Combining Financial Statements Together with Report of Independent Certified Public Accountants

New York City Water and Sewer System A Component Unit of the City of New York

June 30, 2024 and 2023

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REPORT OF INDEPENDENT CERTIFIED PUBLIC ACCOUNTANTS

To the Members of the Joint Audit Committee of the New York City Municipal Water Finance Authority and New York City Water Board

Opinion

We have audited the accompanying combining financial statements of the New York City Municipal Water Finance Authority and the New York City Water Board, which collectively comprise the New York City Water and Sewer System (the "System"), a component unit of the City of New York, which collectively comprise the combining statements of net position (deficit), and the related combining statements of revenues, expenses, and changes in net position (deficit) and combining statements of cash flows as of and for the years ended June 30, 2024 and 2023, and the related notes to the combining financial statements.

In our opinion, the accompanying combining financial statements present fairly, in all material respects, the financial position of the New York City Municipal Water Finance Authority and the New York City Water Board as of June 30, 2024 and 2023, and the respective changes in their financial position and their cash flows for the years then ended in accordance with accounting principles generally accepted in the United States of America.

Basis for opinion

We conducted our audits of the combining financial statements in accordance with auditing standards generally accepted in the United States of America (US GAAS). Our responsibilities under those standards are further described in the Auditor's Responsibilities for the Audit of the Financial Statements section of our report. We are required to be independent of the System and to meet our other ethical responsibilities in accordance with the relevant ethical requirements relating to our audits. We believe that the audit evidence we have obtained is sufficient and appropriate to provide a basis for our audit opinion.

Responsibilities of management for the financial statements

Management is responsible for the preparation and fair presentation of the combining financial statements in accordance with accounting principles generally accepted in the United States of America, and for the design, implementation, and maintenance of internal control relevant to the preparation and fair presentation of combining financial statements that are free from material misstatement, whether due to fraud or error.

In preparing the combining financial statements, management is required to evaluate whether there are conditions or events, considered in the aggregate, that raise substantial doubt about the System's ability to continue as a going concern for one year after the date the combining financial statements are issued.



Auditor's responsibilities for the audit of the financial statements

Our objectives are to obtain reasonable assurance about whether the combining financial statements as a whole are free from material misstatement, whether due to fraud or error, and to issue an auditor's report that includes our opinion. Reasonable assurance is a high level of assurance but is not absolute assurance and therefore is not a guarantee that an audit conducted in accordance with US GAAS will always detect a material misstatement when it exists. The risk of not detecting a material misstatement resulting from fraud is higher than for one resulting from error, as fraud may involve collusion, forgery, intentional omissions, misrepresentations, or the override of internal control. Misstatements are considered material if there is a substantial likelihood that, individually or in the aggregate, they would influence the judgment made by a reasonable user based on the combining financial statements.

In performing an audit in accordance with US GAAS, we:

- Exercise professional judgment and maintain professional skepticism throughout the audit.
- Identify and assess the risks of material misstatement of the combining financial statements, whether due to fraud or error, and design and perform audit procedures responsive to those risks. Such procedures include examining, on a test basis, evidence regarding the amounts and disclosures in the combining financial statements.
- Obtain an understanding of internal control relevant to the audit in order to design audit procedures that are appropriate in the circumstances, but not for the purpose of expressing an opinion on the effectiveness of the System's internal control. Accordingly, no such opinion is expressed.
- Evaluate the appropriateness of accounting policies used and the reasonableness of significant accounting estimates made by management, as well as evaluate the overall presentation of the combining financial statements.
- Conclude whether, in our judgment, there are conditions or events, considered in the aggregate, that raise substantial doubt about the System's ability to continue as a going concern for a reasonable period of time.

We are required to communicate with those charged with governance regarding, among other matters, the planned scope and timing of the audit, significant audit findings, and certain internal control-related matters that we identified during the audit.

