects

Original Formula	Modified Formula	Actual Cost	Acceptable Accuracy Budget Level Estimate = +30%/-15%	
\$0.28/gallon Total Cost = \$9,800,000	\$0.58/gallon Total Cost = \$20,300,000	\$0.72/gallon Total Cost = \$25,358,732	-15% <25% *<+30%	
\$0.29/gallon Total Cost = \$43,500,000	\$0.52/gallon Total Cost = \$78,000,000	\$0.52/gallon Total Cost = \$78,679,987	-15%< 1% *<+30%	
20": \$178/LF	48": \$627/LF	\$627/LF (avg.)	-15%< 14% *<+30%	
Total Cost =	24 : \$200/Li 20": \$231/LF	Total Cost = \$14,168,385		
\$8,352,430	Total Cost - \$12,453,731			
	\$0.28/gallon Total Cost = \$9,800,000 \$0.29/gallon Total Cost = \$43,500,000 20": \$178/LF 48":\$385/LF Total Cost =	Formula Formula \$0.28/gallon \$0.58/gallon Total Cost = \$9,800,000 \$0.29/gallon \$0.52/gallon Total Cost = \$43,500,000 \$78,000,000 \$78,000,000 20": \$178/LF 48": \$627/LF 48": \$268/LF 24": \$268/LF Total Cost = \$8,352,430 Total Cost - Total Cost -	Formula Formula Actual Cost \$0.28/gallon \$0.58/gallon \$0.72/gallon Total Cost = Total Cost = Total Cost = \$9,800,000 \$20,300,000 \$25,358,732 \$0.29/gallon \$0.52/gallon Total Cost = Total Cost = Total Cost = Total Cost = \$43,500,000 \$78,000,000 \$78,679,987 20": \$178/LF 48": \$627/LF \$627/LF (avg.) 48": \$385/LF 24": \$268/LF Total Cost = Total Cost = 20": \$231/LF \$14,168,385 \$8,352,430 Total Cost -	

Note: * Based on modified formula cost vis-à-vis actual cost.

APPENDIX E

INFORMATION CONCERNING
THE SAN DIEGO COUNTY WATER AUTHORITY AND ITS WATER SUPPLY



APPENDIX E

INFORMATION CONCERNING THE SAN DIEGO COUNTY WATER AUTHORITY AND ITS WATER SUPPLY

The information contained in this APPENDIX E was obtained from an Official Statement dated May 21, 2002 of the San Diego County Water Authority ("CWA") (the "CWA Official Statement") and other sources believed to be accurate, but has not been independently verified by the City.

THE SAN DIEGO COUNTY WATER AUTHORITY

Organization, Purpose and Powers

CWA was organized on June 9, 1944, under the County Water Authority Act, California Statutes 1943, Chapter 545, as amended (the "Act") for the primary purpose of supplying water to San Diego County for distribution to CWA's member agencies in order to meet their respective needs for beneficial uses and purposes.

CWA is authorized to acquire water and water rights within or outside the State of California; to develop, store and transport such water; to provide, sell and deliver water for beneficial uses and purposes and to provide, sell and deliver water of CWA not needed or required for beneficial purposes of its member agencies to areas outside the boundaries of CWA.

The Act also authorizes CWA to exercise the power of eminent domain; to levy and collect taxes; to fix, and collect rates or other charges for the delivery of water, use of facilities or property or provisions for service; and to fix in each fiscal year a water standby availability charge on land within the boundaries of CWA to which water is made available by CWA.

CWA is also authorized by the Act to utilize any part of its water, and any parts of its facilities used for the development, storage, and transportation of water, to provide, generate, and deliver hydroelectric power, and may acquire, construct, operate and maintain any and all of its facilities for such utilization. Pursuant to contract, CWA is authorized to provide, sell and deliver hydroelectric power to the United States of America, to the State of California for the State Water Project and to any other person engaged in the sale of electric power at retail or wholesale. CWA is also authorized to acquire, construct, own, operate, control or use works for supplying its member agencies with gas or electricity and to purchase, sell and exchange gas and electricity from, to and with any public agency, private company or person engaged in the sale of gas or electricity at retail.

CWA may borrow money and incur indebtedness and may issue bonds or other evidences of indebtedness provided that CWA may not incur indebtedness in excess of 15% of the assessed valuation of the taxable property within CWA's service area. Revenue bonds of CWA must be authorized by a majority vote, and general obligation bonds by a two-thirds vote, of the qualified electors of CWA. CWA may also incur indebtedness by contract up to a total amount equal to 1/10 of 1% of the assessed value of property taxable for CWA purposes. As of June 30, 2001, 1/10 of 1% of the assessed value of property taxable for Authority purposes was approximately \$180,461,273; upon the execution and delivery of the CWA 2002A Certificates on June 5, 2002, CWA has outstanding \$157,172,022 aggregate principal amount of contract indebtedness. Any proposal to incur indebtedness in excess of said 1/10 of 1% limit, and any proposal to purchase, lease or otherwise acquire rights, privileges or services in excess of 40 years requires majority approval of the qualified electors of CWA. CWA may also issue and sell, without voter approval, commercial paper in the form of short-term revenue certificates for any CWA purpose, and may arrange for bank lines of credit or letters of credit in connection therewith.

Member Agencies

CWA was organized by 11 member agencies in 1944. CWA currently has 23 member agencies, consisting of 6 cities, including the City of San Diego, 16 special districts and the Pendleton Military Reservation. Reference is made to the map in the front portion of the CWA Official Statement for the location of the member agencies. Pursuant to the provisions of the Act, additional member agencies may join CWA. The Act also permits member

agencies to withdraw from CWA, subject to certain limitations. One such limitation is that the taxable property within the area to be excluded shall continue to be taxable for the purpose of paying its share of CWA's outstanding indebtedness payable from taxes.

The following are member agencies of CWA:

<u>Cities</u>

Del Mar Oceanside
Escondido Poway
National City San Diego

Special Districts

Carlsbad Municipal Water District Fallbrook Public Utility District Helix Water District Olivenhain Municipal Water District Otay Water District Padre Dam Municipal Water District Rainbow Municipal Water District Ramona Municipal Water District Rincon del Diablo Municipal Water District
San Dieguito Water District
Santa Fe Irrigation District
South Bay Irrigation District
Vallecitos Water District
Valley Center Municipal Water District
Vista Irrigation District
Yuima Municipal Water District

<u>Federal Agency</u> Pendleton Military Reservation

Board of Directors, Management and Employee Relations

<u>Board of Directors</u>. The decision-making body of CWA is its 34-member Board of Directors (the "Board"). Each of the member agencies of CWA has at least one representative on the Board. Any member agency may appoint one additional representative for each full five percent (5%) of total assessed value of property taxable for CWA purposes which is within the public agency. As a result, the City of San Diego is entitled to representation by ten directors, the Helix Water District is entitled to representation by two directors and the Otay Water District is entitled to representation by two directors.

Under the Act, a member agency's vote is based on its "total financial contribution" to CWA since CWA was organized in 1944. Total financial contribution includes all amounts paid in taxes, assessments, fees and charges to or on behalf of CWA or The Metropolitan Water District of Southern California. The Act authorizes each Board member to cast one vote for each \$5,000,000, or major fractional part thereof, of the total financial contribution paid by the member agency. As of January 1, 2002, the member agencies' entitlements are as follows:

Member Agency Voting Entitlements

<u>Agency</u>	<u>Votes</u>	Pct.
Carlsbad Municipal Water District	35.92	3.26%
City of Del Mar	3.48	0.32
City of Escondido	34.39	3.13
Fallbrook Public Utility District	28.85	2.62
Helix Water District	86.26	7.84
City of National City	9.86	0.90
City of Oceanside	52.26	4.75
Olivenhain Municipal Water District	22.98	2.09
Otay Water District	44.04	4.00
Padre Dam Municipal Water District	37.64	3.42
Pendleton Military Reservation	2.24	0.20
City of Poway	22.41	2.04
Rainbow Municipal Water District	48.01	4.36
Ramona Municipal Water District	17.11	1.56
Rincon del Diablo Municipal Water District	17.42	1.58
City of San Diego	462.01	41.99
San Dieguito Water District	12.79	1.16
Santa Fe Irrigation District	16.16	1.47
South Bay Irrigation District	29.96	2.72
Vallecitos Water District	20.32	1.85
Valley Center Municipal Water District	62.34	5.67
Vista Irrigation District	30.10	2.74
Yuima Municipal Water District	3.64	0.33
TOTALS	1,100.19	100.00%

Directors are appointed by the chief executive officers of the respective member agencies, subject to approval by the agencies' governing bodies. Although directors continue to be elected for a six-year term, the Act states that all directors serve at the pleasure of the agencies that appointed them and may be removed by a majority of the governing board. The Act further provides that member agencies with more than one representative may require, through ordinance, its directors to vote as a block, as determined by a majority of such member agency's representatives. The City of San Diego has adopted such an ordinance. Another provision of the Act states that, except as otherwise provided in the Act, a 55% vote is required for Board action. At such time as the City of San Diego's proportion of financial contribution equals 38% or less, however, all questions will be required to receive only a majority of the vote.

James Turner, representing the City of Oceanside, is the current Chair of the Board; Bernie Rhinerson, representing the City of San Diego, serves as Vice Chair of the Board; and James Bond, representing the San Dieguito Water District, serves as Secretary of the Board.

The Board has seven standing committees: Engineering & Operations; Water Policy; Administrative & Legal; Public Affairs; Fiscal Policy; Planning & Environmental; and Special Budget. These committees review CWA matters and recommend action to be taken by the Board.

Management. Maureen A. Stapleton serves as General Manager of CWA. Ms. Stapleton became General Manager of CWA in January 1996 following eight years of service at the City of San Diego as Deputy City Manager and Assistant City Manager. Ms. Stapleton has over 20 years of experience in municipal government in a variety of positions. Ms. Stapleton received her Bachelor of Science degree from California State Polytechnic University, Pomona and earned her Masters of Public Administration from California State University, Long Beach.

Daniel S. Hentschke serves as CWA's General Counsel. Mr. Hentschke became CWA's General Counsel in February, 1998. Before joining CWA, Mr. Hentschke was a member of the Law Firm of Brown, Diven & Hentschke and served as City Attorney for the cities of Oceanside (1991-1998), San Marcos (1988-1992), and

Solana Beach (1986-1998). Prior to that, he was Assistant City Attorney for the City of Carlsbad and Deputy City Attorney for the City of San Diego. He has extensive experience representing a variety of California public agencies as general and special counsel and in public finance matters. Mr. Hentschke received a Bachelor of Arts from the University of California, Santa Barbara, and earned his Doctor of Jurisprudence at the University of the Pacific, McGeorge School of Law.

Christopher J. Guild serves as Deputy General Manager of CWA. Mr. Guild joined CWA in August 1996. Prior to joining CWA, Mr. Guild served as Environmental Services Manager for Law/Crandall, Inc., an engineering and environmental services consulting firm, which he joined following a 27-year career as a Navy Civil Engineer Corps officer. Mr. Guild received his Bachelor of Science degree from Oregon State University and earned his Master of Science in Engineering from the University of Washington.

Karen P. Brust serves as Director of Finance/Treasurer of CWA. Ms. Brust joined CWA in September 1998. Prior to joining CWA, Ms. Brust served as Director of Finance for the City of Gardena, California for four years. Prior to that, she served as Director of Finance for the City of South Gate, California for three years following her employment as Controller/Deputy Director of Finance for the City of New London, Connecticut and Town Treasurer for the Town of Wallingford, Connecticut, respectively. Ms. Brust received her Bachelor of Science degree in Administrative Science and earned her Master of Science degree in Organizational Management from Central Connecticut State University.

John A. Economides serves as Director of Engineering of CWA. Mr. Economides joined CWA in 1989. Prior to joining CWA, Mr. Economides was employed by the Irvine Ranch Water District and by the Metropolitan Water District of Southern California. Mr. Economides received his Bachelor of Science and Master of Science degrees from University of California, Irvine.

Kenya J. Warren serves as Financial Services Manager/Assistant Treasurer of CWA. Ms. Warren joined CWA in 2001. Prior to joining CWA, Ms. Warren was employed for thirteen years at the City of South Gate and for six years at the City of Paramount where she held various management positions in the finance department. Ms Warren received her Bachelor of Arts degree from California State University at Dominguez Hills.

Employee Relations. CWA considers its labor relations to be excellent. As of June 30, 2001, CWA had 208 employees, 8 of whom are in the General Manager's office, 25 in the Administrative Services Department, 45 in the Engineering Department, 16 in the Finance Department, 5 in the Human Resources Department, 6 in the Imported Water Department, 54 in the Operations and Maintenance Department, 12 in the Public Affairs Department, 14 in the Right of Way Department, 19 in the Water Resources Department and 4 in the General Counsel's office. Approximately 90% of the employees are members of Teamsters Local 911 which is the recognized employee organization designated to represent them in their employment relations with CWA, including wages, hours and other terms and conditions of employment. CWA has recently completed the first year of its current labor contracts with Local 911 which are in effect for the three fiscal years ending June 30, 2003.

<u>Defined Benefit Pension Plan</u>. CWA is a member of the California Public Employees' Retirement System ("PERS"), an agent multiple-employer pension system, which provides a contributory defined benefit plan for all permanent employees of CWA. These benefit provisions and all other requirements are established by California law. The pension benefit obligation was computed as part of an actuarial valuation performed for the year ended June 30, 1998. CWA's contribution to PERS for 2001 of \$1,053,592 was made in accordance with actuarially determined requirements computed through the 1998 actuarial valuation and CWA has no unfunded pension liabilities. As of July 1, 2001, CWA's annual contribution rate is 7.00%.

The Metropolitan Water District of Southern California

CWA is a member agency of The Metropolitan Water District of Southern California ("MWD"). MWD was created in 1928 by vote of the electorates of eleven Southern California cities to provide a supplemental supply of wholesale water for domestic and municipal uses to its constituent agencies. The MWD service area comprises 5,168 square miles and includes portions of the six counties of Los Angeles, Orange, Riverside, San Bernardino, San Diego and Ventura. There are 27 constituent agencies of MWD, consisting of 14 cities, 12 municipal water districts and CWA. MWD is governed by a Board of Directors, currently numbering 37 members. Each constituent agency

has at least one representative on the MWD Board. Representation and voting rights are based upon the assessed valuation of property within each constituent agency. CWA has four members on the MWD Board. The total population of the MWD service area is currently estimated to be over 16 million. MWD is currently CWA's sole source of imported water. See "CWA WATER SUPPLY" in this APPENDIX E

CWA SERVICE AREA

CWA's service area lies within the foothill and coastal areas of the westerly third of San Diego County, encompassing 908,970 acres (1,420 square miles). When CWA was established in 1944, its service area consisted of 94,707 acres. Growth has primarily resulted from the annexation of additional service areas by member agencies. The City of San Diego, with 210,726 acres, is the largest service area within CWA's total service area. In its July 2000 county population estimate, the United States Bureau of the Census ranked San Diego County the fourth largest county in the nation. Of the total population of San Diego County, 97% live within CWA's service area. Based upon population estimates provided by the member agencies, it is estimated that the population of CWA's service area as of June 30, 2001 was 2,813,278. The population of the City of San Diego, estimated at 1,277,168, represented approximately 45% of the total population of CWA's service area.

CWA's service area is a semi-arid region where historically the natural occurrence of water from rainfall and groundwater provides a firm water supply for only a small portion of the water needs of the current population. Since 1978 CWA has provided an average of 82% of the water supply within its service area; however during drought conditions experienced in the early 1990s that percentage increased to 95%. The El Niño winter of 1997-98 resulted in significantly above-normal rainfall and runoff, filling local reservoirs and decreasing the need for CWA supplied water. Consequently, in fiscal year 1997-98 CWA provided only 77% of the water supply within its service area. Dry conditions in fiscal year 2000-01 resulted in CWA providing 89% of the water supply within its service area. As a wholesaling entity, CWA has no retail customers but serves only its member agencies.

For additional demographic and economic information relating to San Diego County, see APPENDIX C – "ECONOMY OF SAN DIEGO COUNTY" in the CWA Official Statement.

The following table sets forth the area of CWA served by each member agency and the 2001 population of each member agency service area as estimated by the respective member agencies.

AREA AND POPULATION - CWA MEMBER AGENCIES

As of June 30, 2001

Member Agency	Total Member Agency Service Area (acres)	Percent of Total CWA Service Area	2001 Population Estimate	Percent of Total CWA Service Area Population
Carlsbad M.W.D.	20,640	2.24%	67,627	2.40%
Del Mar, City of	1,159	0.13	4,389	0.16
Escondido, City of	21,569	2.34	128,000	4.55
Fallbrook P.U.D.	27,988	3.04	32,000	1.14
Helix Water District	31,350	3.41	234,900	8.35
National City, City of	5,838	0.63	54,420	1.93
Oceanside, City of	26,161	2.84	157,869	5.61
Olivenhain M.W.D.	30,942	3.36	45,900	1.63
Otay M.W.D.	63,155	6.86	123,420	4.39
Padre Dam M.W.D.	54,370	5.91	134,600	4.78
Pendleton Military Res.	134,625	14.63	50,000	1.78
Poway, City of	25,088	2.73	48,044	1.71
Rainbow M.W.D.	47,260	5.14	18,000	0.64
Ramona M.W.D.	46,524	5.06	36,000	1.28
Rincon Del Diablo M.W.D.	10,596	1.15	25,900	0.92
San Diego, City of	210,726	22.90	1,277,168	45.40
San Dieguito M.W.D.	5,653	0.61	36,500	1.30
Santa Fe I.D.	10,179	1.11	20,509	0.73
South Bay I.D.	20,411	2.22	120,200	4.27
Vallecitos W.D.	28,644	3.11	60,000	2.13
Valley Center M.W.D.	61,022	6.63	23,962	0.85
Vista I.D.	21,311	2.32	112,000	3.98
Yuima M.W.D.	12,792	1.39	1,870	0.07
Total CWA	920,002	100.00%	2,813,278	100.00%

CWA WATER SUPPLY

CWA Service Area Water Supply

The area served by CWA receives its water supply from two sources: (i) local supplies (local runoff, groundwater and reclamation), and (ii) water imported by CWA. MWD is currently CWA's sole source of imported water.

Historically approximately 18% of the water supply for CWA's service area comes from local sources. Such sources are heavily dependent upon rainfall and are cyclic in nature. The remaining portion of CWA's service area water supply currently comes through CWA purchases from MWD.

A number of the member agencies have facilities for the storage of local runoff and water purchased from CWA. The total capacity of such storage is approximately 570,000 acre-feet ("af"). (Quantities of water are expressed in terms of acre-feet. An acre-foot is the amount of water which will cover one acre to a depth of one foot and is equivalent to approximately 326,000 gallons, which is approximately the average annual water use of two households.) Such storage is generally only available to the member agencies who operate such facilities and is not available for use by other member agencies, since the storage facilities are not interconnected. Some of the member agencies are able to sell water to certain other member agencies under separate arrangements. One of the purposes

of the Capital Improvement Program is to interconnect a number of these member agency storage facilities. Another purpose is to provide CWA storage capacity of its own. For additional information relating to the Capital Improvement Program, see "THE CAPITAL IMPROVEMENT PROGRAM" in the CWA Official Statement. CWA also has capacity rights in certain reservoirs. For additional information relating to such capacity rights, see "AUTHORITY WATER FACILITIES" in the CWA Official Statement.

Water Purchases from MWD

CWA is the largest purchaser of water from MWD. In the fiscal year ended June 30, 2001, CWA's water purchases from MWD represented approximately 27% of MWD's total deliveries.

In the fiscal year ended June 30, 2001, MWD supplied approximately 2.18 million af of water. During years of normal precipitation, existing water supplies of MWD are sufficient to meet demands within the service area of MWD. In the future, several variables could impact to some extent the availability of both existing and future supplies in normal years.

Supply deficiencies can occur during periods of drought. Increased use of MWD water, coupled with a reduction of MWD's existing water supplies (as described below under "Current CWA Water Supply") could reduce the amount of water available to MWD to supply CWA.

The Metropolitan Water District Act, California Statutes 1969, Chapter 209, as amended (the "MWD Act") provides a preferential entitlement for the purchase of water by each of the MWD constituent agencies. This preferential right is based upon a ratio of all payments made to MWD by each constituent agency compared to total payments made by all constituent agencies on tax assessments and otherwise, except purchases of water, toward the capital cost and operating expense of MWD. Based upon the formula as applied by MWD, CWA has a preferential right to 14.7% of MWD's total supply. On January 30, 2001, CWA filed a complaint in the Superior Court of San Diego County against MWD and the City of Los Angeles seeking injunctive and declaratory relief, an accounting and a petition for a writ of mandamus with respect to respective water rights among MWD's member agencies under Section 135 of the MWD Act and to determine the legality of MWD's interpretation of Section 135. The case was subsequently transferred to the Superior Court of the City and County of San Francisco. MWD filed a demurrer to the complaint. The trial court sustained the demurrer without leave to amend. CWA Board has authorized an appeal.

It is MWD's declared policy to meet all the supplemental needs of each of its member agencies, including CWA and MWD has not, in fact, used preferential rights to allocate water supplies during prior periods of drought. Instead, MWD has allocated water based on uniform reduction by class of water service, with adjustments made for growth, loss of local supply and other water supply related factors. During the six-year California drought that ended in 1992, MWD implemented a water delivery reduction plan in stages, commencing with a call for voluntary conservation measures and culminating in a reduction methodology resulting in a 31% overall reduction from base year figures in water deliverable to CWA. A more severe stage was considered, but was not needed to be implemented. Any extended curtailment could be accompanied by an increase in MWD water charges to its constituent agencies and consequently could necessitate an increase in water rates to the member agencies of CWA.

Current CWA Water Supply

CWA currently purchases all of its water supplies from MWD, which obtains its water supply from two primary sources: the Colorado River via the Colorado River Aqueduct and the State Water Project ("SWP") via the Edmund G. Brown California Aqueduct. A map in this Official Statement provides the location of the Colorado River Aqueduct and the California Aqueduct. On average, CWA receives about 75-80% of its supply from the Colorado River; the remaining 20-25% is from the SWP. Plans call for CWA to begin receiving transfer water from the Imperial Irrigation District ("IID") beginning in 2003.

<u>Colorado River Water</u>. Under applicable laws, agreements and treaties governing the use of water from the Colorado River, MWD and certain other California water agencies are entitled to use 4.4 million acre-feet ("maf") of Colorado River water annually, plus 50% of surplus Colorado River water as may be declared on an annual basis

by the United States Secretary of the Interior. In recent years California has used about 5.2 maf from the river. Before 1996, the amount in excess of the state's 4.4 maf apportionment was taken from unused apportionments from Arizona and Nevada. Since 1996, Arizona and Nevada have taken essentially full apportionments and MWD has relied upon significant amounts of surplus water to operate the Colorado River Aqueduct at full capacity. In January 2001, the Department of Interior implemented interim surplus guidelines, which are reservoir operating rules designed to provide additional surplus water to MWD for 15 years (until 2016), while water conservation and transfer programs are implemented under a program to reduce California's demand on the Colorado River, called California's Colorado River Water Use Plan.

The Colorado River Aqueduct is owned and operated by MWD. Work on the Colorado River Aqueduct commenced in 1933 and water deliveries started in 1941. Additional facilities were completed by 1961 to meet additional requirements of MWD's member agencies. The Colorado River Aqueduct is 242 miles long, starting at Lake Havasu and terminating at Lake Mathews in Riverside County. After deducting evaporation and seepage losses in transporting and storing the water and considering maintenance requirements, the maximum capacity available for delivery by MWD to its member agencies is approximately 1.2 mafper year.

MWD currently diverts water from the Colorado River under a fourth priority right of 550,000 af per year and a fifth priority right of 662,000 af per year. MWD's fifth priority is outside of California's basic entitlement of 4.4 maf and therefore is not considered a firm supply of water. A 1963 United States Supreme Court decision permits Arizona to increase its diversion of Colorado River water for the Central Arizona Project, which began diverting Colorado River water in 1985. As a result of Colorado River diversions by Arizona, MWD's total diversions could eventually be restricted to its fourth priority right of 550,000 af per year. In addition, if it is determined by a court that use of water by certain California Indian reservations and other California users holding present perfected rights would reduce water available to MWD under its fourth priority, MWD's total diversions of Colorado River water could be further restricted. Since 1985, these entities have used less than 20,000 af annually of their rights to approximately 49,000 af of California apportionment annually. In addition, water is available from a 1988 water conservation program with the IID (106,000 af per year), and a demonstration project of underground storage of Colorado River water in Central Arizona. By agreement, the Coachella Valley Water District ("CVWD") may use 50,000 af of the MWD/IID program under certain water conditions. In years in which surplus water or water unused by Arizona or Nevada is available, MWD has the highest priority of any California contractor to divert up to one-half of the surplus water by virtue of its fifth priority right of up to 662,000 af. Furthermore, any water left unused by other California contractors with a higher priority than MWD would also be available.

California's Colorado River Water Use Plan. The Colorado River Board of California, in consultation with MWD, IID, CVWD, and CWA, has developed and released a draft plan for reducing California's use of Colorado River water to its basic apportionment of 4.4 maf when necessary (the "California Plan"). The California Plan would optimize the use of the available Colorado River supply through water conservation, transfers from higher priority agricultural users to CWA's and MWD's service area, and storage programs. In 1998 the Legislature appropriated \$235 million from the State General Fund toward implementation of the California Plan. Some water projects related to the California Plan may also be eligible for funds from the \$1.97 billion Proposition 13, which was approved in March 2000.

The California Plan includes the *Key Terms For Quantification Settlement Among The State of California, IID, CVWD And MWD* ("Key Terms") approved by the respective boards of the three districts on October 18, 1999. The Key Terms is a statement of principles that may ultimately lead to a Quantification Settlement Agreement ("QSA") among CVWD, IID, and MWD. The Key Terms include proposals to further divide the first three priorities' rights to use no more than 3.85 million acre-feet per year. The QSA would be a significant step toward reducing California's reliance on Colorado River water. Execution of the QSA by the end of calendar year 2002 is a required condition to the Secretary of the Interior's continuance of interim surplus guidelines. The QSA is also a contingency for the IID/CWA transfer agreement. CWA and other QSA parties are working to satisfy a number of environmental regulatory requirements prior to execution of the QSA, including the California and federal endangered species acts, and California's fully protected species regulations. The efforts to accomplish this are occurring at the state and federal administrations, as well as the state and federal legislatures.

Specific QSA programs include the transfer of between 130,000 and 200,000 acre-feet of water conserved by IID to CWA, lining of portions of the All-American and Coachella canals to conserve and transfer to MWD

93,700 acre-feet; extending the term of MWD's 1988 conservation greement with IID; and transferring up to 100,000 acre-feet of water conserved by IID to MWD if the water is not needed by CVWD. With full implementation of these programs, at such time that California is limited to its basic apportionment of 4.4 maf per year, MWD would have between 771,000 to 851,000 acre-feet of Colorado River water available. This amount includes 130,000 to 200,000 acre-feet of transfer water that would be delivered to CWA under an exchange agreement with MWD.

Interim Surplus Guidelines. In January 2001, the Secretary of the Interior issued a decision to adopt interim surplus guidelines for use in determining if there is surplus Colorado River water available for use in California, Arizona and Nevada. The surplus guidelines are intended to provide California with additional surplus water for 15 years (until 2016) during which time the California Plan water conservation and transfer projects are to be implemented. With the guidelines in place, MWD can expect to receive sufficient Colorado River water to fill the Colorado River Aqueduct under any foreseeable runoff and reservoir storage scenario through 2005. From 2006 to 2011, the likelihood of having sufficient Colorado River water to fill the remaining portion of the Colorado River Aqueduct ranges from 95 percent to 81 percent; from 2012 to 2016 it varies from 76 percent to 62 percent. Beyond 2016, supplies from storage and conjunctive use programs, other cooperative water supply programs, and intermittent option supply programs which are being negotiated or under consideration would permit total deliveries of 1.25 million acre-feet of water. Continuation of the interim surplus guidelines is contingent upon the execution of the QSA by December 31, 2002. If the QSA is not executed by this time, the interim surplus guidelines may be suspended until such time as the QSA is executed. Lake Mead would then be operated under criteria that could significantly restrict the availability of surplus water.

Other MWD Colorado River Supply Programs. MWD has taken steps to augment its share of Colorado River water through agreements with other agencies that have rights to use such water. In July 2001, MWD's Board approved Principles of Agreement for a Land Management, Crop Rotation and Water Supply Program (the "Land Management Agreement") with the Palo Verde Irrigation District ("PVID"). The aim of this program is to make available 25,000 to 111,000 acre-feet of water per year for transfer to MWD from PVID. The term of the program is 35 years.

In October 2001, MWD's Board approved the purchase of 16,344 acres in the Palo Verde Valley area of eastern Riverside County from the San Diego Gas and Electric Company for \$42.5 million. Approximately 9,700 acres of the land are irrigated cropland. It is expected that a portion of this land would be managed consistent with principles of the Land Management Agreement and would result in water becoming available for transfer to MWD. The remaining 6,640 acres are desert lands outside of PVID. In connection with the purchase of the property, MWD and PVID also agreed to form a four-member joint committee to determine how to best manage the property.

The ability of MWD to complete the PVID program or any other water transfer is subject to execution of the QSA and the completion of other environmental documentation.

Environmental Considerations. Several fish species and other wildlife species either directly or indirectly have the potential to affect Colorado River operations, thus changing power operations and the amount of water deliveries to the Colorado River Aqueduct. A number of species that are on either "endangered" or "threatened" lists under the federal and/or California endangered species acts ("ESAs") are present in the area of the Lower Colorado River. To address this issue, a broad-based state/federal/tribal/private regional partnership has been formed, which includes water, hydroelectric power and wildlife management agencies in Arizona, California and Nevada. This group is developing a multi-species conservation plan for the main stem of the Lower Colorado River.

Seismic Events. Major portions of the Colorado River Aqueduct are located near earthquake faults. On October 16, 1999, a magnitude 7.1 earthquake centered 45 miles from the Colorado River Aqueduct occurred. When it occurred, the aqueduct was running at capacity. Inspections following the earthquake revealed no structural damage. There were no interruptions in operations. No assurance can be made that a significant seismic event would not cause damage to project structures, which could thereby interrupt the supply of water from the Colorado River Aqueduct.

State Water Project. CWA on average receives about 20-25% of its supply from MWD's other major source of water, the State Water Project ("SWP"), which is owned by the State of California and operated by the

State of California Department of Water Resources ("DWR"). This project transports water pumped from the Sacramento-San Joaquin Delta (the "Delta") and Feather River water released from Oroville Dam that has traveled to the Delta, south via the California Aqueduct to four delivery points near the northern and eastern boundaries of MWD. The total length of the California Aqueduct is 444 miles.

MWD is one of 29 agencies which have contracts for water service from DWR, but is the largest agency in terms of the number of people it serves (more than 17 million), the quantity of SWP water to which it is entitled (approximately 2 maf, or 48% of total SWP entitlement), and the total amount of annual payments made to DWR (approximately 60% in fiscal year 2000). In 1960, MWD signed a contract with DWR for the ultimate delivery of 1.5 maf of water per year. This amount was later increased to 2,011,500 af, principally to offset the impending loss of a portion of MWD's dependable Colorado River supply resulting from the 1963 United States Supreme Court decision in *Arizona v. California*, which determined California's basic apportionment to be 4.4 maf per year.

The SWP was originally intended to meet demands of 4.2 maf per year. Initial SWP facilities were completed in the early 1970s, and it was envisioned that additional facilities would be constructed as contractor demands increased. Several factors, including public opposition, increased costs, and increased non-SWP demands for limited water supplies, combined to delay the construction of additional facilities. At the same time, contractors' demands for SWP entitlement water have been increasing.

The quantity of SWP water available for delivery each year is controlled by both hydrology and operational considerations. The SWP was unable to meet contractors' requests for entitlement water in the drought periods of 1977, 1990-92, and 1994. In 1990, SWP deliveries totaled 2.6 maf, including deliveries of 1.4 maf to MWD. During the following year, however, the SWP delivered less than 550,000 af to its entitlement contractors, of which MWD received 381,000 af, or about 20% of its full entitlement. MWD was unable to obtain its requested SWP deliveries in 1977 and 1991. In its November 1998 California Water Plan Update (Bulletin 160-98), DWR projected that existing SWP facilities have a 65 percent chance of making full deliveries under 1995 level demands, but less than a 25 percent chance of making full deliveries under a more stringent 2020 demand scenario. DWR's planning efforts are currently focused on the CALFED effort to develop a long-term Bay-Delta solution discussed below.

Updated projections for MWD's 1996 Integrated Resources Plan (he "MWD IRP"), its long-range planning document, show that MWD expects to receive more than 600,000 af of dry-year supply from the SWP by the year 2020. The ability to receive these supplies depends upon the relative success of implementing CALFED programs, which are discussed below. The success of these programs could also affect the amount of transfer water from the Central Valley that MWD projects it will need to fully implement the MWD IRP.

Bay-Delta and CALFED. The supply and reliability issues affecting the SWP are a result of long-standing environmental problems in the Bay-Delta estuary, which provides at least a portion of the drinking water used by two-thirds of all Californians. In addition to its importance to urban and agricultural water users, the Bay-Delta is of critical ecological importance. The Bay-Delta is the largest estuary on the West Coast, and provides habitat for more than 120 fish and wildlife species. Increasing demands on the Bay-Delta from urban and agricultural uses have contributed to the destruction of habitat, the decline of several estuarine and anadromous fish species, and the deterioration of water quality. Other factors that have contributed to the decline of the Bay-Delta ecosystem include the dredging and filling of tidal marshes, the construction of levees, urban runoff, agricultural drainage, runoff from abandoned mines, and the introduction of non-native species.

The greatest potential for supply improvement on the SWP is expected to come from work being done by CALFED, a group of state and federal agencies established in 1995 to develop a long-term solution to restore the Bay-Delta as a reliable water supply and healthy ecosystem. CALFED incorporated input from the public, environmental groups and water users in the development of a preferred Bay-Delta alternative. CALFED completed a Programmatic Environmental Impact Report/Environmental Impact Statement in July 2000, followed by the Record of Decision in August 2000. In that month, the federal government and the state announced an action plan entitled "California's Water Future: A Framework for Action" (the "Action Plan") to address California's long-term water needs. The Action Plan pledges, among other things, to restore the Bay-Delta ecosystem, improve water quality, enhance water supply reliability, and assure long-term protection for Delta levees.

The Action Plan calls for immediate implementation of specific short-term actions over a seven-year period (the first stage of a 30-year program) and studies of longer-term projects, at a cost of \$8.6 billion. Funding is expected to be provided by state and federal appropriations and contributions from local water users, including MWD. It is anticipated that federal, state and local users will each contribute one-third of Action Plan expenditures. Funding by the state is provided in part by Proposition 204, which passed in 1996, and Proposition 13, which passed in March 2000. There is no assurance that the Action Plan will be implemented within the seven-year time frame. At this time, exact allocation of costs to local users has not been defined, and therefore, MWD cannot estimate the extent or the timing of its contributions to the Action Plan.

The CALFED preferred alternative includes measures for improving near-term water supply and reliability, such as the installation of screens and acoustic barriers to prevent fish from entering the intakes of water diversion points and the enlargement of south Delta channels and installation of operable barriers to improve south Delta flow circulation. Long-term measures under study include modifications to Delta channels to improve the flow of water through the Delta, conveyance facilities, and the construction of new offstream and groundwater storage. Other work being done by CALFED includes ecosystem restoration, water use efficiency, water quality, water transfers, watershed management, and levee system integrity. The outcome of these studies will have a large influence on the ultimate scope and cost of the long-term CALFED effort.

CALFED's success depends largely on three factors: obtaining federal reauthorization that expired in 1999, receiving adequate funding and gaining cooperation among agencies and interest groups. Two bills have been introduced in Congress to reauthorize CALFED and provide federal funding for it. S. 1768 (Feinstein-Boxer) and H.R. 3208 (Calvert-Dooley) differ significantly in the approach taken to resolve CALFED issues. State and local water agencies have furnished the bulk of CALFED's funding to date. State funding has come primarily from Proposition 204 and Proposition 13, and this money will run out in the next two years. Supporters are gathering signatures for a \$3.5 billion water bond initiative for the November 2002 ballot that would include \$2.2 billion for CALFED and activities related to the program. CALFED analysts say funds from this bond would fund the program totally through at least 2005.

Bay/Delta Regulatory and Planning Activities. The State Water Resources Control Board ("State Board") is the agency responsible for setting water quality standards and administering water rights throughout California. Decisions of the State Board can affect the availability of water to MWD and other users of State Water Project water. The State Board exercises its regulatory authority over the Bay/Delta by means of public proceedings leading to regulations and decisions. These include the Bay/Delta Water Quality Control Plan ("WQCP"), which establishes the water quality standards and proposed flow regime of the estuary, and water rights decisions, which assign responsibility for implementing the objectives of the WQCP to users throughout the system by adjusting their respective water rights. The State Board is required by law to periodically review its WQCP to ensure that it meets the changing needs of this complex system.

MWD, together with certain other agencies, is engaged in water rights settlement discussions with upstream agricultural water interest groups on both the Sacramento River and the San Joaquin River. These negotiations aim to develop agreements among the participating water interests that will contribute, wholly or in part, to the implementation of the most recent WQCP objectives, without placing the entire burden on the state and federal projects.

Monterey Agreement Litigation. The SWP contractors and DWR made significant amendments to the State Water Contract, known as the Monterey Agreement, that became effective in August 1996. The Monterey Agreement includes a number of water allocation and water management provisions. Under the Monterey Agreement, all categories of SWP water are allocated among all contractors in proportion to SWP entitlement, whether the water is used for agricultural or urban purposes. Further, a permanent shortage provision of the original State Water Contract was eliminated. The Monterey Agreement provides for improved water management through increased access to and flexibility by the contractors in the use of existing SWP facilities, and increased opportunities for contractors to firm up their SWP supplies. These provisions include: the ability to store SWP water outside a contractor's service area for later use within its service area, storage both in groundwater basins and in SWP surface reservoirs; the ability to transport non-project water through SWP facilities; and, for contractors such as MWD, which pay for certain SWP terminal reservoirs, access to a portion of the water stored in those reservoirs in addition to otherwise approved deliveries.

DWR's implementation of the Monterey Agreement was challenged by the Planning and Conservation League and others for alleged noncompliance with the California Environmental Quality Act. In June 1996, a California Superior Court ruled that the environmental assessment prepared by the contractors was adequate. The case moved to an appeals court to decide issues related to: (i) the selection of the Central Coast Water Authority as lead agency for preparation of environmental documentation; (ii) the adequacy of the environmental documentation prepared with respect to the Monterey Agreement, and (iii) the transfer by the DWR of the Kern County Water Bank from the State to the Kern County Water District. In September 2000, the Third District Court of Appeals reversed the trial court's ruling that the environmental documentation was adequate. The appeals court held that the environmental documentation was defective in failing to analyze the environmental effects of the Monterey Agreement's elimination of the permanent shortage provisions of the State Water Contract, but agreed with the trial court that the DWR should have been the lead agency with respect the preparation of environmental documentation.

The parties petitioned the California Supreme Court for review, but in January 2001, the high court declined to review the case. Since then, parties to the litigation have been negotiating terms for a settlement of the issues. If this is not successful, the case would be remanded to the trial court to determine (1) whether to issue an order enjoining enforcement of portions of the Monterey Agreement pending preparation by the DWR of new environmental documentation, and (2) whether to invalidate DWR's transfer of the Kern County Water Bank. A final decision to invalidate all or a portion of the provisions of the Monterey Agreement could have an adverse impact on the allocation of SWP water to MWD. No assurance can be given as to the outcome of this litigation.

Additional Activities. Management of SWP supplies through water marketing and groundwater banking is expected to play an important role in meeting California water needs. MWD is participating in groundwater banking programs with the Arvin-Edison Water Storage District and Semitropic Water Storage District. MWD and other water agencies within its service area, in some instances independent of MWD, have reviewed from time to time various agreements to transfer SWP water to such respective water agencies via the MWD distribution system.

In December 1999, MWD issued a Request for Proposals ("RFP") to provide up to 100,000 acre-feet per year of dry-year water transfers via the California Aqueduct on an option basis. These transfers are intended to insure against regulatory and operational uncertainties in the SWP system, which could impact the reliability of existing supplies, and to facilitate a competitive transfer market on an immediate basis. A total of 17 proposals from public and private entities with an ultimate yield of approximately 380,000 acre-feet of water per year were received in response to the RFP. MWD has reviewed the proposals, and has commenced negotiations with four entities. The total yield for the four proposals is between approximately 175,000 and 200,000 acre-feet of water per year. In March 2001, the MWD Board authorized the execution of a Principles of Agreement with the Kern Delta Water District/Arvin-Edison Water Storage District. The program is a groundwater banking and exchange transfer program to allow MWD to store up to 250,000 acre-feet of State Water Contract water in wet years, and permit MWD, at MWD's option, a return of up to 50,000 acre-feet of water during hydrologic and regulatory droughts. The program is subject to feasibility and environmental studies and successful negotiation of a final agreement. There is no certainty that the parties will reach agreement on such a program.

In addition, in March 2001 the MWD Board authorized the execution of an agreement with the San Bernardino Valley Municipal Water District ("SBVWD"), in which MWD will purchase a minimum of 20,000 acrefeet of SBVWD's State Water Contract water allocation. SBVWD will deliver the purchased supplies to MWD's service area through the coordinated use of facilities and interconnections within the water conveyance systems of the two districts. MWD will pay to SBVWD \$150 per acre-foot for purchases delivered to MWD under the minimum deliveries and other related provisions of the agreement. The program has a term of 10 years, unless extended.

Environmental Considerations. Several fish species and/or species groups have impacted SWP operations, thus limiting the flexibility of the SWP. Currently, four species, the winter-run Chinook salmon, Delta smelt, Sacramento splittail and Central Valley steelhead are listed under the ESAs. Listing of any or all of the species under ESAs could influence how the SWP is operated. DWR is altering the operations of the SWP to accommodate the listed species. This change in project operations is influencing water supply or the manner in which water is diverted from the Delta. MWD cannot determine with any certainty what effect additional listings would have on SWP operations in the future.

Seismic Considerations. Major portions of the California Aqueduct are located parallel to and near the San Andreas and other faults. All major faults are crossed either by canal at ground level or by pipeline at very shallow depths to ease repair in case of damage from movement along a fault. SWP facilities are designed to withstand earthquakes without major damage. Dams, for example, are designed to accommodate movement along their foundations and to resist earthquake forces on their embankments. Earthquake loads have been taken into consideration in the design of project structures such as pumping and power plants. The location of check structures on the canal allows for hydraulic isolation of the fault-crossing repair. No assurance can be made that a significant seismic event would not cause damage to project structures, which could thereby interrupt the supply of water from the California Aqueduct.

Future CWA Water Supply

<u>Water Resources Plan Overview</u>. CWA's projected water demands and recommended future supplies are developed through CWA's Urban Water Management Plan ("UWMP"), which was updated in December 2000. The UWMP is a requirement of the California Water Code and is formally updated every five years. The Plan estimates water demands and projected supplies through 2020.