Required supplementary information

Accounting principles generally accepted in the United States of America require that the management's discussion and analysis on pages 6 through 17, the schedule of changes for total OPEB plan liability and related ratios on page 66, the schedule of the Authority's proportionate share of the net pension liability on page 67, and the schedule of the Authority's pension contributions on page 67 be presented to supplement the basic combining financial statements. Such information is the responsibility of management and, although not a required part of the basic combining financial statements, is required by the Governmental Accounting Standards Board who considers it to be an essential part of financial reporting for placing the basic combining financial statements in an appropriate operational, economic, or historical context. We have applied certain limited procedures to the required supplementary information in accordance with US GAAS. These limited procedures consisted of inquiries of management about the methods of preparing the information and comparing the information for consistency with management's responses to our



inquiries, the basic combining financial statements, and other knowledge we obtained during our audits of the basic combining financial statements. We do not express an opinion or provide any assurance on the information because the limited procedures do not provide us with sufficient evidence to express an opinion or provide any assurance.

New York, New York October 11, 2024

Grant Thornton LLP

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED)

June 30, 2024 and 2023

Overview of the Combining Financial Statements

The following is an overview of the financial activities of the New York City Water and Sewer System (the "System") as of and for the fiscal years ended June 30, 2024 and 2023. The System is a joint operation consisting of two legally separate and independent entities: the New York City Municipal Water Finance Authority (the "Authority") and the New York City Water Board (the "Water Board"). The System is a component unit of The City of New York (the "City").

The combining financial statements consist of four parts: (1) management's discussion and analysis (this section), (2) the basic combining financial statements, (3) the notes to the combining financial statements and (4) required supplementary information.

The basic combining financial statements of the System, which include the combining statements of net position (deficit), the combining statements of revenues, expenses and changes in net position (deficit) and the combining statements of cash flows, are presented for the purposes of displaying entity-wide information in accordance with Governmental Accounting Standards Board ("GASB") requirements. These combining financial statements are prepared using the economic resources measurement focus and the accrual basis of accounting. Accordingly, revenues are recognized when earned, and expenses are recorded when a liability is incurred, regardless of the timing of the related cash flows.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

Financial Analysis and Results of Operations

The following summarizes the activities of the System for the fiscal years 2024, 2023, and 2022, respectively (in thousands):

				Vari	ance
	2024	2023	2022	2024 vs 2023	2023 vs 2022
Revenues					
Operating revenues:					
Water supply and distribution	\$ 1,594,989	\$ 1,582,456	\$ 1,441,310	\$ 12,533	\$ 141,146
Sewer collection and					
treatment	2,536,031	2,516,104	2,291,683	19,927	224,421
Bad debt expense	(126,487)	(98,632)	(10,013)	(27,855)	(88,619)
Other operating revenues	257,188	203,039	156,062	54,149	46,977
Total operating revenues	4,261,721	4,202,967	3,879,042	58,754	323,925
Non-operating revenues:					
Subsidies income	145,355	183,001	156,389	(37,646)	26,612
Investment income (loss)	172,181	96,007	(5,985)	76,174	101,992
mvestment moome (1033)			(0,000)		101,002
Total non-operating					
revenues	317,536	279,008	150,404	38,528	128,604
Total revenues	4,579,257	4,481,975	4,029,446	97,282	452,529
Expenses					
Operations and maintenance	1,952,826	1,710,007	1,574,864	242,819	135,143
General and administrative	45,122	47,153	46,450	(2,031)	703
Other operating expenses	125,328	164,464	89,395	(39,136)	75,069
Depreciation and amortization	992,055	1,022,165	1,037,925	(30,110)	(15,760)
Interest expense and cost of				, ,	, ,
issuance	1,200,839	1,161,526	1,049,642	39,313	111,884
Net loss on retirement and					
impairment of capital assets	8,270	1,566	3,080	6,704	(1,514)
Capital distributions	51,263	161,577	37,967	(110,314)	123,610
Gain on defeasance	(11,559)	-	(9,244)	(11,559)	9,244
Total expenses	4,364,144	4,268,458	3,830,079	95,686	438,379
Net income before					
capital contributions	215,113	213,517	199,367	1,596	14,150
Canital contributions	25,147	19,765	18,544	5,382	1,221
Capital contributions	20, 147	10,700	10,044	0,002	1,221
CHANGE IN NET					
POSITION (DEFICIT)	240,260	233,282	217,911	6,978	15,371
. 55111611 (BE11611)	2-70,200	200,202	217,011	0,070	10,071
Net position (deficit) - beginning	1,893,748	1,660,466	1,442,555	233,282	217,911
not position (denote) - beginning	.,,.	.,,	.,,		
Net position (deficit) - ending	\$ 2,134,008	\$ 1,893,748	\$ 1,660,466	\$ 240,260	\$ 233,282
not position (donott) onding					