Imported water from MWD is only one component in the mix of resources identified to meet projected demands in the San Diego region. The 2000 UWMP reflects CWA board policy to diversify the supplies available to meet the region's future water supply needs and increase local control. Individual components of the water supply mix contained in the 2000 UWMP include firm supplies from MWD, CWA/IID water transfer, and in coordination with CWA's member agencies, conservation programs to reduce demands within the region and aggressive development of local supplies such as recycled water, groundwater and seawater desalination. CWA is in the process of updating its planning efforts through the development of a detailed water facilities master plan that will guide the San Diego region's choice of available options to meet future water supply demands. The facilities master plan is expected to be completed by June 2002 with the information from this effort serving as a basis for the 2005 update of CWA's UWMP.

<u>Water Transfers</u>. Water transfers have emerged as one of CWA's greatest alternative resources to continued purchases from MWD. Water transfers typically involve purchasing water for a specified period from an agency or district that then reduces its water use by that amount. The principle behind transfers is that market forces may reallocate water. CWA /IID transfer outlined in the Plan would provide CWA up to 200,000 af/yr. This water is considered highly reliable because it would come from IID's first through third priorities to 3.85 maf/yr of the state's 4.4 maf per year allocation. These priorities are higher than MWD's fourth priority allocation of 550,000 af. This means that water would likely remain available for transfer even during drought, because IID, as holder of the water right, is in a relatively senior position to other water rights holders.

The cost of transferred water can be divided into two general components: the acquisition cost from the transferring agency and the cost to convey the water to CWA. The conveyance cost introduces a third party into any transfer agreement because virtually all potential transfers rely upon using MWD, SWP, and/or U.S. Bureau of Reclamation Central Valley Project facilities to transport (or "wheel") the water to CWA's service area. Under current state law, these public agencies are required to provide 70% of unused capacity in their distribution systems to wheel transferred water, provided that compensation at the lawful rate is made to cover the costs and that no harm is done to other legal water users. Wheeling would not be an issue if CWA were to build a separate facility to transfer water from the Colorado River. CWA is currently studying the feasibility of such a facility in cooperation with Mexico.

Environmental. Both the Colorado River and the Bay-Delta sources of transfer raise significant environmental considerations. The primary environmental focus for both sources has been declining fisheries and aquatic ecosystems.

Water Quality. Colorado River supplies are relatively high in salts, in the form of total dissolved solids, which pose potential additional treatment costs. Although SWP supplies have lower salt levels, water from the Bay-Delta can be high in organic compounds that react with chlorine to form various disinfection by-products, including trihalomethanes, such as chloroform. Higher water treatment costs are incurred to eliminate these potentially harmful compounds.

<u>CWA/Imperial Irrigation District Water Transfer.</u> In September 1995, CWA approved a Memorandum of Understanding with IID to negotiate a long-term transfer of conserved agricultural water. Since then, CWA Board and staff have been actively involved in exploring the feasibility of such a transfer, determining the amount of water available, and negotiating its acquisition cost.

In July 1996, CWA and IID agreed to draft terms for a Cooperative Water Conservation and Transfer Program. On April 29, 1998, CWA and IID approved an agreement for the transfer of conserved water. The duration of the agreement is 45 years with renewal provisions for an additional 30 years and would provide that CWA purchase up to 200,000 af per year of water supply. A quantity of 20,000 af per year or more could be available beginning in 2002. This amount increases annually by 20,000 af per year for ten years to a total of up to 200,000 af per year. Up to an additional 100,000 af per year could become available for transfer after year ten of deliveries, subject to its availability. The proposed agreement is conditioned upon, among other things, the availability of a minimum of 130,000 af per year. The volume of water committed to be purchased by CWA represents only a portion of CWA's current level of demand for untreated water.

The agreement includes a formula to determine the water's price that includes a discount from the price of MWD water (starting at 25% in the first year of the agreement and declining over the next seventeen years to 5%) after an adjustment for CWA's cost to convey the water in MWD's Colorado River Aqueduct. The agreement also requires CWA to make additional payments to IID under certain circumstances during times of water shortage. Based on current MWD price data and CWA conveyance cost estimates, the price of the transferred water would normally be less than the cost to CWA of MWD supplied water and compares favorably to other alternative sources of supply that might be developed by CWA or MWD.

Water for the transfer would come from conservation measures undertaken in the Imperial Valley, either by IID or private property owners within the IID service area. IID has shared contractual rights of 3.85 maf per year, including its own present perfected rights to 2.6 maf per year of Colorado River water. Conservation measures could include improvements to irrigation systems and distribution and storage systems and better water management or, under certain conditions, land fallowing. An IID study completed in 1995 found that up to 400,000 af per year of water could be made available for transfer using these methods.

Implementation of CWA/IID water transfer is subject to certain contingencies, including availability of a minimum of 130,000 af per year, completion of environmental review, and approval of the transfer by the State Water Resources Central Board. Environmental concerns have been raised as to the effect of the transfer on the Salton Sea, depending on the method of water conservation employed by IID.

MWD Water Exchange. On November 10, 1998, MWD and CWA entered into an agreement which will facilitate the IID transfer. Under terms of the agreement, CWA will deliver to MWD water CWA acquires from IID, in exchange for a same amount of MWD water. The agreement will terminate 30 years after the start of deliveries from IID to CWA. The exchange price paid by CWA to MWD would begin at \$90 per acre foot, and escalate at fixed rates annually thereafter subject to adjustment after ten years to reflect changes in the exchange rate with MWD. Based on pricing formulas in the agreement with IID and exchange rates with MWD, the total cost of the transfer water to CWA during the initial 10 years of deliveries will be less than MWD supplied water.

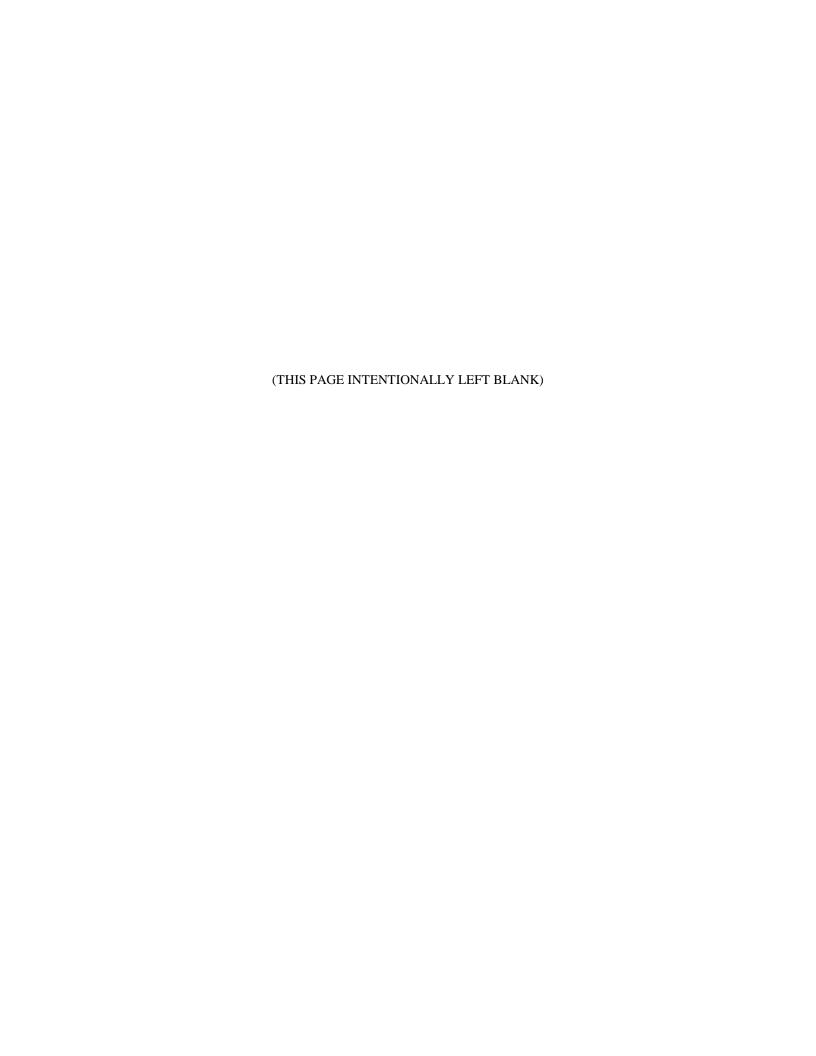
There are a number of conditions which must be met before the agreement is fully implemented. An accounting has to be made of agricultural agencies' entitlements within California's 4.4 maf apportionment of Colorado River water. The federal government must revise the manner in which it operates the Colorado River reservoirs to assure a full Colorado River Aqueduct through 2015. That action was taken in February 2001. Also, \$235 million for canal linings and conjunctive use storage projects must be funded from a state budget appropriation. Legislation authorizing the budget appropriation was signed on September 25, 1998.

State-wide Benefits. While CWA receives reliability and cost benefits from a more diversified water supply through its water transfer agreement with IID and exchange agreement with MWD, there are numerous state-wide benefits. Foremost among these are the significant water savings that will be achieved through conservation programs and canal lining projects in IID, and reoperation of Colorado River reservoirs which will help California to remain within its basic entitlement of 4.4 maf of Colorado River water. California currently uses more than 5.2 maf of Colorado River water. Without these measures, Southern California would have to rely more on water supplies

from Northern California, which would put further pressure on the already strained Bay Delta region through which Southern California's share of State Water Project supplies must flow.

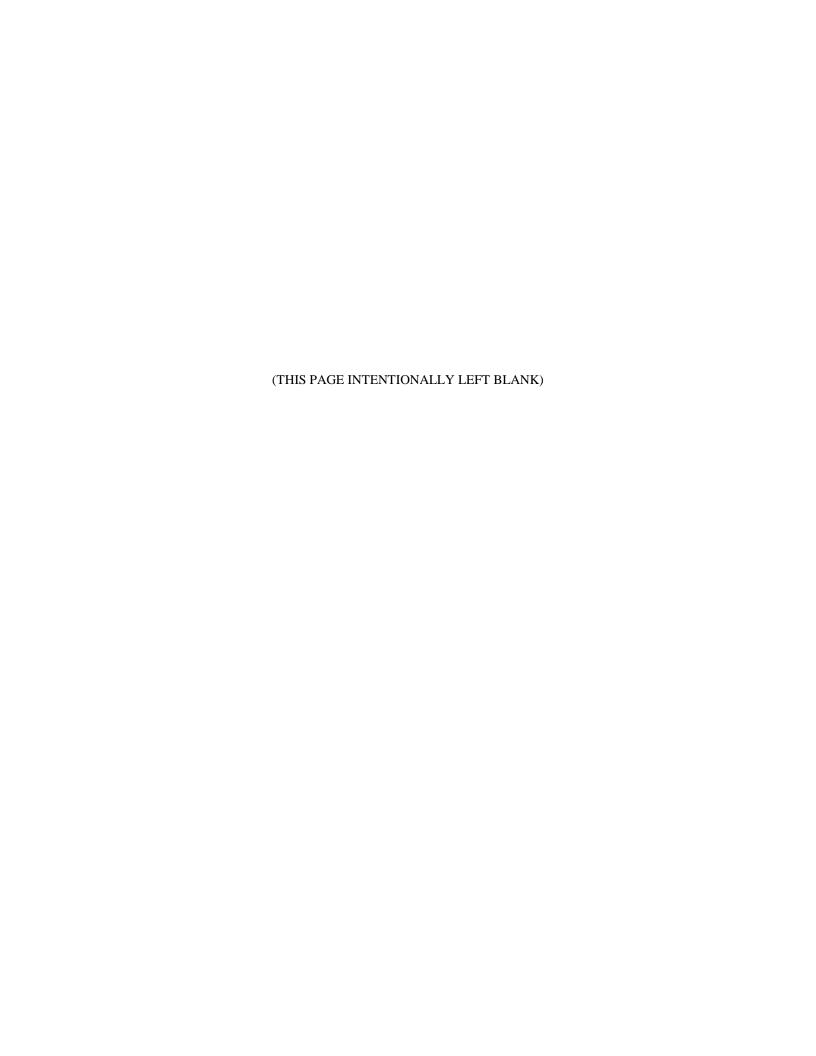
Additional Water Supply Projects. The purpose of the Regional Water Facilities Master Plan ("Master Plan") is to develop a detailed planning document that presents the list of facilities needed by CWA through 2030. CWA's current Capital Improvement Program was developed in 1987 for facilities needed through 2010. The Master Plan is analyzing three primary alternatives for delivering future water supplies. These include conveyance of supplies from the north, west or east. The supply from the north alternative includes Pipeline 6. This pipeline would be the sixth pipeline connecting CWA to MWD. The supply from the west alternative includes construction of a regional seawater desalination plant in Carlsbad on the Encina Power plant site. This alternative would serve desalinated water along the coastal zone in the City of Carlsbad and potentially the City of Oceanside. The remaining production from the plant would be conveyed to CWA's existing system for delivery to the remainder of CWA's service areas. The third option, supply from the east, would build a new conveyance to transport conserved agricultural water from IID to the San Diego region. CWA has two options for this project. One is to construct the project as a CWA only project in the United States or partner with Mexico on the construction of a binational facility.

CWA is analyzing these three alternatives. A comparison of the alternatives will be presented to CWA Board of Directors in July 2002. Guidance from the Board on the direction CWA should proceed is expected by the end of calendar year 2002.



APPENDIX F

AUDITED FINANCIAL STATEMENTS OF THE CITY OF SAN DIEGO WATER DEPARTMENT FOR YEARS ENDED JUNE 30, 2001 AND JUNE 30, 2000





CALDERON, JAHAM & OSBORN

AN ACCOUNTANCY CORPORATION

CERTIFIED PUBLIC ACCOUNTANTS & CONSULTANTS

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INDEPENDENT AUDITORS' REPORT

The Honorable Mayor, City Council and City Manager of the City of San Diego, California

We have audited the accompanying financial statements of the City of San Diego Water Utility as of June 30, 2001 and 2000 and for the years then ended, listed as Exhibits A, B and C in the foregoing table of contents. These financial statements are the responsibility of the City of San Diego management. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with auditing standards generally accepted in the United States of America and *Government Auditing Standards*, issued by the Comptroller General of the United States. Those standards require that we plan and perform the audits to obtain reasonable assurance about whether the financial statements are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

As described in Note 1 to the financial statements, the financial statements referred to above present only the Water Utility Enterprise fund of the City of San Diego and are not intended to present the financial position of the City of San Diego and results of its operations and the cash flows of its proprietary and similar trust fund types, in conformity with accounting principles generally accepted in the United States of America.

In our opinion, such financial statements present fairly, in all material respects, the financial position of the City of San Diego Water Utility at June 30, 2000 and 1999 and the results of its operations and its cash flows for the years then ended in conformity with accounting principles generally accepted in the United States of America.

In accordance with Government Auditing Standards, we have also issued our report dated November 22, 2000 on our consideration of the City of San Diego's internal control over financial reporting and our tests of its compliance with certain provisions of laws, regulations, contracts and grants. The report is an integral part of an audit performed in accordance with Government Auditing Standards and should be read in accordance with this report in considering the results of our audit.

The scope of our audits did not include the supplemental information listed as Exhibits D, E & F, Schedules and Tables listed in the foregoing table of contents. Such information has not been subjected to the auditing procedures applied in the audits of the basic financial statements and, accordingly, we express no opinion on it.

November 22, 2001

Caldwon, Jaham + Osborn

		June 30		
		2001		2000
ASSETS				
UTILITY PLANT:				
Land Plants, dams, canals, laterals and equipment Other	\$	4,824,291 687,012,377 465,001	\$	4,824,291 669,181,980 465,001
Construction in progress		471,318,386		364,037,719
Total		1,163,620,055		1,038,508,991
Less Accumulated Depreciation		212,917,362		201,741,960
TOTAL UTILITY PLANT - NET		950,702,693		836,767,031
ADVANCES TO CITY OF SAN DIEGO INTERNAL SERVICE FUNDS		14,013,643	*****	12,542,798
CONSTRUCTION GRANTS RECEIVABLE		50,040		1,142,934
DEFEERRED CHARGES		8,278,620	_	8,585,235
CURRENT ASSETS:				
Cash or Equity in Pooled Cash and Investments:				
Water Operating Fund		229,706,103 2,467,778		239,185,182 1,791,026
Total Cash or Equity in Pooled Cash and Investments		232,173,881		240,976,208
Accrued Interest Receivable		3,039,879		3,018,110
Accounts Receivable - Principally from Customers (Less Allowance for Doubtful Accounts of \$1,320,855 and \$1,737,390, Respectively)		37,115,746		37,090,150
Prepaid Expenses		114,321,695		206,577,175
Inventory of Water in Storage		12,798,650		9,960,559
Due from Component Unit		17,333,426		6,048,771
Operating Materials and Supplies, Principally at Average Cost		202,790		216,071
TOTAL CURRENT ASSETS		416,986,067		503,887,044
TOTAL ASSETS	\$	1,390,031,063	\$	1,362,925,042

See Notes to Financial Statements.

Manual Regulary Manual Reg		_	June 30		
LONG-TERM DEBT: Installment Purchase Agreement			2001		2000
Installment Purchase Agreement. \$ 385,000,000 \$ 235,749 \$	LIABILITIES AND EQUITY				
Capital Lease Obligations. 103,871 235,749 Total. 385,103,871 385,235,749 Less Amounts Due Within One Year. 6,883,871 131,878 TOTAL LONG-TERM DEBT. 378,220,000 385,103,871 CURRENT LIABILITIES: 29,833,354 32,341,955 Accound Payroll. 2,803,305 1,741,441 Accound Payroll. 2,809,305 1,741,441 Accound Payroll. 3,896,866 32,341,955 Accound SPSP Contributions Payable. 3,896,866 32,341,945 Accound SPSP Contributions Payable. 3,554,229 3,554,229 Long-Term Debt Due Within One Year. 8,838,871 131,878 Long-Term Debt Due Within One Year. 9,883,871 131,878 Long-Term Debt Due Within One Year. 9,883,871 131,878 Long-Term Debt Due Within One Year. 1,856,429 3,856,429 Consumers' Guarantee Deposits. 1,856,429 3,856,429 TOTAL CURRENT LIABILITIES. 58,034,745 55,499,342 Deferred Credits. 1,022,499 1,022,499 TOTAL LIABILITIES. 4	LONG-TERM DEBT:				
Total		\$		\$	
Less Amounts Due Within One Year. 3,883,871 131,878	Capital Lease Obligations	_	103,871	_	235,749
TOTAL LONG-TERM DEBT 378,220,000 385,103,871 CURRENT LIABILITIES:	Total		385,103,871		385,235,749
CURRENT LIABILITIES: 29,833,354 32,341,955 Accounts Payable	Less Amounts Due Within One Year		6,883,871		131,878
Accounts Payable. 29,833,354 32,341,955 Accounted Payroll. 2,009,305 1,741,441 Accounted Annual Leave and Sick Leave. 3,668,969 323,789 Accounted SPSP Contributions Payable. 331,910 281,494 Interest Accounted on Long-Term Debt. 8,558,429 8,565,941 Long-Term Debt Due Within One Year 6,833,871 11,878 Lability Claims. 1,908,438 947,386 Consumer's Guarantee Deposits. 1,908,438 947,386 Consumer's Guarantee Deposits. 1,908,438 947,386 Consumer's Guarantee Deposits. 58,034,745 55,499,342 DEFERRED CREDITS: 58,034,745 55,499,342 DEFERRED CREDITS: 58,034,745 55,499,342 Deferred Contributions in Aid of Construction. 1,023,421 1,022,499 Other Deferred Credits. 6,743,921 5,074,628 TOTAL DEFERRED CREDITS: 7,767,342 6,097,127 TOTAL LIABILITIES. 444,022,087 446,700,340 COMMITMENTS AND CONTINGENCIES EQUITY: Contributions in Aid of Construction: 9,748,284 9,467,849 State. 12,018,878 12,018,878 Municipal. 1,023,491 12,018,8	TOTAL LONG-TERM DEBT		378,220,000		385,103,871
Accrued Payroll. 2,080.305 1,741,441 Accrued Annual Leave and Sick Leave. 3,689.596 3,233.789 Accrued SPSP Contributions Payable 331.910 281.494 Interest Accrued on Long-Tem Debt. 8,555.429 8,565.941 Long-Term Debt Due Within One Year 6,883.871 131.878 Llability Claims. 1,090.623 4,188.905 Pension Liability. 1,308.438 947.386 Consumers' Guarantee Deposits. 1,308.438 947.386 Consumers' Guarantee Deposits. 55,099.342 DEFERRED CREDITS: 58,034,745 55,499.342 DEFERRED CREDITS: 1,022.499 Other Deferred Credits. 6,743.921 5,074.628 TOTAL DEFERRED CREDITS. 7,767.342 6,097,127 TOTAL LIABILITIES. 444,022,087 446,700,340 COMMITMENTS AND CONTINGENCIES EQUITY:	CURRENT LIABILITIES:				
Accrued Annual Leave and Sick Leave			29,633,354		32,341,955
Accrued SPSP Contributions Payable			2,060,305		1,741,441
Interest Accrued on Long-Term Debt. 8,565,422 8,565,941 131,878 Liability Claims. 6,833,871 131,878 Liability Claims. 1,060,623 4,188,905 Pension Liability Claims. 1,308,436 947,386 Consumers' Guarantee Deposits. 4,528,121 4,066,553 TOTAL CURRENT LIABILITIES 58,034,745 55,499,342 DEFERRED CREDITS: Deferred Contributions in Aid of Construction 1,023,421 1,022,499 Other Deferred Credits. 6,743,921 5,074,628 TOTAL DEFERRED CREDITS 7,767,342 6,097,127 TOTAL LIABILITIES 444,022,087 446,700,340 COMMITMENTS AND CONTINGENCIES EQUITY: Contributions in Aid of Construction: 9,746,284 9,467,849 EQUITY: Contributions in Aid of Construction: 9,746,284 9,467,849 State. 9,746,284 12,016,878 12,016,878 12,016,878 Municipal. 47,554,527 48,115,435 Local. 9,746,287 397,293,527 381,077,997 Capacity. 91,016,225 92,965 92,966,058 Developers. 397,293,527 381,077,997 Capacity. 91,016,225 92,765 929,765 1041 Contributions in Aid of Construction. 659,728,959 625,213,907 Retained Earnings: Invested in Assets of the System 929,765 929,765 Designated for Subsequent Years' Capital Projects and Operations. 52,167,042 81,274,890 TOTAL Equity. 946,008,976 916,224,702 TOTAL Equity. 946,008,976 916,224,702	Accrued Annual Leave and Sick Leave		3,669,696		3,233,789
Long-Term Debt Due Within One Year	Accrued SPSP Contributions Payable		331,910		281,494
Liability Claims	Interest Accrued on Long-Term Debt		8,558,429		8,565,941
Pension Liability	Long-Term Debt Due Within One Year		6,883,871		131,878
Consumers' Guarantee Deposits. 4,528,121 4,066,553 TOTAL CURRENT LIABILITIES. 58,034,745 55,499,342 DEFERRED CREDITS:			1,060,623		4,188,905
Consumers' Guarantee Deposits. 4,528,121 4,066,553 TOTAL CURRENT LIABILITIES. 58,034,745 55,499,342 DEFERRED CREDITS:	Pension Liability		1,308,436		947,386
Deferred Contributions in Aid of Construction		_	4,528,121		4,066,553
Deferred Contributions in Aid of Construction	TOTAL CURRENT LIABILITIES	_	58,034,745	_	55,499,342
Other Deferred Credits 6,743,921 5,074,628 TOTAL DEFERRED CREDITS 7,767,342 6,097,127 TOTAL LIABILITIES 444,022,087 446,700,340 COMMITMENTS AND CONTINGENCIES EQUITY: Contributions in Aid of Construction: Federal 9,746,284 9,467,849 State 12,016,878 12,016,878 Municipal 44,154,352 46,115,435 Local 2,596,058 2,596,058 Developers 397,293,527 381,077,397 Capacity 189,591,920 173,010,525 Other 929,765 929,765 Total Contributions in Aid of Construction 659,728,959 625,213,907 Retained Earnings: 234,112,975 209,735,905 Designated for Subsequent Years' Capital Projects and Operations 52,167,042 81,274,890 Total Retained Earnings 286,280,017 291,010,795 TOTAL EQUITY 946,008,976 916,224,702	DEFERRED CREDITS:				
Other Deferred Credits 6,743,921 5,074,628 TOTAL DEFERRED CREDITS 7,767,342 6,097,127 TOTAL LIABILITIES 444,022,087 446,700,340 COMMITMENTS AND CONTINGENCIES EQUITY: Contributions in Aid of Construction: Federal 9,746,284 9,467,849 State 12,016,878 12,016,878 Municipal 47,554,527 46,115,435 Local 2,596,058 2,596,058 Developers 397,293,527 381,077,397 Capacity 198,591,920 173,010,525 Other 929,765 929,765 Total Contributions in Aid of Construction 659,728,959 625,213,907 Retained Earnings: 234,112,975 209,735,905 Invested in Assets of the System 234,112,975 209,735,905 Designated for Subsequent Years' Capital Projects and Operations 52,167,042 81,274,890 Total Retained Earnings 286,280,017 291,010,795 TOTAL EQUITY 946,008,976 916,224,702	Deferred Contributions in Aid of Construction		1 023 421		1 022 499
TOTAL LIABILITIES		_			
COMMITMENTS AND CONTINGENCIES EQUITY: Contributions in Aid of Construction: Federal	TOTAL DEFERRED CREDITS	_	7,767,342		6,097,127
EQUITY: Contributions in Aid of Construction: Federal	TOTAL LIABILITIES		444,022,087	-	446,700,340
Contributions in Aid of Construction: 9,746,284 9,467,849 Federal	COMMITMENTS AND CONTINGENCIES				
Federal 9,746,284 9,467,849 State 12,016,878 12,016,878 Municipal 47,554,527 46,115,435 Local 2,596,058 2,596,058 Developers 397,293,527 381,077,397 Capacity 189,591,920 173,010,525 Other 929,765 929,765 Total Contributions in Aid of Construction 659,728,959 625,213,907 Retained Earnings: 234,112,975 209,735,905 Designated for Subsequent Years' Capital Projects and Operations 52,167,042 81,274,890 Total Retained Earnings 286,280,017 291,010,795 TOTAL EQUITY 946,008,976 916,224,702	EQUITY:				
State	Contributions in Aid of Construction:				
State	Federal		9,746,284		9.467.849
Local	State		12,016,878		
Local	Municipal		47,554,527		46,115,435
Capacity	Local		2,596,058		
Other 929,765 929,765 Total Contributions in Aid of Construction 659,728,959 625,213,907 Retained Earnings: 234,112,975 209,735,905 Designated for Subsequent Years' Capital Projects and Operations 52,167,042 81,274,890 Total Retained Earnings 286,280,017 291,010,795 TOTAL EQUITY 946,008,976 916,224,702			397,293,527		381,077,397
Other 929,765 929,765 Total Contributions in Aid of Construction 659,728,959 625,213,907 Retained Earnings: 234,112,975 209,735,905 Designated for Subsequent Years' Capital Projects and Operations 52,167,042 81,274,890 Total Retained Earnings 286,280,017 291,010,795 TOTAL EQUITY 946,008,976 916,224,702	Capacity		189,591,920		173,010,525
Retained Earnings: 234,112,975 209,735,905 Invested in Assets of the System	Other		929,765		929,765
Invested in Assets of the System	Total Contributions in Aid of Construction		659,728,959		625,213,907
Invested in Assets of the System	Retained Earnings:				
Designated for Subsequent Years' Capital Projects and Operations. 52,167,042 81,274,890 Total Retained Earnings. 286,280,017 291,010,795 TOTAL EQUITY. 946,008,976 916,224,702			234 112 975		200 735 005
TOTAL EQUITY	Designated for Subsequent Years' Capital Projects and Operations	_			
	Total Retained Earnings		286,280,017	_	291,010,795
	TOTAL FOLITY		046 000 070		046 004 700
TOTAL LIABILITIES AND EQUITY	1		340,000,376	-	910,224,702
	TOTAL LIABILITIES AND EQUITY	\$	1,390,031,063	\$	1,362,925,042

Water Utility STATEMENTS OF INCOME AND RETAINED EARNINGS YEARS ENDED JUNE 30, 2001 AND 2000

EXHIBIT B

		Year Ended June 30		
		2001		2000
OPERATING REVENUES:				
Sales of Water: Inside City:				
Domestic	\$	115,380,542	\$	118,937,337
Commercial and Industrial		67,541,340		72,955,451
Reclaimed Water		3,525,321		0
Outside City:				
Domestic, Commercial and Industrial		109,991		81,709
Other Utilities		6,580,655		6,354,428
Irrigation Districts		634,995		594,259
Total Sales of Water	_	193,772,844	-	198,923,184
Other Operating Revenues:				
Recreation		1,272,055		1,424,067
Fire Services and Back Flow Device Maintenance.		1,933,590		1,870,213
Rent from Use of Facilities.		3,441,577		3,824,107
Customer Service Charges		409,593		205.922
Storage and Transportation of Water from Other Agencies		208,774		134,623
Other Operating Grants		905,070		1,686,627
Microllaneous (Mat)		•		
Miscellaneous (Net)		10,346,475		14,408,895
Total Other Operating Revenues	_	18,517,134		23,554,454
TOTAL OPERATING REVENUES		212,289,978		222,477,638
OPERATING EXPENSES	_	223,901,388		204,389,613
OPERATING INCOME (LOSS)	_	(11,611,410)		18,088,025
NONOPERATING REVENUES (EXPENSES):				
TOTO LIGHT ING REVEROLD (EXPENDED).				
Interest Income		18,528,367		12,411,960
Interest Expense		(18,667,690)		(18,707,396)
Gain (Loss) on Sale/Retirement of Fixed Assets		747,308		258,668
Financing Costs Under Installment Purchase Agreement		(306,615)		(306,615)
Sale of Gravel, Land, etc		23,940		16,617
Non-Operating Grants		1,272,454		2,375,066
Other		6.698.834		11,349,354
TOTAL NONOPERATING REVENUES (EXPENSES)		8,296,598		7,397,654
101AL NONOFERATING REVENUES (EXPENSES)		6,290,396		7,397,004
Operating Transfers from Primary Government		67,144		0
Operating Transfers to Primary Government		(1,212,868)		(810,700)
Transfers to Primary Government	•	(270,242)		0
NET INCOME (LOSS)		(4,730,778)		24,674,979
Retained Earnings at Beginning of Year as Restated		291,010,795	_	266,335,816
RETAINED EARNINGS AT END OF YEAR	•	206 200 247	e	204 242 727
	\$_	286,280,017	\$	291,010,795
See Notes to Financial Statements.				

CASH FLOWS FROM OPERATING ACTIVITIES \$ 18,088,025		Year Ended June 30			
Operating Income (Loss) \$ (11,611,410) \$ 18,088,025 Adjustments to Reconcile Operating Income (Loss) to Met Cash Provided By (Used For) Operating Activities: Income (Loss) to Met Cash Provided By (Used For) Operating Activities: Depreciation and Amortization. Changes in Assetts and Liabilities: (Increase) Decrease in Inventory of Water in Storage. (2,824,810) (2,314,500) ((Increase) Decrease in Inventory of Water in Storage. (2,255,980) ((Increase) Decrease in Inventory of Water in Storage. (2,276,801) (1,246,855) (5,268,800) (Increase) Decrease in Due From Other Funds. (11,284,655) (5,268,800) (Increase) Decrease in Due From Other Funds. (11,284,655) (5,268,800) (Increase) Decrease in Due From Other Funds. (12,685,800) (Increase) (Decrease) in Accrued Leave & Accrued SPSP (11,681,681) (11,604,818)			2001	notes	2000
Adjustments to Reconcile Operating Income (Loss) to Net Cash Provided By (Used For) Operating Activities: Cash Provided By (Used For) Operating Activities:	CASH FLOWS FROM OPERATING ACTIVITIES				
Depreciation and Amortization.	Operating Income (Loss)	\$	(11,611,410)	\$	18,088,025
Changes in Assets and Liabilities: (Increase) Decrease in Inventory of Water in Storage. (Increase) Decrease in Inventory of Water in Storage. (Increase) Decrease in Inventory of Water in Storage. (Increase) Decrease in Due From Other Funds. (Increase) Decrease in Lability Claims. (Increase) Decrease in Lability. (Increase) Decrease in Lability.					
(Increase) Decrease in Accounts Receivable - Net. (25,968) (7,882,282) (1,676,282) (2824,810) (3,314,500) (1,676,829) Decrease in Inventory of Water in Storage (2824,810) (3,314,500) (1,676,829) Decrease in Inventory of Water Funds. (11,284,655) (5,288,600) (1,676,829) Decrease in Due From Other Funds. (12,284,655) (2,288,600) (1,676,829) Decrease in Due From Other Funds. (12,284,655) (2,288,600) (1,676,829) Decrease in Due From Other Funds. (12,688,600) (14,064,818) Increase (Decrease) in Accounts Payable. (2,708,601) (14,064,818) Decrease (Decrease) in Accounts Payable. (3,676,829) Decrease (Decrease) in Liability Claims. (3,128,282) (2,164,095) Increase (Decrease) in Pension (Liability) (1,670,100) Decrease (Decrease) in Pension (Liability) Decrease (Decrease) in Pension (Liability) Decrease (Decrease) in Deferred Credits. (1,670,215) Decrease (Decrease) in Deferred Credits. (1,670,215) Decrease (Decrease) in Deferred Credits. (1,698,634) Decrease (Decrease)			12,528,800		14,136,250
(Increase) Decrease in Prepaid Expenses. 92.255.480 44.153.9873 (Increase) Decrease in Due From Other Funds. (11244,655) (5.288,800) Increase (Decrease) in Accounts Payable. (2,708,601) 14,064,818 Increase (Decrease) in Accounts Payable. (2,708,601) 14,064,818 Increase (Decrease) in Accounts Payable. (3128,282) (2,164,095) Increase (Decrease) in Liability (21818). (3128,282) (2,164,095) Increase (Decrease) in Pension Liability. (361,050) 333,199 Increase (Decrease) in Pension Liability. (361,050) 331,050 (371,151) (371,1	(Increase) Decrease in Accounts Receivable - Net				(7,682,292)
(Increase) Decrease in Due From Other Funds. (11,244,655) (5,288,000) Increase (Decrease) in Accounts Payable. (2,708,001) 14,084,818 Increase (Decrease) in Accounts Payable. (2,104,085) 14,084,818 Increase (Decrease) in Accounts Payable. (3,128,282) (2,164,085) Increase (Decrease) in Liability Claims. (3,128,282) (2,164,085) Increase (Decrease) in Deficial Circlettis. (3,128,282) (2,164,085) Increase (Decrease) in Deficial Circlettis. (3,128,282) (2,164,085) Increase (Decrease) in Deficial Circlettis. (1,670,215) 571,516 (6,988,834) 11,349,354 (11,349,354) Increase (Decrease) in Deficial Circlettis. (1,670,215) 571,516 (6,988,834) Increase (Decrease) in Deficial Circlettis. (1,698,834) Increase (Decrease) in Deficial Circlettis. (1,698,834) Increase (Decrease) (Decrease) in Deficial Circlettis. (1,698,834) Increase (Decrease) (Decreas					• • • •
Increase (Decrease) in Accounts Payable. (2,708,601) 14,064,818 Increase (Decrease) in Accounts Payable. 805,187 Contributions Payable. 301,818 Increase (Decrease) in Itability (Claims. (3,12,822) (2,184,089) Increase (Decrease) in Dension Liability 381,050 353,199 Increase (Decrease) in Deferred Credits (1,070,215 571,518 Cliber Nonoperating Revenue. (8,98,834 11,349,354 NET CASH PROVIDED BY (USED FOR) OPERATING ACTIVITIES. 82,736,212 85,036,988 CASH FLOWS FROM NONCAPITAL FINANCING ACTIVITIES COperating Transfers from (Transfers to) Primary Government. (270,242)					
Increase (Decrease) in Accrued Payroll, Accrued Leave & Accrued SPSP 805, 187 749, 320 Increase (Decrease) in Liability Claims. (3,128,282) (2,184,095) Increase (Decrease) in Pension Liability 381,050 533,199 Increase (Decrease) in Pension Liability 381,050 533,199 Increase (Decrease) in Deferred Credits. 1,870,215 571,516 7,5					• • • • •
Increase (Decrease) in Liability Claims	Increase (Decrease) in Accrued Payroll, Accrued Leave & Accrued SPSP		, , ,		
Increase (Decrease) in Pension Liability. 331,000 353,109 Increase (Decrease) in Deferred Credits. 1,670,215 571,518 Cither Nonoperating Revenue. 6,688,834 11,349,354			•		
Increase (Decrease) in Deferred Credits.					
Cher Nonoperating Revenue			-		•
NET CASH PROVIDED BY (USED FOR) 82,736,212 85,036,988			, , -		
CASH FLOWS FROM NONCAPITAL FINANCING ACTIVITIES Coperating Transfers from (Transfers to) Primary Government.		_		-	
Operating Transfers from (Transfers to) Primary Government			82,736,212		85,036,988
Operating Transfers from (Transfers to) Primary Government				-	
Transfers from (Transfers to) Primary Government. (27,042) 0 Payments for Advances and Deposits. (1,009,277) 2,290,081 NET CASH PROVIDED BY (USED FOR) NONCAPITAL FINANCING ACTIVITIES. (2,425,243) 1,479,381 CASH FLOWS FROM CAPITAL AND RELATED FINANCING ACTIVITIES Proceeds from Contributed Capital. 21,334,218 21,918,669 Proceeds from Non-Operating Grants. 1,272,454 2,375,086 Acquisition of Fixed Assets. (111,878,763) (82,397,376) Proceeds from Sale of Fixed Assets. (111,878,763) (82,397,376) Proceeds from Sale of Fixed Assets. (113,878) (142,057) Principal Payment on Capital Lesse. (131,878) (142,057) Interest Paid on Long-Term Debt. (18,675,202) (18,729,537) NET CASH PROVIDED BY (USED FOR) CAPITAL AND RELATED FINANCING ACTIVITIES Interest and Dividends Received on Investments. (107,619,894) (76,681,950) CASH FLOWS FROM INVESTING ACTIVITIES Interest and Dividends Received on Investments. 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES. (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208					
Payments for Advances and Deposits. (1,009,277) 2,290,081 NET CASH PROVIDED BY (USED FOR) NONCAPITAL FINANCING ACTIVITIES. (2,425,243) 1,479,381 CASH FLOWS FROM CAPITAL AND RELATED FINANCING ACTIVITIES Proceeds from Contributed Capital 2,134,218 21,918,669 Proceeds from Non-Operating Grants. 1,272,454 2,375,086 Acquisition of Fixed Assets. (111,678,763) (82,397,376) Proceeds from Sol of Fixed Assets. (111,678,763) (82,397,376) Proceeds from Sol of Fixed Assets. (111,678,063) (82,397,376) Proceeds from Sol of Fixed Assets. (111,678,073) (82,397,376) Proceeds from Sol of Fixed Assets. (111,678,073) (82,397,376) Proceeds from Sol of Fixed Assets. (111,678,073) (124,057) Interest Paid on Long-Term Debt. (18,675,202) (18,729,537) NET CASH PROVIDED BY (USED FOR) CAPITAL AND RELATED FINANCING ACTIVITIES Interest and Dividends Received on Investments. 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES. (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208	Transfers from (Transfers to) Primary Government				,
CASH FLOWS FROM CAPITAL AND RELATED FINANCING ACTIVITIES	Payments for Advances and Deposits		•		2,290,081
Proceeds from Contributed Capital			(2,425,243)	_	1,479,381
Proceeds from Non-Operating Grants	CASH FLOWS FROM CAPITAL AND RELATED FINANCING ACTIVITIES				
Proceeds from Non-Operating Grants.	Proceeds from Contributed Conital				
Acquisition of Fixed Assets. (111,678,783) (82,397,376) Proceeds from Sale of Fixed Assets. 259,277 275,285 Principal Payment on Capital Lease. (131,878) (124,057) Interest Paid on Long-Term Debt. (18,675,202) (18,729,537) NET CASH PROVIDED BY (USED FOR) CAPITAL AND RELATED FINANCING ACTIVITIES. (107,619,894) (76,681,950) CASH FLOWS FROM INVESTING ACTIVITIES Interest and Dividends Received on Investments. 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES. 18,506,598 11,408,238 NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208					
Proceeds from Sale of Fixed Assets					
Principal Payment on Capital Lease. (131,878) (124,057) Interest Paid on Long-Term Debt. (18,675,202) (18,729,537) NET CASH PROVIDED BY (USED FOR) CAPITAL AND RELATED FINANCING ACTIVITIES (107,619,894) (76,681,950) CASH FLOWS FROM INVESTING ACTIVITIES 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES 18,506,598 11,408,238 NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001 \$ 232,173,881 \$ 240,976,208					
Interest Paid on Long-Term Debt	Principal Payment on Capital Lease		,		
CAPITAL AND RELATED FINANCING ACTIVITIES. (107,619,894) (76,681,950) CASH FLOWS FROM INVESTING ACTIVITIES 18,506,598 11,408,238 Interest and Dividends Received on Investments. 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES. 18,506,598 11,408,238 NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS. (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208	Interest Paid on Long-Term Debt		(18,675,202)		
CAPITAL AND RELATED FINANCING ACTIVITIES. (107,619,894) (76,681,950) CASH FLOWS FROM INVESTING ACTIVITIES 18,506,598 11,408,238 Interest and Dividends Received on Investments. 18,506,598 11,408,238 NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES. 18,506,598 11,408,238 NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS. (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208	NET CASH PROVIDED BY (USED FOR)				
Interest and Dividends Received on Investments		_	(107,619,894)	_	(76,681,950)
NET CASH PROVIDED BY (USED FOR) INVESTING ACTIVITIES	CASH FLOWS FROM INVESTING ACTIVITIES				
INVESTING ACTIVITIES	Interest and Dividends Received on Investments		18,506,598	_	11,408,238
NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS. (8,802,327) 21,242,657 Cash and Cash Equivalents at July 1, 2000. 240,976,208 219,733,551 CASH AND CASH EQUIVALENTS AT JUNE 30, 2001. \$ 232,173,881 \$ 240,976,208					
Cash and Cash Equivalents at July 1, 2000	INVESTING ACTIVITIES	_	18,506,598	_	11,408,238
CASH AND CASH EQUIVALENTS AT JUNE 30, 2001	NET INCREASE (DECREASE) IN CASH AND CASH EQUIVALENTS		(8,802,327)		21,242,657
CASH AND CASH EQUIVALENTS AT JUNE 30, 2001	Cash and Cash Equivalents at July 1, 2000		240 076 209		240 722 554
			240,370,200	-	218,733,331
See Notes to Financial Statements.	CASH AND CASH EQUIVALENTS AT JUNE 30, 2001	\$	232,173,881	\$	240,976,208
	See Notes to Financial Statements.	,			

NOTES TO THE FINANCIAL STATEMENTS

YEARS ENDED JUNE 30, 2001 AND JUNE 30, 2000

1. ORGANIZATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Section Fifty-Three of the Charter of the City of San Diego (the "City") establishes a separate utility (the "Water Utility") which is included in the administrative organization of the City; its financial information and records are established and maintained by the City.

The accounting policies of the Water Utility conform to accounting principles generally accepted in the United States of America (GAAP) as applicable to governmental units. The following is a summary of the more significant of such policies:

a. Basis of Presentation

The financial activities of the Water Utility are accounted for and reported as an Enterprise Fund of the City. The measurement focus is upon determination of net income, financial position and changes in cash flows.

Enterprise Funds are used to account for operations (a) that are financed and operated in a manner similar to private business enterprises where the intent of the governing body is that the costs (expenses, including depreciation) of providing goods or services to the general public on a continuing basis be financed or recovered primarily through user charges; or (b) where the governing body has decided that periodic determination of revenues earned, expenses incurred, and/or net income is appropriate for capital maintenance, public policy, management control, accountability or other purposes.

The Water Utility adopts all Financial Accounting Standards Board (FASB) Statements and Interpretations issued on or before November 30, 1989, unless those pronouncements conflict with or contradict Government Accounting Standards Board (GASB) pronouncements.

b. Basis of Accounting

The Water Utility uses the accrual basis of accounting. Under the accrual basis of accounting, revenues are recognized when earned, and expenses are recorded when incurred. Estimated unbilled revenues are recognized at the end of each fiscal year. This estimated amount is based on billings during the month following the close of the fiscal year.

c. Cash and Investments

At July 1, 1997, the City of San Diego adopted GASB Statement No. 31, "Accounting and Financial Reporting for Certain Investments and for External Investment Pools," which requires certain investments to be reported at fair value. At June 30, 2001 and 2000 respectively, all such investments are presented at fair value.

d. <u>Inventories</u>

Inventories, which consist of water in storage, are valued at the lower of cost (first-in, first-out basis) or market. Such inventories are expensed when consumed.

e. Utility Plant

Fixed assets owned by the Water Utility are stated at cost if purchased or constructed, or at estimated fair market value if received as a donation. Depreciation has been provided over the estimated useful lives using the straight-line method. The estimated useful lives are as follows:

Plants, dams, canals, laterals and equipment: 3-150 years.

1. ORGANIZATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES (Continued)

f. Employee Annual Leave

The City provides annual leave to cover both vacation and sick leave. It is the City policy to permit employees to accumulate between 6.25 weeks and 17.5 weeks, depending on hire date, of earned but unused annual leave. Accumulation of these earnings will be paid to employees upon separation from service.

In addition, sick leave earned through August 1981 by employees hired prior to July 1, 1975, is payable upon separation under the following conditions: (1) 50% of the employee's accrued amount upon retirement or death, or (2) 25% of the employee's accrued amount upon resignation. Annual leave benefits are recorded as a liability in the period earned by the employees.

g. Claims and Judgments

Costs of claims and judgments are recorded when the liability is incurred and measurable.

h. Contributions in Aid of Construction

Additions to contributions in aid of construction (approximately \$34,515,000 in 2001 and \$43,284,000 in 2000) represents facilities or cash contributed for facility construction by property owners or government agencies. Cash contributions in aid of construction for meters and service are classified as deferred credits until the facilities have been installed.

i. Allocation for System Expansion

A percentage of water sales is allocated by ordinance for capital improvements.

j. Estimates

The preparation of financial statements in conformity with GAAP requires management to make estimates and assumptions that affect the reported amount of certain assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the related reported amounts of revenues and expenses during the reporting period. Actual results could differ from those estimates. Management believes that the estimates are reasonable.

2. CASH AND INVESTMENTS

a. Cash or Equity in Pooled Cash and Investments

Cash resources of the Water Utility are combined with the cash resources of the City to form a pool of cash that is managed by the City Treasurer. As provided for by the Government Code, the cash balance of substantially all City funds and certain entities are pooled and invested by the City Treasurer for the purpose of increasing interest earnings through investment activities. The Water Utility's net share of the total pooled cash and investments is included in the accompanying balance sheet under the caption "Cash or Equity in Pooled Cash and Investments". Interest earned on pooled investments is deposited to certain of the participating City funds and entities, including the Water Utility, based upon each fund's and each entity's average daily deposit balance during the allocation period with all remaining interest deposited to the City's General Fund.

The City may transact business only with banks, savings and loans, and investment securities dealers who are primary dealers regularly reporting to the New York Federal Reserve Bank. Exceptions to this rule can be made only upon written authorization of the City Treasurer. Authorized cash deposits and

2. CASH AND INVESTMENTS (Continued)

investments are governed by state law, as well as by the City's own written investment policy. Within the context of these limitations, permissible investments include (1) obligations of the U.S. government and federal agencies, (2) commercial paper rated A-1 by Standard & Poor's Corporation or P-1 by Moody's Commercial Paper Record, (3) bankers' acceptances, (4) negotiable and/or non-negotiable certificates of deposit and non-negotiable time deposits issued by a nationally or state chartered bank or a state or federal savings and loan association, (5) repurchase and reverse repurchase agreements, (6) the local agency investment fund established by the state treasurer and (7) financial futures contracts which are used to offset an existing financial position and not for outright speculation.

b. Reverse Repurchase Agreements

Investment policies permit the City to enter into reverse repurchase agreements which is a sale of securities with a simultaneous agreement to repurchase them in the future at the same price plus a contract rate of interest. The market value of the securities underlying reverse repurchase agreements normally exceeds the cash received providing the dealers a margin against a decline in the market value of the securities. If the dealers default on their obligations to resell these securities to the City or provide securities of cash or equal value, the City could suffer an economic loss equal to the difference between the market value plus accrued interest of the underlying securities and the reverse repurchase agreement obligation, including accrued interest payable. In Fiscal Year 2001, however, the City did not enter into any reverse repurchase agreements. As such, there was no such credit exposure at year-end.

Deposits and investments are generally exposed to two types of risk; credit risk and market risk. Credit risk is the risk that a governmental entity will not be able (a) to recover deposits if the depository financial institution fails or (b) to recover the value of investment or collateral securities that are in the possession of an outside party if the counterparty to the investment or deposit transaction fails. Market risk is the risk that the value of an investment will decline.

Deposits may be categorized as follows: (1) Insured or collateralized with securities held by the entity or by its agent in the entity's name, (2) Collateralized with securities held by the pledging financial institution's trust department or agent in the entities name, (3) Uncollateralized.

Investments may be categorized as follows: (1) Insured or registered, with securities held by the entity or its agent in the entity's name, (2) Uninsured and unregistered, with securities held by the counterparty's trust department or agent in the entity's name, (3) Uninsured and unregistered, with securities held by the counterparty, or by its trust department or agent but not in the entity's name.

In accordance with governmental reporting standards, the City has classified its deposits and investments by categories of credit risk. Information pertaining to the City's cash and investment pool may be found in the City's Comprehensive Annual Financial Report.

3. LONG-TERM DEBT

The City Charter provides that the bonded indebtedness for the development, conservation and furnishings of water cannot exceed 15% of the most recent assessed valuation of all real and personal property of the City subject to direct taxation, and 10% for other municipal improvements. At June 30, 2001, such limits for the City were \$3,469,727 and \$2,313,151 respectively.

3. LONG-TERM DEBT (Continued)

Type of Obligation	Interest <u>Rates</u>	Maturity _Date_	Original <u>Amount</u>	Balance O June 30, 2001	utstanding June 30, 2000
Installment Purchase Agreement Payable, Series 1998	4.0-5.375%	2029	\$385,000,000	\$385,000,000	\$385,000,000
Capital Lease Obligations	6.0-6.4%	2002	611,215	103,871	235,749
Total Long-Term Debt			<u>\$385,611,215</u>	<u>\$385,103,871</u>	\$385,235,749

The following is a summary of changes in general long-term debt for the year ended June 30, 2001:

Type of Obligation	Balance <u>July 1, 2000</u>	<u>Addi</u>	tions_	Retiren	<u>nents</u>	Balance <u>June 30, 2001</u>
Installment Purchase Agreement Payable, Series 1998	\$385,000,000	\$	0	\$	0	\$385,000,000
Capital Lease Obligations	235,749		0	<u>13</u>	1,878	103,871
Total	\$385,235,749	\$	0	<u>\$13</u>	1,878	<u>\$385,103,871</u>

Annual requirements to amortize long-term debt as of June 30, 2001, including interest payments to maturity are as follows:

Year Ending _June 30,	Installment Purchase Agreement
2002	\$ 25,373,936
2003	25,372,236
2004	25,374,236
2005	25,374,436
2006	25,374,271
Thereafter	583,544,097
Total	710,413,212
Less - Amounts Representing Interest	(325,413,212)
Net Long-Term Debt	\$385,000,000

The City has an installment purchase agreement with San Diego Facilities and Equipment Leasing Corporation (the "Corporation") for the acquisition, construction, installation, and improvement of its water system. The Corporation obtained financing for the project through the issuance of bonds secured by installment payments made to the Corporation by the City. The City has pledged revenues from its Net System to finance these installment payments in an amount equal to the principal and interest requirements of the associated bonds.

4. LEASE COMMITMENTS

Lease Revenue

The Water Utility has operating leases for certain land, buildings, and facilities with tenants and concessionaires who will provide the following minimum annual lease payments:

Year Ending June 30	
2002	\$1,710,892
2003	1,693,522
2004	1,614,057
2005	1,495,170
2006	1,475,769
Thereafter	28,230,908
Total	\$36,220,318

This amount does not include contingent rentals which may be received under certain leases of property on the basis of percentage returns. Contingent rentals amounted to \$1,931,752 in the year ended June 30, 2001.

The City has entered into capital lease agreements during the year for water meters. The total liability for these leases is \$103,871 at June 30, 2001.

5. TRANSACTIONS WITH THE CITY OF SAN DIEGO

The Water Utility has financed the acquisition by the City's Internal Service Funds of certain vehicles and supplies used by the Water Utility. The Internal Service Funds charge the Water Utility for the use of the vehicles and supplies. However, there is no specific provision for the repayment of these advances or interest on them. It is the City's general intent that the advances be repaid as the financial condition of the Internal Service Funds permit.

Included in operating expenses is \$3,003,520 in 2001 and \$2,562,866 in 2000 charged by the City to the Water Utility for indirect general government expenditures incurred by the City. Such charges are based on a pro-rata portion of general government expenditures applicable to the Water Utility.

The Water Utility sells water to the City at commercial rates. Such revenues were approximately \$7,178,377 in 2001 and \$8,626,419 in 2000.

The Water Utility paid approximately \$6,703,004 in 2001 and \$6,014,518 in 2000 for computer services provided by the San Diego Data Processing Corporation, a non-profit corporation, of which the City is the sole member.

The Water Utility paid \$2,631,042 in 2001 and \$4,142,235 in 2000 to the City for right-of-way impact assessment charges for the use of public right-of-way for water distribution systems.

6. CHARGE IN LIEU OF TAXES

Charge in lieu of taxes consists primarily of charges by the Metropolitan Water District of Southern California and the San Diego County Water Authority.

7. PENSION PLANS

The City has a defined benefit plan and various defined contribution pension plans covering substantially all of its employees.

7. PENSION PLANS (Continued)

DEFINED BENEFIT PLAN

a. Plan Description

All of the City and the San Diego Unified Port District (the "District") full-time employees participate in the San Diego City Employees' Retirement System (SDCERS).

SDCERS is a public employee retirement system established in 1927 by the City and administered by a Board of Administration (the "Board") to provide retirement, disability, death and survivor benefits for its members.

In 1963, through an agreement between the City and the District, employees of the District became members of SDCERS.

The Plan is a defined benefit plan which covers all eligible employees of the City and the District. The Plan is a multiple-employer public employee retirement system that acts as a common investment and administrative agent for the City and the District. As a defined benefit plan, retirement benefits are determined primarily by a member's age at retirement, the length of membership service and the member's final compensation earnable based on the highest one-year period.

The Plan provisions applicable to general members are generally applicable to the District's general members and those applicable to lifeguard members are generally applicable to the District's safety members.

All full-time City and District employees are eligible to participate in the Plan. Salaried classified employees become members of the system upon employment. Salaried unclassified employees hired on or after August 11, 1995, become members upon employment.

SDCERS is considered part of the City of San Diego's financial reporting entity and is included in the City's financial reports as a Pension Trust Fund.

SDCERS issues a stand-alone financial report which is available at its office located at 401 B Street, Suite 400, San Diego, California 92101.

b. Funding Policy

SDCERS' funding policy provides for periodic employer contributions at actuarially determined rates that, expressed as percentages of annual covered payroll, are designed to accumulate sufficient assets to pay benefits when due. The normal cost and actuarial accrued liability are determined using the projected unit credit actuarial funding method. Unfunded actuarial accrued liabilities are being amortized as a level percent of payroll over a period of 30 years (20 years remaining).

Employees are required to contribute a percentage of their annual salary to the Plan. Contributions vary according to age at entry into the plan and salary. The City and the District contribute a portion of the employees' share and the remaining amount necessary to fund the system based on an actuarial valuation at the end of the preceding year under the projected unit credit method of actuarial valuation. Prior to June 30, 1993, contributions were based on the entry age normal cost method of valuation.

During the period July 1, 2000, to June 30, 2001, contributions totaling \$81,914,000 (\$45,553,000 employer, and \$36,361,000 employee) were made. Of the employer contributions, \$36,443,000 was applied to normal cost and \$9,110,000 was applied to unfunded accrued liability. All of the employer offset contributions were applied to normal cost.

7. PENSION PLANS (Continued)

In 1996 the City Council approved proposed changes to the San Diego City Employees' Retirement System (SDCERS) which included changes to retiree health insurance, plan benefits, employer contribution rates and system reserves. The proposal included a provision to assure the funding level of the system would not drop below a level the Board's actuary deems reasonable in order to protect the financial integrity of the SDCERS. A citizen required vote on the changes related to retiree health insurance passed overwhelmingly in 1996. In 1997, the active members of the SDCERS voted and approved the changes. Portions of the proposal requiring SDCERS Board approval (employer rates and reserves) were approved after review and approval by its independent fiduciary counsel and consultation with the actuary. The San Diego Municipal Code was then amended to reflect the changes.

The changes provide the employer contribution rates be "ramped up" to the actuarially recommended rate in .50 percent increments over a ten year period at such time it was projected that the Projected Unit Credit (PUC) and Entry Age Normal (EAN) rates would be equal and the SDCERS would convert to EAN. The actuary calculated the present value of the difference between the employer contribution rate and actuarial rates over the ten year period and this amount was funded in a reserve. This "Corridor" funding method is unique to the SDCERS and therefore is not one of the six funding methods formally sanctioned by the Governmental Accounting Standards Board for expending purposes. As a result for June 30, 2001, the actuary rates are reported to be \$30,983,000 more than paid by the City which, technically per GASB 27 effective for periods beginning after June 15, 1997, is to be reported as a Net Pension Obligation (NPO) even though the shortfall is funded in a reserve. The actuary believes the Corridor funding method is an excellent method for the City and that it will be superior to the PUC funding method. The actuary is in the process of requesting the GASB to adopt the Corridor funding method as an approved expending method which would then eliminate any reported NPO.

c. Annual Required Contribution

The annual required contribution for the current year was determined as part of the June 30 actuarial valuation using the projected unit credit actuarial funding method. The actuarial assumptions included (a) an 8.0% investment rate of return and (b) projected salary increases of 4.75% per year. Both (a) and (b) included an inflation rate of 4.5%. The actuarial value of assets was determined using techniques that smooth the effects of short-term volatility in the market value of investments over a five-year period. The unfunded actuarial accrued liability is being amortized as a level percentage of projected payroll on an open basis. The remaining amortization period at June 30, 2001 was 20 years.

d. Three-Year Trend Analysis

The following table shows the City's Annual Pension Cost (APC) and the percentage of the APC contributed for the most current year available and preceding years (in thousands):

Fiscal Year Ending	APC	Percentage of APC Contributed	Net Pension Obligation
6/30/98	\$40,863	75.81%	\$15,124
6/30/99	44,008	78.32	23,046
6/30/00	50,044	78.66	30,983

7. PENSION PLANS (Continued)

e. <u>Net Pension Obligation Three Year-Trend Analysis</u>

The following table shows the calculation of the City's NPO for the most current year available and preceding years (in thousands):

	Actuarial Required					Contribu-	Change	
Fiscal Year	Contribution	Interest on	ARC	Amortization		tions	in	
Ending	(ARC)	NPO_	<u>Adjustment</u>	Factor	_APC	<u>Made</u>	NPO_	NPO_
6/30/98	\$40,660	\$ 478	\$ 275	21.69	\$40,863	\$30,979	\$9,149	\$15,124
6/30/99	43,504	1,210	706	21.41	44,008	34,467	7,922	23,046
6/30/00	49,276	1,844	1,076	21.41	50,044	39,364	7,937	30,983

DEFINED CONTRIBUTION PLANS

Pursuant to the City's withdrawal from the Federal Social Security System effective January 8, 1982, and to the Federal Government's mandate of a Social Security Medicare tax for all employees not covered by Social Security hired on or after April 1, 1986, the City established the Supplemental Pension Savings Plan (SPSP), a defined contribution plan administered by American Express Trust Company, Minneapolis, MN, which provides pension benefits for eligible full-time employees. In a defined contribution plan, benefits depend solely on amounts contributed to the plan plus investment earnings. Employees are eligible to participate from the date of employment. State legislation requires that both the employee and the City contribute an amount equal to 3% of the employee's total salary each month. Participants in the plan hired before April 1, 1986 and on or after April 1, 1986 may voluntarily contribute up to an additional 4.5% and 3.05%, respectively, of total salary.

The City also contributes an amount equal to the employee voluntary contributions. The City's contributions for each employee (and interest allocated to the employee's account) are fully vested after five years of continuous service. City contributions for, and interest forfeited by, employees who leave employment before five years of service are used to reduce the City's contribution requirement.

The City and the covered employees contributed approximately \$41,556,000 for the year ending June 30, 2001. As of June 30, 2001, fair value of Plan assets totaled approximately \$390,319,000. SPSP is considered part of the City of San Diego's financial reporting entity and is included in the City's financial reports as a Pension Trust Fund.

In addition, the City established a 401(k) Plan effective July 1, 1985. The plan is a defined contribution plan administered by American Express Trust Company, Minneapolis, MN, to provide pension benefits for all eligible full-time employees. Employees are eligible to participate twelve months after the date of employment. Employees make contributions to their 401(k) accounts through payroll deductions, and may also elect to have the City contribute to their 401(k) accounts through the City's Employees' Flexible Benefits Program.

The employees' 401(k) contributions were calculated pursuant to various combination arrangements. The covered employees and the City contributed approximately \$19,316,000 during the fiscal year.

As of June 30, 2001, fair value of Plan assets totaled approximately \$104,909,000. The 401(k) Plan is considered part of the City of San Diego's financial reporting entity and is included in the City's financial reports as an Agency Fund.

8. POST RETIREMENT HEALTH INSURANCE

In addition to providing pension benefits, the City of San Diego Municipal Code provides certain health care insurance benefits for retired general and safety members of SDCERS who retired on or after October 6, 1980. At June 30, 2001, approximately 2,435 eligible retirees received benefits.

Certain health care insurance benefits were established during Fiscal Year 1995 for eligible retirees who retired prior to October 6, 1980, or who were otherwise not eligible to receive City-paid health care insurance as of June 30, 1994. At June 30, 2001, approximately 648 eligible retirees received benefits.

Currently, expenses for post-employment healthcare benefits are recognized as they are paid. For the fiscal year ended June 30, 2001, expenditures of approximately \$7,207,018 were recognized for such health care benefits.

Substantially all of the City's general and safety members of SDCERS may become eligible for those benefits if they reach normal retirement age and meet service requirements as defined while working for the City.

9. COMMITMENTS AND CONTINGENCIES

The Water Utility's construction plans for various projects are estimated to cost approximately \$129,592,554. The Utility had contractual commitments for these projects totaling approximately \$77,763,634 in 2001 and \$74,235,000 in 2000. The Utility intends to finance the contractual commitments with reserves and service charges, and the issuance of long-term debt.

The Water Utility is self-insured for general liability claims. The Water Utility has recorded approximately \$1,061,000 in 2001 and \$4,189,000 in 2000 for such claims. These amounts represent the Utility's determination of the probable ultimate cost of the claims.

10. PRIOR PERIOD ADJUSTMENTS

as restated

Interest received from the Bond Acquisition fund for the Water Utility Enterprise Fund was not recognized in previous fiscal years. The fiscal year 2000 financial statements have been restated to reflect the additional revenues received. The effect of this adjustment was an increase of \$27,085,000 to Prepaid Expenses and Invested in Assets of the System resulting in restated June 30, 2000 balance of \$206,577,000 and \$209,736,000, respectively.

The following is a reconciliation of the retained earnings (in thousands):

Retained earnings at beginning of year as previously stated \$263,926

Interest Adjustment 27,085

Retained earnings at beginning of year

<u>\$291,011</u>

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Water Utility NET REVENUE AVAILABLE FOR DEBT SERVICE YEARS ENDED JUNE 30, 2001 AND 2000

EXHIBIT D

UNAUDITED	Year Ended June 30	
	2001	2000
TOTAL OPERATING REVENUES (Exhibit B)	\$212,289,978	\$222,477,638
OPERATING EXPENSES:		
Cost of Purchased Water Used	103,322,108	92,281,310
Water Operations	66,050,761	62,934,931
Capital Improvements Program	8,475,186	7,258,843
Accounting	7,388,769	6,334,199
General and Administrative	25,075,113	20,443,171
Taxes	1,060,651	1,000,909
TOTAL OPERATING EXPENSES	211,372,588	190,253,36 3
OPERATING INCOME	917,390	32,224,275
OTHER INCOME (CHARGES):		N.
Capital Grant Receipts	278,435	2,375,066
Operating Transfers From/(To) Primary Government	(1,145,724)	(810,700)
Transfers From/(To) Primary Government	(270,242)	0
Sale of Gravel, Land, etc	23,940	16,617
Interest Income	18,528,367	12,411,960
Rate Stabilization	7,000,000	(20,000,000)
Water System Capacity Charge	16,581,394	18,454,941
Non-Operating Grants	1,272,454	0
Other Income	6,698,834	11,349,354
TOTAL OTHER INCOME (CHARGES)	48,967,458	23,797,238
NET REVENUE AVAILABLE FOR DEBT SERVICE (As Defined by Bond Ordinances)	\$49,884,848	\$ 56,021,513
DEBT SERVICE COVERAGE		
(Earnings Times Debt Service)		
The Principal and Interest Due in Fiscal Year Ending June 30, 2001 (\$18,729,536) Covered	2.66	
The Principal and Interest Due in Fiscal Year Ending June 30, 2000 (\$18,729,536) Covered		2.99

Water Utility CHANGES IN FUNDS AVAILABLE FOR APPROPRIATION YEAR ENDED JUNE 30, 2001

EXHIBIT E

	Water Operating Fund
Funds Available for Appropriation at July 1, 2000	\$ 0
Add: Cash Receipts (Schedule E-1)	337,911,029
Anticipated Contributions from Other Agencies at June 30, 2001	819,514
Operating Reserve at June 30, 2000.	11,675,000
Emergency Reserve at June 30, 2000	5,000,000
Rate Stabilization at June 30, 2000	35,500,000
Secondary Purchase at June 30, 2000	9,787,000
Continuing Appropriations at July 1, 2000	36,057,717
Continuing Appropriations Encumbered at July 1, 2000	14,846,929
Accrued Annual Leave and Sick Leave at July 1, 2000	3,233,789
Prior Years' Encumbrances Cancelled	2,222,140
Designated for Subsequent Years' Capital Projects and Operations at July 1, 2000	81,274,890
Total Balances and Additions	538,328,008
Deduct:	:
Expenditures and Encumbrances (Schedule E-2)	
Anticipated Contributions from Other Agencies at June 30, 2000	
Accrued Annual Leave and Sick Leave at June 30, 2001	
Operating Reserve at June 30, 2001	,
Emergency Reserve at June 30, 2001	5,000,000
Rate Stabilization at June 30, 2001	28,500,000
Secondary Purchase at June 30, 2001	• • • • • • • • • • • • • • • • • • • •
Desired des Dubrania (V) 10 V ID 1 1 10 U I A AAA	• •
Designated for Subsequent Years' Capital Projects and Operations at June 30, 2001	
Continuing Appropriations at June 30, 2001	46,769,476

Water Utility RECREATION ACTIVITIES YEAR ENDED JUNE 30, 2001

1	Barrett Reservoir Station	Otay Reservoir Station	Sutherland Reservoir Station	is c	Hodges Reservoir Station		Miramar Reservoir Station	⊞ ∝	El Capitan Reservoir Station	Sar	San Vicente Reservoir Station	Œ	Murray Reservoir Station	•	Total
REVENUES															
Fishing	\$ 72,761	\$ 124,654	\$ 48,	48,642	\$ 101,086	6	88,128	69	136,533	s	198,512	69	100,991	4	871,307
Water Contact	0	0		0	6,043		0		42,204		220,118		683	1	269,048
TOTAL REVENUES	72,761	124,654	48,	48,642	107,129	- 1	88,128		178,737		418,630		101,674	!	1,140,355
EXPENSES															
Fishing	95,835	158,710	100,070	070	117,993		162,058		119,808		224,338		176,043		1,154,855
Water Contact	0	3,144		0	19,882		0	-	104,945	Ì	305,833	l	74	Ì	433,878
TOTAL EXPENSES	95,835	161,854	100,070	070	137,875	}	162,058		224,753		530,171		176,117	}	1,588,733
Gross Profit (Loss) From Operations	\$ (23,074)	\$ (37,200)	\$ (51,428)		\$ (30,746)	s	(73,930)	•	(46,016)	9	(111,541)	S	\$ (74,443)		(448,378)
Depreciation Expense - All Stations															(94,586)
Net Profit From Operations														8	(542,964)
Percent Profit											***************************************			ļ	-47.61%

Water Utility CHANGES - PLANT IN SERVICE YEAR ENDED JUNE 30, 2001

UNAUDITED

SCHEDULE A-1

BUILDINGS AND STRUCTURES: Source of Supply	\$ 295,613 11,570,495 193,436 2,821,955	\$ 0 0	• ^	
Purification Transmission Recreation	11,570,495 193,436		• •	
Transmission	193,436		\$ 0	\$ 295,613
Transmission	•	U	Ŏ	11,570,495
	2 921 055	0	Ō	193,436
Distribution	2,021,900	0	0	2,821,955
	3,950,885	1,000,000	0	4,950,885
General	926,822	0	0	926,822
TOTAL BUILDINGS AND STRUCTURES	19,759,206	1,000,000	0	20,759,206
EQUIPMENT:			÷	
Source of Supply:				
Impounding Dams and Reservoirs	15,591,233	0	0	15,591,233
Wells and Appurtenances	73,182	ŏ	Ŏ	73,182
Intake and Section Mains	2,663,881	Ō	0	2,663,881
Purification:				
Plant and Equipment	7,537,891	0	0	7,537,891
Laboratory	1,066,718	Ō	530	1,066,188
Transmission:				
Reservoirs and Tanks	6.763,222	0	0	6.763.222
Mains and Canals	5,362,746	ŏ	ő	5,362,746
Booster Pumping	614,395	ő	ő	614,395
Recreation:				
Miscellaneous Equipment	1,092,546	0	0	1,092,546
Distribution:				
Reservoirs and Tanks	11,769,018	0	0	11,769,018
Mains and Appurtenances	426,241,433	16,216,130	50,197	442,407,366
Booster Pumping	2,961,705	0	0	2,961,705
Services	76,117,633	0	0	76,117,633
Meters	11,716,551	674,295	898,359	11,492,487
Hydrants	27,615,371	0	0	27,615,371
General:				
Miscellaneous Equipment	15,388,478	1,706,841	649,845	16,445,474
Office Equipment	4,739,376	158,079	321,885	4,575,570
TOTAL EQUIPMENT	617,315,379	18,755,345	1,920,816	634,149,908
TOTAL BUILDINGS AND STRUCTURES AND EQUIPMENT	637,074,585	19,755,345	1 020 918	854 000 444
	037,074,303	19,733,343	1,920,816	654,909,114
LAND:				
Source of Supply	13,231,398	0	4.132	13,227,266
Filtration and Purification	2,107,623	0	4,132	2,107,623
Transmission	751,949	ŏ	ő	751,949
Distribution	147,130	ŏ	ŏ	147,130
General	15,869,295	0	0	15,869,295
TOTAL LAND	32,107,395	0	4,132	32,103,263
TOTAL PLANT IN SERVICE (Exhibit A)	\$ <u>669,181,98</u> 0	\$ 19,755,345	\$ 1,924,948	\$ 687,012,377

SCHEDULE A-2

UNAUDITED

INSTALLMENT PURCHASE AGREEMENT

			Ann	ual Requirements	S	
Fiscal Year	_	 Principal		Interest		Total
2001-02		\$ 6,780,000	\$	18,593,936	\$	25,373,936
2002-03		7,055,000		18,317,236		25,372,236
2003-04		7,345,000		18,029,236		25,374,236
2004-05		7,645,000		17,729,436		25,374,436
2005-06		7,965,000		17,409,271		25,374,271
2006-07		8,305,000		17,065,525		25,370,525
2007-08		8,675,000		16,698,194		25,373,194
2008-09		9,065,000		16,307,914		25,372,914
2009-10		9,505,000		15,868,746		25,373,746
2010-11		10,005,000		15,365,239		25,370,239
2011-12		10,520,000		14,851,620		25,371,620
2012-13		11,065,000		14,306,554		25,371,554
2013-14		11,670,000		13,701,495		25,371,495
2014-15		12,305,000		13,065,146		25,370,146
2015-16		12,980,000		12,391,482		25,371,482
2016-17		13,670,000		11,702,573		25,372,573
2017-18		14,370,000		11,001,573		25,371,573
2018-19		15,105,000		10,264,698		25,369,698
2019-20		15,880,000		9,490,073		25,370,073
2020-21		16,695,000		8,675,698		25,370,698
2021-22		17,550,000		7,819,573		25,369,573
2022-23		18,470,000		6,900,603		25,370,60 3
2023-24		19,460,000		5,914,422		25,374,422
2024-25		20,470,000		4,899,800		25,369,800
2025-26		21,490,000		3,880,750		25,370,750
2026-27		22,535,000		2,835,156		25,370,156
2027-28	·	23,635,000		1,738,619		25,373,619
2028-29		 24,785,000	_	588,644		25,373,644
TOTAL INST	FALLMENT PURCHASE AGREEMENT	\$ 385,000,000	\$	325,413,212	\$	710,413,212

Water Utility OPERATING EXPENSES YEARS ENDED JUNE 30, 2001 AND 2000

SCHEDULE B-1

UNAUDITED		Year End	ed Ju	ne 30
COST OF PURPLY CORP. NA TORY		2001	_	2000
COST OF PURCHASED WATER USED:	_		_	
Inventory of Purchased Water in Storage - Beginning of Period	\$	9,960,559	\$	6,714,544
Total Durchaged Wester Augiliable		106,160,199		95,527,325
Total Purchased Water Available		116,120,758		102,241,869
Inventory of Purchased Water in Storage - End of Period		12,798,650		9,960,559
TOTAL COST OF PURCHASED WATER USED		103,322,108		92,281,310
DIVISION OF WATER OPERATIONS:				
Impounding and Transmission System:				
Recreation		2,446,071		2,397,200
Operation Supervision and Office		12,490,590		8,181,728
Surface Source of Supply		2,359,576		2,957,647
Transmission		211,476		166,903
General Expense		1,966,149		2,366,301
Total Impounding and Transmission System.	_	19,473,862		16.069.779
The state of the s		13,413,002		10,009,779
Filtration and Purification		10,148,399		8,904,322
Operation Supervision and Office		11,508,309		13,457,255
Accrued Claims		(422,815)		941,000
Mains		16,594,954		10,273,063
Services		1,569,058		5,260,172
Hydrants		85		318,927
Meters		4,536,140		
Booster Pumping Stations				3,700,985
Reservoirs and Tanks		582,486		676,063
Reclaimed Water - Retrofits		729,278		591,281
Nedamed Water - Nedolis	-	1,331,005	_	2,742,084
TOTAL DIVISION OF WATER OPERATIONS	_	66,050,761	Terrido ana	62,934,931
DIVISION OF CAPITAL IMPROVEMENTS PROGRAM MANAGEMENT:				
Administration and Office		5,974,891		5,445,414
Project Management		993,636		1,178,872
Planning and Development		13,450		27,923
Division Management		1,064,142		487,994
Public Information		429,067		118,640
TOTAL DIVISION OF CAPITAL IMPROVEMENTS PROGRAM MANAGEMENT		8,475,186		7,258,843
ACCOUNTING AND SERVICES:				
General Accounting		234,097		252.890
Customer Services		7,154,672		
		7,104,072		6,081,309
TOTAL ACCOUNTING SERVICES	*****	7,388,769		6,334,199
GENERAL AND ADMINISTRATIVE		_		
Utilities Administration and Office		0.074.405		2 600 054
Expenses of Other City Departments Applicable to the Water Utility		9,971,125		3,698,351
Engineering Expenses		8,699,009		6,956,281
Water Conservation Efforts		1,228,256		1,104,234
Uncollectible Accounts		4,136,217		4,439,087
Conomic Eventures		53,102		1,340,612
General Expense		987,404		2,904,606
TOTAL GENERAL AND ADMINISTRATIVE		25,075,113		20,443,171
TAXES:				
In Lieu Taxes: San Diego County Water Authority		949,293		889,765
Taxes County of San Diego		111,358		111.144
TOTAL TAXES		1,060,651		1,000,909
DEPRECIATION AND AMORTIZATION		12,528,800		14,136,250
······································	_	,020,000	***************************************	17,100,200
TOTAL OPERATING EXPENSES (Exhibit B)	\$	223,901,388	\$	204,389,613

Water Utility ESTIMATED AND ACTUAL CASH RECEIPTS YEAR ENDED JUNE 30, 2001

UNAUDITED

SCHEDULE E-1

	 Estimate		Actual	_	Actual Over or (Under) Estimate
Sale of WaterService Charges	\$ 211,300,200 185,000	\$ ·	197,059,208 249,383	\$	(14,240,992) 64,383
Land and Building Rentals	2.866,500		3.430.713		564,213
New Water Services	1,274,400		1,460,496		186,096
Sale of Discarded Materials and Facilities	1,300,000		27,384		(1,272,616)
Interest Earnings	10,090,027		16,345,145		6,255,118
Damages Recovered	102,000		702,210		600,210
Services Rendered Other Funds	4,680,270		6,164,986		1,484,716
Services Rendered Others	1,468,272		1,591,139		122,867
Water System Capacity Charges	15,075,586		16,581,394		1,505,808
Recreation Program and Fees	1,328,900		1,272,055		(56,845)
Contributions in Aid	530,000		2,713,181		2,183,181
Sale of Land	0		231,893		231,893
Non-Operating Grants	1,503,312		1,272,454		(230,858)
Reimbursement from Long-Term Debt	132,715,060		80,091,335		(52,623,725)
Revenue from Other Agencies	0		7,966,747		7,966,747
Other Revenue	 199,100	700000	751,305	_	552,205
TOTAL RECEIPTS (Exhibit E)	\$ 384,618,627	\$	337,911,029	\$ _	(46,707,599)

APPROPRIATIONS, EXPENDITURES AND ENCUMBRANCES YEAR ENDED JUNE 30, 2001

SCHEDULE E-2

•	Appropriations	Expenditures	Encumbrances	Total	Unencumbered Balance
Maintenance and Operations					
Salaries and Wages Supplies and Expenses Equipment	\$ 34,236,296 \$ 90,006,260	31,953,093 76,392,519 1,473,768	\$ 0 6,174,596 192,073	\$ 31,953,093 82,567,115 1,665,841	\$ 2,283,203 7,439,145 369,763
Total Maintenance and Operations	126,278,160	109,819,380	6,366,669	116,186,049	10,092,111
Outlay:					
Salaries and Wages	1,597,560	5,009,776	0	5,009,776	(3,412,216)
Construction	181,947,100	111,212,681	15,552,727	126,765,408	55,181,692
Total Outlay	183,544,660	116,222,457	15,552,727	131,775,184	51,769,476
Other:					
San Diego County Water Authority	109,175,000	86,517,153	11,982,154	98,499,307	10,675,693
Water Conservation	3,189,726	3,114,663	135,817	3,250,480	(60,754)
Right-of-Way	2,614,000	2,631,042	. 0	2,631,042	(17,042)
Installment Purchase Agreement	18,802,607	18,675,202	0	18,675,202	127,405
Reimbursement to City of San Diego:					,
Expenses of Other City Departments					
Applicable to the Water Utility	3,003,519	3,003,520	0	3,003,520	(1)
Unallocated Reserve	3,757,371	0	0	0	3,757,371
Total Other	140,542,223	113,941,580	12,117,971	126,059,551	14,482,672
TOTAL (Exhibit E)	\$ 450,365,043	339,983,417	\$ 34,037,367	\$374,020,784	\$ <u>76,344,259</u>

Water Utility COMPARATIVE STATISTICS LAST 30 YEARS

TABLE I

Fiscal Year		Water Utility Plant	***	Bonded Debt	 Installment Purchase Agreement		Retained Earnings
2000 - 2001	\$	1,163,620,055	\$	0	\$ 385,000,000	\$	286,280,017
1999 - 2000		1,038,508,991		. 0	385,000,000		291,010,795
1998 - 1999		935,811,905		0	385,000,000		266,335,816
1997 - 1998		863,229,833		0	0		266,298,025
1996 - 1997		822,992,252		0	0		254,069,941
1995 - 1996		749,234,434		0	0		245,201,770
1994 - 1995		689,106,295		0	0		239,508,768
1993 - 1994		626,737,242		0	0		239,132,054
1992 - 1993		586,633,825		0	0		230,196,751
1991 - 1992		539,772,877		0	0		221,364,414
1990 - 1991		489,482,460		0	0		211,719,271
1989 - 1990		466,753,038		170,000	0		204,365,266
1988 - 1989		438,332,681		340,000	0		193,028,191
1987 - 1988	•	405,096,381		720,000	0		157,853,534
1986 - 1987		366,622,054		1,100,000	0		139,740,848
1985 - 1986		340,521,942		1,480,000	0		121,499,857
1984 - 1985		318,620,979		1,860,000	0	•	119,513,109
1983 - 1984		298,748,076		2,240,000	0		110,772,323
1982 - 1983		282,270,412		2,620,000	0		104,212,739
1981 - 1982		270,416,609		3,000,000	0		98,830,416
1980 - 1981		257,694,556		3,630,000	0		92,245,521
1979 - 1980		239,567,013		4,260,000	0		81,425,287
1978 - 1979		226,960,836		4,965,000	0		73,635,922
1977 - 1978		216,904,233		5,745,000	0		66,428,647
1976 - 1977		209,090,926		6,525,000	0		64,150,412
1975 - 1976		203,915,924		7,305,000	0		63,405,709
1974 - 1975		197,910,525		8,285,000	0		60,514,578
1973 - 1974		192,473,688		9,575,000	0		56,701,342
1972 - 1973	i	181,859,155		10,865,000	0		57,181,583
1971 - 1972		172,838,881		12,155,000	0		60,984,083

Water Utility COMPARATIVE STATISTICS LAST 30 YEARS

UNAUDITED

Water Purchased or Used*

	<u>, , , , , , , , , , , , , , , , , , , </u>	ater Purchased or Use					CHAUDITED
Saline		Water	Importe	 Maintenance			
Water Cost		Acre Feet*	Cost*	 and Operation Expenses	 Revenue	-	Fiscal Year
0	\$	235,357.9	103,322,108	\$ 108,890,912	\$ 239,628,025	\$	2000 - 2001
0		210,208.0	92,281,310	98,199,603	248,889,303		1999 - 2000
0		196,091.5	84,123,245	96,067,333	211,367,597		1998 - 1999
0		170,994.0	68,138,177	89,448,267	181,612,655		1997 - 1998
0		164,022.7	69,545,617	80,975,285	172,707,510		1996 - 1997
0		172,080.4	72,962,074	78,628,641	167,892,834		1995 - 1996
0		145,994.8	57,886,929	78,077,896	145,628,214		1994 - 1995
0		190,101.1	52,657,992	69,381,755	140,807,446		1993 - 1994
0		188,368.3	52,178,019	59,154,351	128,588,492		1992 - 1993
0		149,788.6	41,491,445	57,686,053	116,094,979		1991 - 1992
0		201,057.8	47,650,710	54,531,947	117,121,332		1990 - 1991
0		288,500.4	50,831,197	43,851,446	125,267,706		1989 - 1990
0	•	201,977.4	46,523,472	41,481,831	136,183,000		1988 - 1989
0		208,550.6	43,789,795	35,739,476	110,668,487		1987 - 1988
0		197,643.1	39,808,142	32,805,218	104,381,127		1986 - 1987
0		183,690.7	35,801,406	31,424,159	82,907,314		1985 - 1986
0		155,826.1	29,513,030	28,631,493	79,740,887		1984 - 1985
0		120,877.8	19,028,280	26,628,483	65,912,907		1983 - 1984
0		122,251.3	12,341,385	23,755,751	55,325,538		1982 - 1983
0		143,918.8	14,481,455	20,479,162	53,024,102		1981 - 1982
0		119,889.7	11,760,733	19,296,192	52,668,931		1980 - 1981
. 0		107,712.0	9,615,852	15,635,427	42,676,380		1979 - 1980
0		108,521.0	7,966,887	13,310,073	38,150,842		1978 - 1979
0		142,761.4	8,946,295	11,676,871	33,854,005		1977 - 1978
0		164,292.4	10,721,716	11,015,318	32,641,018		1976 - 1977
0		168,722.5	9,906,116	10,119,104	32,723,255		1975 - 1976
0		152,466.0	8,547,369	9,373,626	27,619,347		1974 - 1975
0		125,019.8	7,026,638	8,866,523	23,844,758		1973 - 1974
20,043		165,211.7	8,773,772	8,097,603	21,552,020		1972 - 1973
36,814		145,299.7	7,128,061	7,337,557	22,604,405		1971 - 1972

^{*} Effective 1974-1975 the water data represents cost of water used. For the years 1973-1974 and prior, the water data represents water purchased. One acre foot equals 325,900 gallons.

_	Depreciation Amortization	 In Lieu Taxes	 Bonded Debt Interest	 Installment Purchase Agreement Interest	_	Net Income* (Net Loss)	Fiscal Year
\$	12,528,800	\$ 949,293	\$ 0	\$ 18,667,690	\$	(4,730,778)	2000 - 2001
	14,136,250	889,765	0	18,707,396		24,674,979	1999 - 2000
	13,284,102	791,645	0	17,063,481		37,791	1998 - 1999
	11,105,888	692,239	0	0		12,228,084	1997 - 1998
	12,759,173	784,636	0	0		8,642,799	1996 - 1997
	9,935,886	673,231	0	0		5,693,002	1995 - 1996
	8,672,950	613,725	0	0		376,714	1994 - 1995
	9,212,932	619,464	0	0		8,935,303	1993 - 1994
	7,731,501	692,284	0	0		8,832,337	1992 - 1993
	7,096,656	175,682	0	0		9,645,143	1991 - 1992
	6,907,474	673,229	3,967	0		7,354,005	1990 - 1991
	6,698,375	12,540,101	9,512	0		11,337,075	1989 - 1990
	6,190,613	6,789,342	23,085	0		35,174,657	1988 - 1989
	5,732,815	7,303,365	39,550	0		18,063,486	1987 - 1988
	5,196,235	8,279,806	50,735	0		18,240,991	1986 - 1987
	4,892,159	8,738,282	64,560	0		1,986,748	1985 - 1986
	4,648,067	8,129,125	78,386	0		8,740,786	1984 - 1985
	4,461,689	9,142,661	92,210	0		6,559,584	1983 - 1984
	4,435,477	7,109,599	106,034	0		7,577,292	1982 - 1983
	3,945,427	7,408,145	125,018	. 0		6,584,895	1981 - 1982
	3,702,104	6,945,298	144,370	0		10,820,234	1980 - 1981
	3,382,878	6,088,908	163,950	0		7,789,365	1979 - 1980
	3,323,911	6,157,872	184,824	0		7,207,275	1978 - 1979
	3,277,211	7,469,211	206,182	0		2,278,235	1977 - 1978
	2,953,427	6,978,315	227,539	0		744,703	1976 - 1977
	3,049,505	6,505,594	251,805	0		2,891,131	1975 - 1976
	2,805,091	5,869,709	284,316	0		739,236	1974 - 1975
	2,778,632	5,335,690	317,516	0		(480,241)	1973 - 1974
	2,578,850	5,063,372	350,645	0		(3,332,265)	1972 - 1973
	2,768,889	4,851,837	385,204	0		96,043	1971 - 1972
	AA O						

^{*} After Operating Transfers

Water Utility GENERAL STATISTICS YEAR ENDED JUNE 30, 2001

UNAUDITED

TABLE II

Square Miles of Land Area (City)	331
Square Miles of Water Area (City)	73
Square Miles of Land and Water Area (City)	404
Population (Estimated June 30, 2001)	1,250,700
Population per Square Mile (Land)	3,779
Total Water Deliveries (Million Gallons) (Raw and Filtered)	78,659.26
Raw Water Used Outside City (Million Gallons)	3,309.31
Sales to California-American Water Company (Million Gallons)	4,242.93
Sales to City of Del Mar (Million Gallons)	461.48
Net Water Deliveries to City (Million Gallons) (Raw and Filtered)	70,645.54
Water Sales by California-American Water Company, Within City's South Bay Area (Million Gallons)	1,608.99
Total City Water Consumption, Including South Bay Area (Million Gallons)	72,254.66
Average Daily City Water Consumption (Million Gallons)	197.96
Average Daily Water Consumption Per Capita (Gallons)	158.28
Minimum Daily Filtered Water Consumption, March 3, 2001 (Million Gallons)	102:03
Maximum Daily Filtered Water Consumption, July 20, 2000 (Million Gallons)	284.85
Water Meters in Service June 30, 2001	263,468
Water Distribution Mains in Service June 30, 2001 (Miles)	3,138.51
Fire Hydrants in Service June 30, 2001	23,476

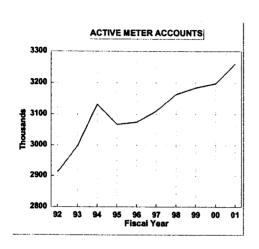
Water Utility LOCAL CLIMATIC STATISTICS YEAR ENDED JUNE 30, 2001

UNAUDITED

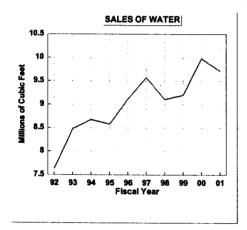
TABLE III

Average Daytime Temperature - Season Fiscal Year 2001	68.2 F.
Average Nightime Temperature - Season Fiscal Year 2001	57.0 F.
Average Temperature - Season Fiscal Year 2001	62.6 F.
Average Annual Temperature of Forty Year Period, 1961 - 2000	64.1 F.
Rainfall in the City of San Diego (at San Diego International Airport) During the Season Fiscal Year 2001	8.61 Inches
Normal Seasonal Rainfall	9.99 Inches
Seasons Having Rainfall ABOVE Normal, Recorded Since Fiscal Year 1948	20
Seasons Having Rainfall BELOW Normal, Recorded Since Fiscal Year 1948	34
Heaviest Seasonal Rainfall Recorded During the Last Twenty Fiscal Years (FY 1993)	18.31 Inches
Lightest Seasonal Rainfall Recorded During the Last Twenty Fiscal Years (FY 1996)	5.11 Inches
Average Seasonal Rainfall Recorded During the Last Twenty Fiscal Years	10.86 Inches
Heaviest Seasonal Rainfall Recorded Since Fiscal Year 1850 (FY 1884)	25.97 Inches
Lightest Seasonal Rainfall Recorded Since Fiscal Year 1850 (FY 1961)	3.46 Inches

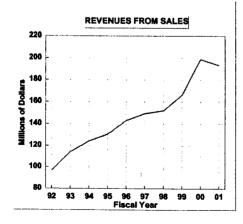
Water Utility CUSTOMER AND SALES STATISTICS



	YEAR ENDING JUNE 30		GROWTH				
CLASS	2001	2000	AMOUNT	PERCENT			
A. METER MONTHS BILLED							
Single Family Domestic	2,636,962	2,583,850	53,112	2.1%			
Other Domestic	367,659	365,120	2,539	0.7%			
Commercial	251,165	243,710	7,455	3.1%			
Industrial	4,493	4,796	(303)	-6.3%			
Outside City Services	650	677	(27)	-4.0%			
Other Utilities	93	85	8	9.4%			
TOTALS	3,261,022	3,198,238	62,784	2.0%			



B. SALES OF WATER (Millions of Cubic Feet)							
Single Family Domestic	3,374	3,494	(120)	-3.4%			
Other Domestic	2,203	2,246	(43)	-1.9%			
Commercial	3,340	3,381	(41)	-1.2%			
Industrial	233	261	(28)	-10.7%			
Outside City Services	3	2	1	50.0%			
Other Utilities	561	594	(33)	-5.6%			
TOTALS	9,714	9,978	(264)	-2.6%			



C. REVENUES (Thousand Dollars)								
Single Family Domestic	\$	73,300	\$	75,414	\$	(2,114)	-2.8%	
Other Domestic		42,081		43,523		(1,442)	-3.3%	
Commercial		63,536		68,301		(4,765)	-7.0%	
Industrial		4,005		4,655		(650)	-14.0%	
Reclaimed		3,525		0		3,525	0.0%	
Outside City Services		110		82		28	34.1%	
Other Utilities		6,581		6,354		227	3.6%	
Irrigation Districts		635		594		41	6.9%	
TOTALS	s _	193,773	\$	198,923	\$	(5,150)	-2.6%	

UNAUDITED

- 1. General Water Service (Domestic, Commercial and Industrial Use)
 - a. Customer charge per meter per month:

Size of Meter	Amount	
Under 1 inch	\$	9.63
1 inch		10.23
1 1/2 inch		46.27
2 inch		71.16
3 inch		256.53
4 inch		427.93
6 inch		955.93
8 inch		1.286.59
10 inch		1,724,12
12 inch		2.395.42
16 inch		3,989.75

b. Commodity Charge (in addition to customer charge) for each unit of 100 cubic feet (748 gallons):

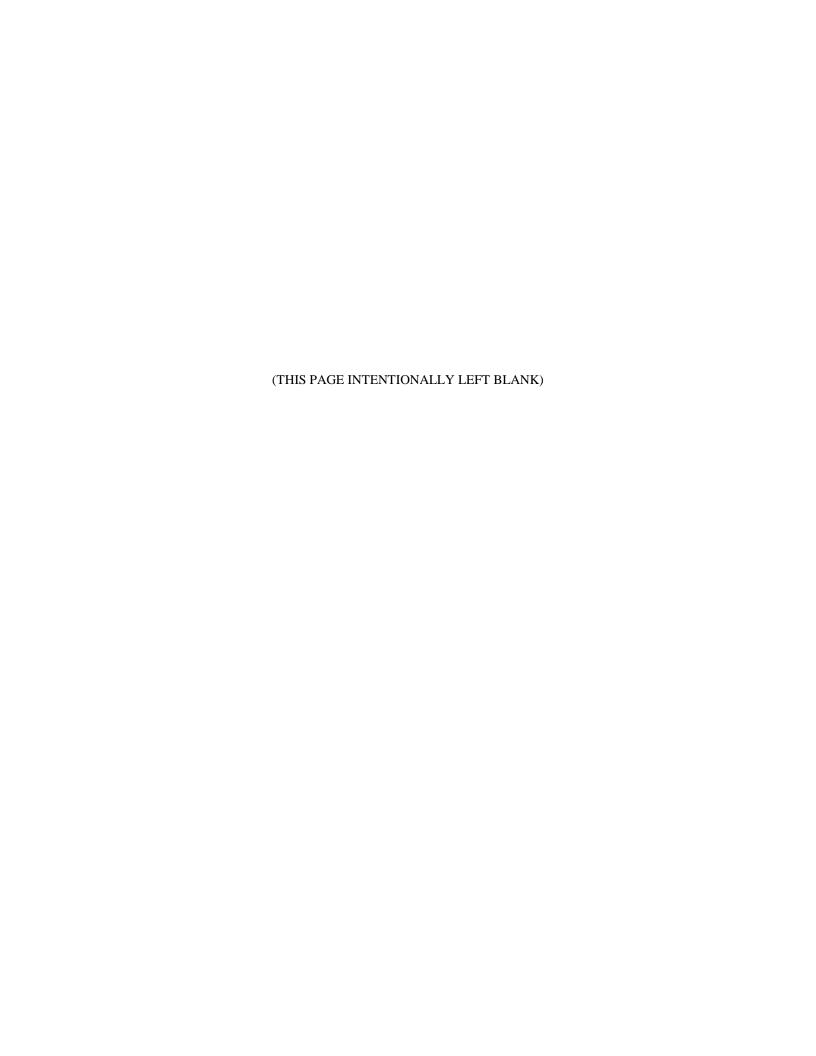
User Class	Rate
Single Family Domestic	\$1.273 each for first seven (7) units \$1.623 each for units 8 - 14 \$1.793 for each subsequent unit
All Other	\$1.493 each per unit

- For domestic, commercial, and industrial service outside the City, the rate is double those listed above. Water supplied for agriculture use outside the City is the same as the above rate for the All Other user class.
- 3. Fire Service and Automatic Sprinklers

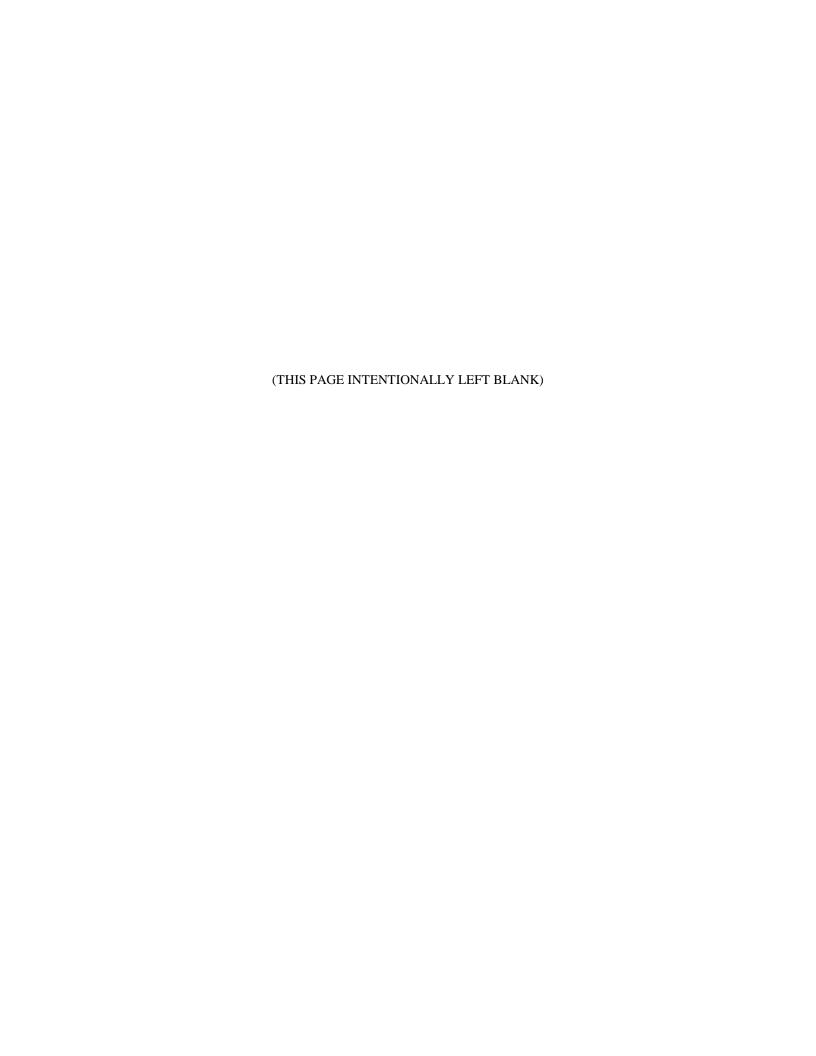
Size of Service Conn.	Rate per Month	Size of Service Conn.	Rate per Month		
1 1/2 inch	\$ 6.26	8 inch	\$ 33.40		
2 inch	8.35	10 inch			
3 inch	12.53	12 inch	41.75 50.10		
4 inch	16.70	16 inch	66.80		
6 inch	25.05	20 inch	83.50		

METRIC EQUIVALENTS

1 Acre foot = 1,234 Cubic Meters HCF (100 ft P) = 2.832 Cubic Meters 1 Gallon = .003785 Cubic Meters



APPENDIX G FORM OF CO-BOND COUNSEL OPINIONS



APPENDIX G

FORM OF CO-BOND COUNSEL OPINIONS

[CLOSING DATE]

Public Facilities Financing Authority of the City of San Diego San Diego, California

City of San Diego San Diego, California

Re:

Public Facilities Financing Authority of the City of San Diego Subordinated Water Revenue Bonds, Series 2002 (Payable Solely From Subordinated Installment Payments Secured by Net System Revenues of the Water Utility Fund)

(Final Opinion)

Ladies and Gentlemen:

We have acted as co-bond counsel in connection with the issuance by the Public Facilities Financing Authority of the City of San Diego (the "Authority") of \$______ aggregate principal amount of its Subordinated Water Revenue Bonds, Series 2002 (Payable Solely From Subordinated Installment Payments Secured by Net System Revenues of the Water Utility Fund) (the "Bonds"), issued pursuant to the Joint Powers Act (commencing with Section 6500), comprising Article I, Article II and Article IV of Division 7 of Title 1 of the Government Code of the State of California (the "Law") and pursuant to the Indenture, dated as of October 1, 2002 (the "Indenture"), between the Authority and Wells Fargo Bank, National Association, as trustee (the "Trustee"). The Bonds are payable from 2002 Subordinated Installment Payments payable by the City of San Diego (the "City") pursuant to the 2002 Supplement to the Master Installment Purchase Agreement, dated as of October 1, 2002 (the "2002 Supplement"), between the San Diego Facilities Equipment Leasing Corporation (the "Corporation") and the City. The Corporation has assigned its rights under the 2002 Supplement to the Authority pursuant to the Assignment Agreement, dated as of October 1, 2002 (the "Assignment Agreement"), between the Corporation and the Authority. Capitalized terms not otherwise defined herein shall have the meanings set forth in the Indenture and the 2002 Supplement.

In such connection, we have reviewed the Indenture, the 2002 Supplement, the Installment Purchase Agreement, the Assignment Agreement, the Tax Certificate and Agreement, dated the date hereof (the "Tax Agreement"), executed by the Authority and the City, certificates of the Authority, the City, the Corporation, the Trustee and others, opinions of the City Attorney, General Counsel to the Authority, counsel to the Corporation and others, and such other documents, opinions and matters to the extent we deemed necessary to render the opinions set forth herein.

Certain agreements, requirements and procedures contained or referred to in the Indenture, the 2002 Supplement, the Installment Purchase Agreement, the Assignment Agreement, the Tax Agreement and other relevant documents may be changed and certain actions (including, without limitation, defeasance of the Bonds) may be taken or omitted under the circumstances and subject to the terms and conditions set forth in such documents. No opinion is expressed herein as to any Bond or the interest thereon if any such change occurs or action is taken or omitted upon the advice or approval of counsel other than ourselves.

The opinions expressed herein are based on an analysis of existing laws, regulations, rulings and court decisions and cover certain matters not directly addressed by such authorities. Such opinions may be affected by

actions taken or omitted or events occurring after the date hereof. We have not undertaken to determine or to inform any person, whether any such actions are taken or omitted or events do occur or any other matters come to our attention after the date hereof. Our engagement with respect to the Bonds has concluded with their issuance, and we disclaim any obligation to update this opinion. We have assumed the genuineness of all documents and signatures presented to us (whether as originals or as copies) and the due and legal execution and delivery thereof by, and validity against, any parties other than the Authority and the City. We have assumed, without undertaking to verify, the accuracy of the factual matters represented, warranted or certified in the documents, and of the legal conclusions contained in the opinions, referred to in the second paragraph hereof. Furthermore, we have assumed compliance with all covenants and agreements contained in the Indenture, the 2002 Supplement, the Installment Purchase Agreement, the Assignment Agreement and the Tax Agreement, including without limitation covenants and agreements compliance with which is necessary to assure that future actions, omissions or events will not cause interest on the Bonds to be included in gross income for federal income tax purposes. We call attention to the fact that the rights and obligations under the Bonds, the Indenture, the 2002 Supplement, the Installment Purchase Agreement, the Assignment Agreement and the Tax Agreement and their enforceability may be subject to bankruptcy, insolvency, reorganization, arrangement, fraudulent conveyance, moratorium and other laws relating to or affecting creditors' rights, to the application of equitable principles, to the exercise of judicial discretion in appropriate cases and to the limitations on legal remedies against public entities in the State of California. We express no opinion with respect to any indemnification, contribution, penalty, choice of law, choice of forum or waiver provisions contained in the foregoing documents nor do we express any opinion with respect to the state or quality of title to or interest in any of the assets described in or subject to the lien of the Indenture or the accuracy or sufficiency of the description contained therein of, or the remedies available to enforce liens on any such assets. Finally, we undertake no responsibility for the accuracy, completeness or fairness of the Official Statement or other offering material relating to the Bonds and express no opinion with respect thereto.

Based on and subject to the foregoing, and in reliance thereon, as of the date hereof, we are of the following opinions:

- 1. The Bonds constitute the valid and binding limited obligations of the Authority.
- 2. The Bonds are limited obligations of the Authority and are payable solely from Revenues, which Revenues include 2002 Subordinated Installment Payments pursuant to the 2002 Supplement and amounts on deposit in the funds and accounts established under the Indenture (other than amounts on deposit in the Rebate Fund).
- 3. The Indenture has been duly executed and delivered by, and constitutes the valid and binding obligation of, the Authority. The Indenture creates a valid pledge, to secure the payment of the principal of and interest on the Bonds, of the Revenues and any other amounts (including proceeds of the sale of the Bonds) held by the Trustee in any fund or account established pursuant to the Indenture, except the Rebate Fund, subject to the provisions of the Indenture permitting the application thereof for the purposes and on the terms and conditions set forth therein.
- 4. The 2002 Supplement has been duly executed and delivered by, and constitutes the valid and binding obligation of, the City, enforceable against the City in accordance with its terms. The Installment Purchase Agreement, as supplemented by the 2002 Supplement, creates a valid pledge of Net System Revenues to secure the payment of 2002 Subordinated Installment Payments to the Authority, on the terms and conditions set forth therein.

5. Interest on the Bonds is excluded from gross income for federal income tax purposes under section 103 of the Internal Revenue Code of 1986 and is exempt from State of California personal income taxes. Interest on the Bonds is not a specific preference item for purposes of the federal individual or corporate alternative minimum taxes, although we observe that it is included in adjusted current earnings when calculating corporate alternative minimum taxable income. We express no opinion regarding other tax consequences relating to the ownership or disposition of, or the accrual or receipt of interest on, the Bonds.

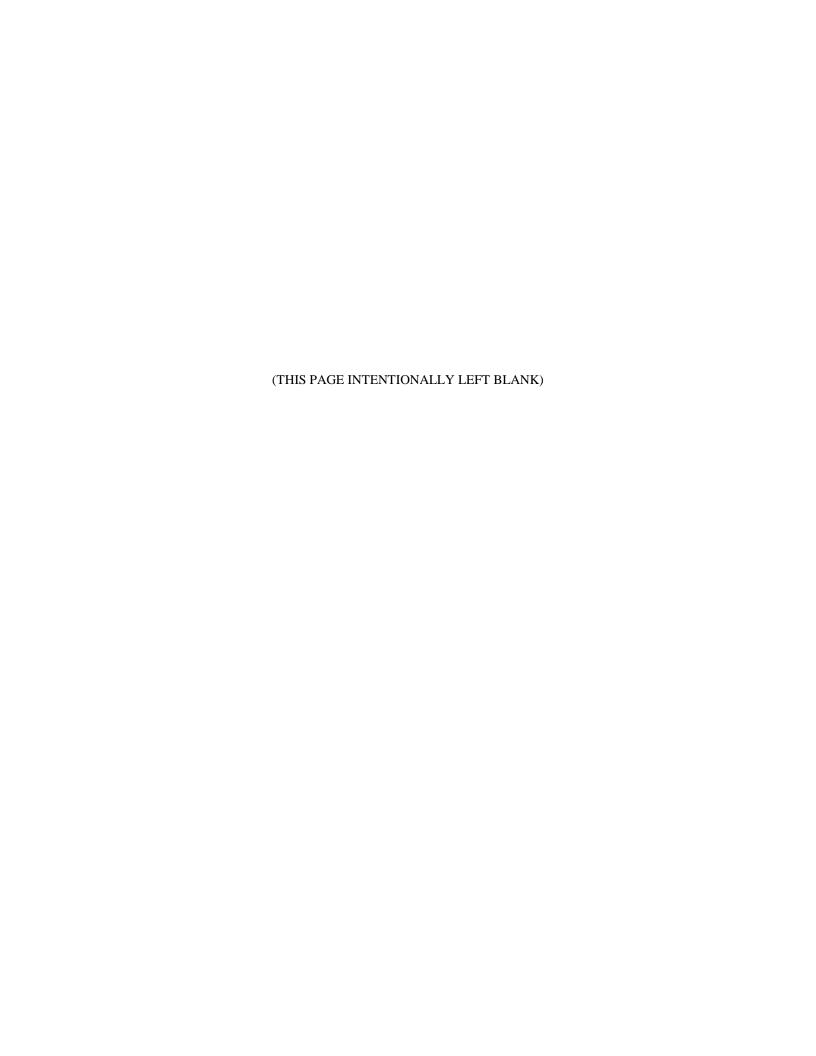
Faithfully yours,

Faithfully yours,

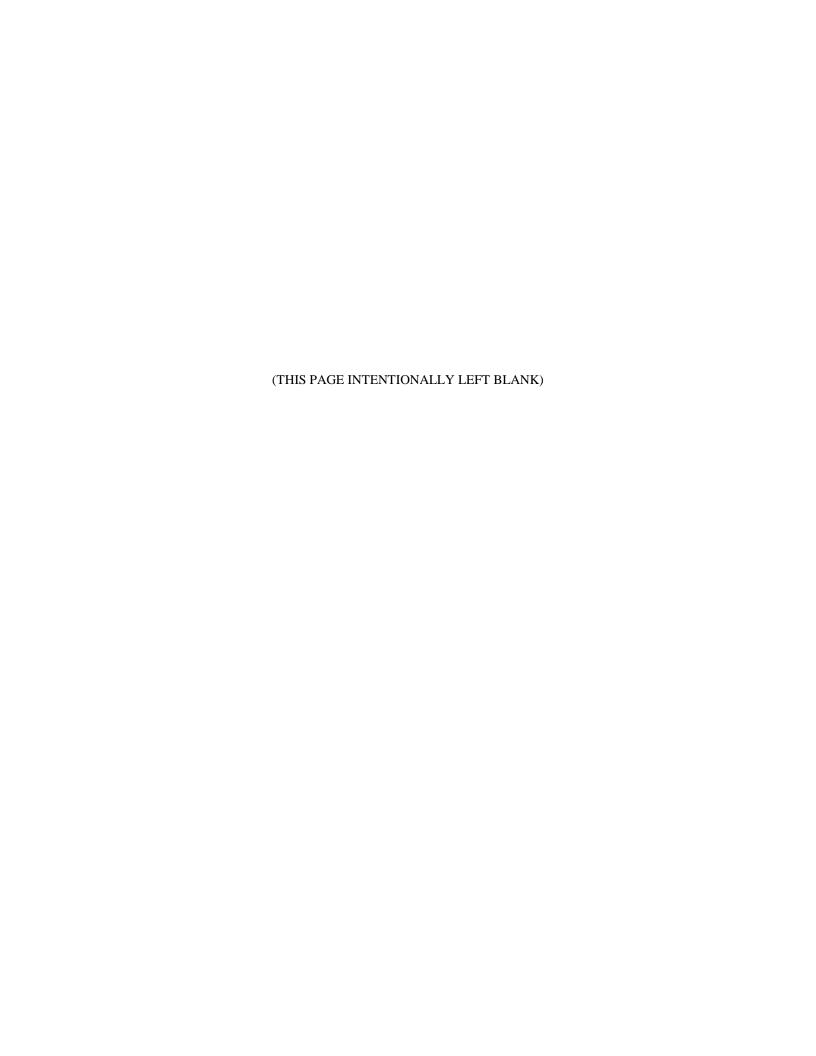
ORRICK, HERRINGTON & SUTCLIFFE LLP

WEBSTER & ANDERSON

per



APPENDIX H FORM OF MUNICIPAL BOND INSURANCE POLICY



FINANCIAL GUARANTY INSURANCE POLICY

MBIA Insurance Corporation Armonk, New York 10504

Policy No. [NUMBER]

MBIA Insurance Corporation (the "Insurer"), in consideration of the payment of the premium and subject to the terms of this policy, hereby unconditionally and irrevocably guarantees to any owner, as hereinafter defined, of the following described obligations, the full and complete payment required to be made by or on behalf of the Issuer to [PAYING AGENT/TRUSTEE] or its successor (the "Paying Agent") of an amount equal to (i) the principal of (either at the stated maturity or by any advancement of maturity pursuant to a mandatory sinking fund payment) and interest on, the Obligations (as that term is defined below) as such payments shall become due but shall not be so paid (except that in the event of any acceleration of the due date of such principal by reason of mandatory or optional redemption or acceleration resulting from default or otherwise, other than any advancement of maturity pursuant to a mandatory sinking fund payment, the payments guaranteed hereby shall be made in such amounts and at such times as such payments of principal would have been due had there not been any such acceleration); and (ii) the reimbursement of a such payment which is subsequently recovered from any owner pursuant to a final judgment by a court of competent jurisdiction that such payment constitutes an avoidable preference to such owner within the meaning of any applicable bankruptcy law. The amounts referred to in clauses (i) and (ii) of the preceding sentence shall be referred to herein collectively as the "Insured Amounts." "Obligations" shall mean:

[PAR] [LEGAL NAME OF ISSUE]

Upon receipt of telephonic or telegraphic notice, such notice subsequently confirmed in writing by registered or certified mail, or upon receipt of written notice by registered or certified mail, by the Insurer from the Paying Agent or any owner of an Obligation the payment of an Insured Amount for which is then due, that such required payment has not been made, the Insurer on the due date of such payment or within one business day after receipt of notice of such nonpayment, whichever is later, will make a deposit of funds, in an account with State Street Bank and Trust Company, N.A., in New York, New York, or its successor, sufficient for the payment of any such Insured Amounts which are then due. Upon presentment and surrender of such Obligations or presentment of such other proof of ownership of the Obligations, together with any appropriate instruments of assignment to evidence the assignment of the Insured Amounts due on the Obligations as are paid by the Insurer, and appropriate instruments to effect the appointment of the Insurer as agent for such owners of the Obligations in any legal proceeding related to payment of Insured Amounts on the Obligations, such instruments being in a form satisfactory to State Street Bank and Trust Company, N.A., State Street Bank and Trust Company, N.A. shall disburse to such owners, or the Paying Agent payment of the Insured Amounts due on such Obligations, less any amount held by the Paying Agent for the payment of such Insured Amounts and legally available therefor. This policy does not insure against loss of any prepayment premium which may at any time be payable with respect to any Obligation.

As used herein, the term "owner" shall mean the registered owner of any Obligation as indicated in the books maintained by the Paying Agent, the Issuer, or any designee of the Issuer for such purpose. The term owner shall not include the Issuer or any party whose agreement with the Issuer constitutes the underlying security for the Obligations.

Any service of process on the Insurer may be made to the Insurer at its offices located at 113 King Street, Armonk, New York 10504 and such service of process shall be valid and binding.

This policy is non-cancellable for any reason. The premium on this policy is not refundable for any reason including the payment prior to maturity of the Obligations.

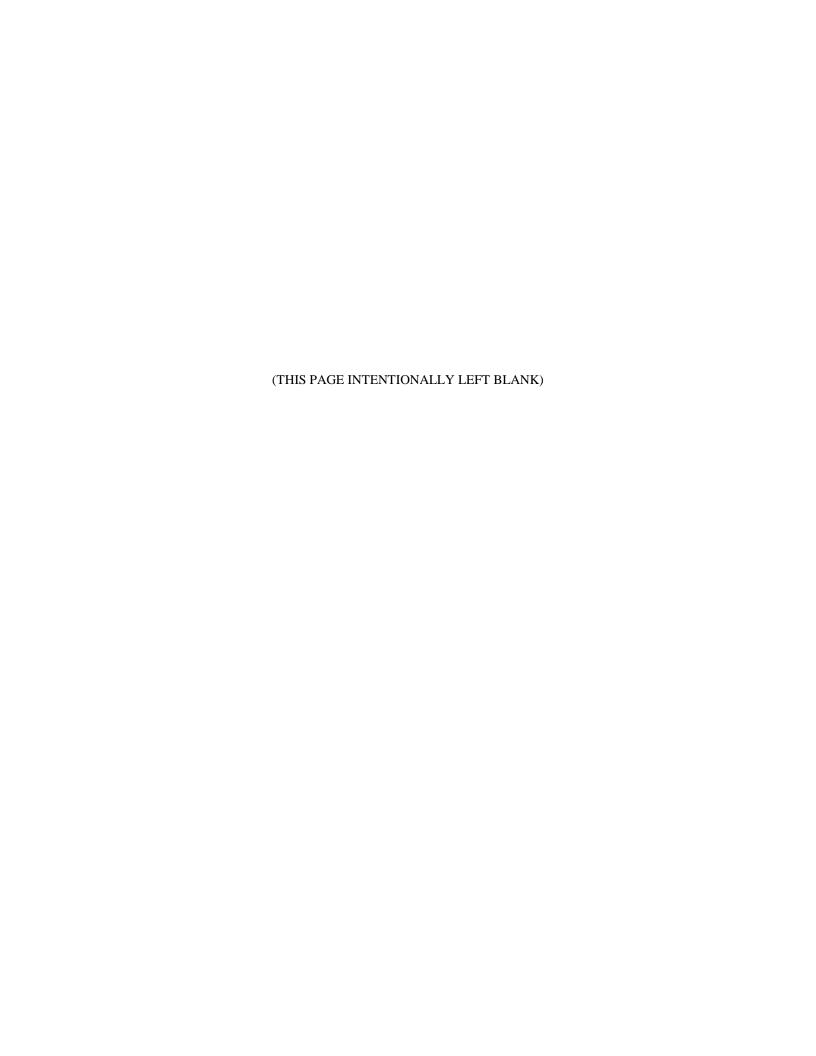
In the event the Insurer were to become insolvent, any claims arising under a policy of financial guaranty insurance are excluded from coverage by the California Insurance Guaranty Association, established pursuant to Article 14.2 (commencing with Section 1063) of Chapter 1 of Part 2 of Division 1 of the California Insurance Code.

IN WITNESS WHEREOF, the Insurer has caused this policy to be executed in facsimile on its behalf by its duly authorized officers, this [DAY] day of [MONTH, YEAR].

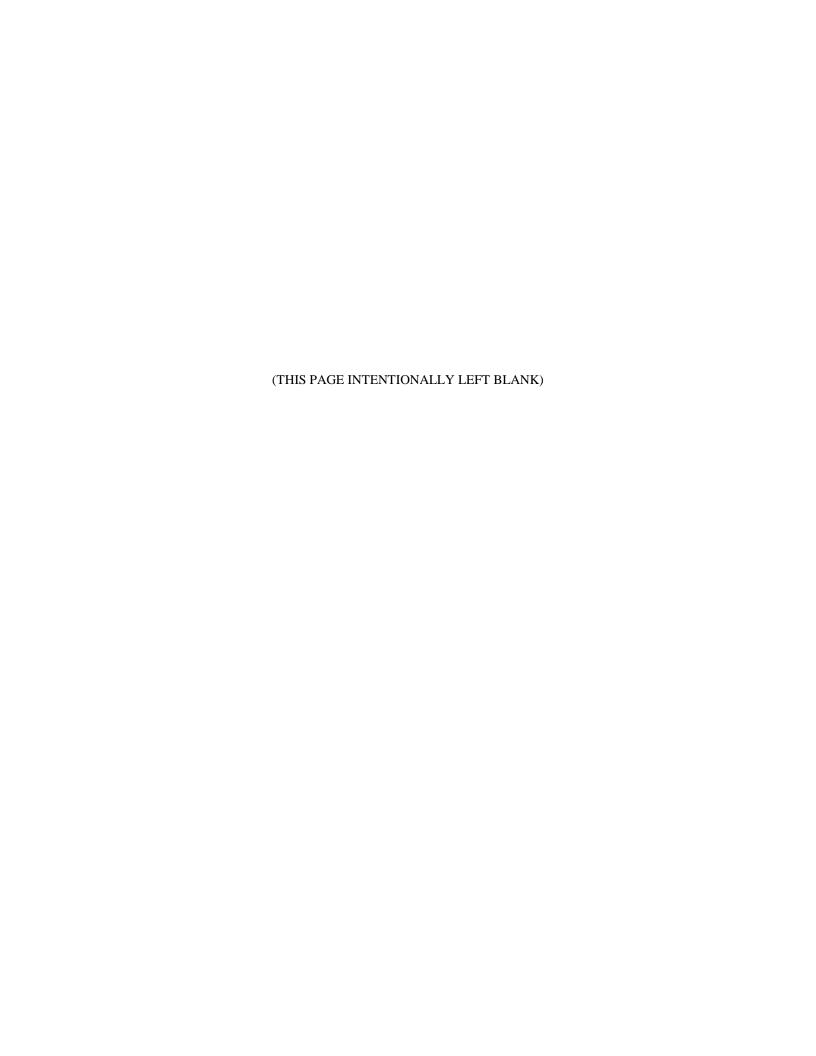
MBIA Insurance Corporation

Attest:

Assistant Secretary



APPENDIX I INFORMATION REGARDING THE BOOK-ENTRY-ONLY SYSTEM



APPENDIX I

INFORMATION REGARDING THE BOOK-ENTRY-ONLY SYSTEM

The information contained in the following paragraphs of this APPENDIX I has been extracted from a schedule prepared by DTC entitled "SAMPLE OFFERING DOCUMENT LANGUAGE DESCRIBING BOOK-ENTRY-ONLY ISSUANCE." The Authority and the City make no representation as to the completeness or the accuracy of such information or as to the absence of material adverse changes in such information subsequent to the date hereof.

- 1. DTC will act as securities depository for the Series 2002 Bonds. The Series 2002 Bonds will be issued as fully-registered securities registered in the name of Cede & Co. (DTC's partnership nominee) or such other name as may be requested by an authorized representative of DTC. One fully-registered Series 2002 Bond certificate will be issued for each maturity of the Series 2002 Bonds, in the total aggregate principal amount due at maturity, and will be deposited with DTC.
- DTC, the world's largest depository, is a limited-purpose trust company organized under the New York Banking Law, a "banking organization" within the meaning of the New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the New York Uniform Commercial Code, and a "clearing agency" registered pursuant to the provisions of Section 17A of the Securities Exchange Act of 1934. DTC holds and provides asset servicing for over 2 million issues of U.S. and non-U.S. equity issues, corporate and municipal debt issues, and money market instruments from over 85 countries that DTC's participants ("Direct Participants") deposit with DTC. DTC also facilitates the post-trade settlement among Direct Participants of sales and other securities transactions in deposited securities, through electronic computerized book-entry transfers and pledges between Direct Participants' accounts. This eliminates the need for physical movement of securities certificates. Direct Participants include both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, clearing corporations, and certain other organizations. DTC is a wholly-owned subsidiary of The Depository Trust & Clearing Corporation ("DTCC"). DTCC, in turn, is owned by a number of Direct Participants of DTC and Members of the National Securities Clearing Corporation, Government Securities Clearing Corporation, MBS Clearing Corporation, and Emerging Markets Clearing Corporation, (NSCC, GSCC, MBSCC, and EMCC, also subsidiaries of DTCC), as well as by the New York Stock Exchange, Inc., the American Stock Exchange LLC, and the National Association of Securities Dealers, Inc. Access to the DTC system is also available to others such as both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, and clearing corporations that clear through or maintain a custodial relationship with a Direct Participant, either directly or indirectly ("Indirect Participants"). DTC has Standard & Poor's highest rating: AAA. The DTC Rules applicable to its Participants are on file with the Securities and Exchange Commission. More information about DTC can be found at www.dtcc.com.
- 3. Purchases of the Series 2002 Bonds under the DTC system must be made by or through Direct Participants, which will receive a credit for the Series 2002 Bonds on DTC's records. The ownership interest of each actual purchaser of each Series 2002 Bond ("Beneficial Owner") is in turn to be recorded on the Direct and Indirect Participants' records. Beneficial Owners will not receive written confirmation from DTC of their purchase. Beneficial Owners are, however, expected to receive written confirmations providing details of the transaction, as well as periodic statements of their holdings, from the Direct or Indirect Participant through which the Beneficial Owner entered into the transaction. Transfers of ownership interests in the Series 2002 Bonds are to be accomplished by entries made on the books of Direct and Indirect Participants acting on behalf of Beneficial Owners. Beneficial Owners will not receive certificates representing their ownership interests in the Series 2002 Bonds, except in the event that use of the book-entry system for the Series 2002 Bonds is discontinued.
- 4. To facilitate subsequent transfers, all Series 2002 Bonds deposited by Direct Participants with DTC are registered in the name of DTC's partnership nominee, Cede & Co., or such other name as may be requested by an authorized representative of DTC. The deposit of Series 2002 Bonds with DTC and their registration in the name of Cede & Co. or such other DTC nominee do not effect any change in beneficial ownership. DTC has no knowledge of the actual Beneficial Owners of the Series 2002 Bonds; DTC's records reflect only the identity of the Direct Participants to whose accounts such Series 2002 Bonds are credited, which may or may not be the Beneficial Owners. The Direct and Indirect Participants will remain responsible for keeping account of their holdings on behalf of their customers.

- 5. Conveyance of notices and other communications by DTC to Direct Participants, by Direct Participants to Indirect Participants, and by Direct Participants and Indirect Participants to Beneficial Owners will be governed by arrangements among them, subject to any statutory or regulatory requirements as may be in effect from time to time.
- 6. Redemption notices shall be sent to DTC. If less than all of the Series 2002 Bonds within an issue are being redeemed, DTC's practice is to determine by lot the amount of the interest of each Direct Participant in such issue to be redeemed.
- 7. Neither DTC nor Cede & Co. (nor any other DTC nominee) will consent or vote with respect to Series 2002 Bonds unless authorized by a Direct Participant in accordance with DTC's Procedures. Under its usual procedures, DTC mails an Omnibus Proxy to the Authority as soon as possible after the record date. The Omnibus Proxy assigns Cede & Co.'s consenting or voting rights to those Direct Participants to whose accounts the Series 2002 Bonds are credited on the record date (identified in a listing attached to the Omnibus Proxy).
- 8. Principal, sinking fund and interest payments on the Series 2002 Bonds will be made to Cede & Co., or such other nominee as may be requested by an authorized representative of DTC. DTC's practice is to credit Direct Participants' accounts upon DTC's receipt of funds and corresponding detail information from Authority or Trustee, on payable date in accordance with their respective holdings shown on DTC's records. Payments by Participants to Beneficial Owners will be governed by standing instructions and customary practices, as is the case with securities held for the accounts of customers in bearer form or registered in "street name," and will be the responsibility of such Participant and not of DTC, the Trustee, the City or the Authority, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of principal, sinking fund and interest payments to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the City or the Trustee, disbursement of such payments to Direct Participants will be the responsibility of DTC, and disbursement of such payments to the Beneficial Owners will be the responsibility of Direct and Indirect Participants.
- 9. DTC may discontinue providing its services as depository with respect to the Series 2002 Bonds at any time by giving reasonable notice to the Authority or the Trustee. Under such circumstances, in the event that a successor depository is not obtained, certificated Series 2002 Bonds are required to be printed and delivered.
- 10. The Authority may decide to discontinue use of the system of book-entry transfers through DTC (or a successor securities depository). In that event, Series 2002 Bond certificates will be printed and delivered.
- 11. The information in this section concerning DTC and DTC's book-entry system has been obtained from sources that the Authority and the City believe to be reliable, but the Authority and the City take no responsibility for the accuracy thereof.

NONE OF THE AUTHORITY, THE CITY OR THE UNDERWRITERS WILL HAVE ANY RESPONSIBILITY OR OBLIGATION TO PARTICIPANTS, TO INDIRECT PARTICIPANTS OR TO ANY BENEFICIAL OWNER WITH RESPECT TO: (I) THE ACCURACY OF ANY RECORDS MAINTAINED BY DTC, ANY PARTICIPANT, OR ANY INDIRECT PARTICIPANT; (II) THE PAYMENT BY DTC OR ANY PARTICIPANT OR INDIRECT PARTICIPANT OF ANY AMOUNT OF THE PRINCIPAL OF, OR PREMIUM, IF ANY, OR INTEREST ON, THE SERIES 2002 BONDS; (III) ANY NOTICE WHICH IS PERMITTED OR REQUIRED TO BE GIVEN TO OWNERS; (IV) ANY CONSENT GIVEN BY DTC OR OTHER ACTION TAKEN BY DTC AS OWNER; OR (V) THE SELECTION BY DTC OR ANY PARTICIPANT OR INDIRECT PARTICIPANT OF ANY BENEFICIAL OWNERS TO RECEIVE PAYMENT IN THE EVENT OF A PARTIAL REDEMPTION OF THE SERIES 2002 BONDS.

SO LONG AS CEDE & CO. IS THE REGISTERED OWNER OF THE SERIES 2002 BONDS, AS NOMINEE OF DTC, REFERENCES HEREIN TO THE BONDHOLDERS OR REGISTERED OWNERS OF THE SERIES 2002 BONDS OF SUCH SERIES SHALL MEAN CEDE & CO., AS AFORESAID, AND SHALL NOT MEAN THE BENEFICIAL OWNERS OF THE SERIES 2002 BONDS.