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

Operating Revenues

Operating revenues are comprised of water supply and distribution, sewer collection and treatment, bad debt expense, and other operating revenues.

2024-2023

Operating revenues increased by \$58.8 million, or 1.4% compared to fiscal year 2023. The increase in revenues reflects a combination of (a) 4.42% rate increase for fiscal year 2024, (b) lower billed water consumption by customers during the first half of the year, (c) higher past due customer account balances contributing to higher late payment fees, and (d) amounts received through the New York State Office of Temporary Disability Assistance's Low Income Household Water Assistance Program.

Bad debt expense increased by \$27.9 million. The increase in the bad debt expense is primarily due to the increase in accounts receivable, particularly in accounts with prior outstanding balances.

2023-2022

Operating revenues increased by \$324 million, or 8.4% compared to fiscal year 2022. The increase in revenues reflects a combination of (a) 4.90% rate increase for fiscal year 2023, (b) an overall increase in water consumption by customers, and (c) revenues received from customers participating in the Board's Water Bill Amnesty Program and from amounts received through the New York State Office of Temporary Disability Assistance's Low Income Household Water Assistance Program.

Bad debt expense increased by \$88.6 million. During fiscal year 2023, management reviewed the methodology for estimating accounts receivable and reserves for non-utility charges and updated its methodology for reserving those balances.

Other Operating Revenues

The following further details other operating revenues for fiscal years 2024, 2023, and 2022, respectively (in thousands):

					Vari	ance	
	 2024	 2023	 2022	202	24 vs 2023	202	23 vs 2022
Upstate water fees	\$ 98,850	\$ 92,645	\$ 76,071	\$	6,205	\$	16,574
Late payment fees	85,315	69,092	29,864		16,223		39,228
Change in residual interest in sold							
liens	5,575	114	-		5,461		114
Connection fees and permits	18,490	10,391	9,793		8,099		598
Service line protection program	 48,958	 30,797	 40,334		18,161		(9,537)
Total other operating revenues	\$ 257,188	\$ 203,039	\$ 156,062	\$	54,149	\$	46,977

2024-2023

Upstate water fees increased by \$6.2 million. This was primarily due to rate increases for entitlement quantity water of 6.76% and excess quantity water of 4.42%.

Late payment fees increased by \$16.2 million compared to fiscal year 2023 due to DEP's communication and collection enforcement efforts involving accounts with delinquent balances, an increase in the average effective interest rate the Board was authorized by the New York City Council to charge, and the ability of

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

DEP's billing system to charge multiple tiers of interest rates depending on assessed property values. This amount fluctuates depending on the timeliness of customer payment.

The amounts received for the service line protection program increased by \$18.2 million, due to an increase in the number of policies in effect during the year and an increase in the price of policies.

2023-2022

Upstate water fees increased by \$16.6 million. This was due to a combination of an increase in the volume of water supplied to these customers, including increases to the volume of water sold at both the entitlement and excess rates, and increases to the entitlement and excess rates of 1.4% and 4.9%.

Late payment fees increased by \$39.2 million compared to fiscal year 2022 due to more payments made for delinquent accounts, an increase in the average effective interest rate the Board was authorized by the New York City Council to charge, and the ability of DEP's new billing system to charge multiple tiers of interest rates depending on assessed property values. This amount fluctuates depending on the timeliness of customer payment.

The amounts received for the service line protection program decreased by \$9.5 million, due to a decrease in the number of policies in effect during the year and an increase in customer delinquencies.

Non-Operating Revenues

Non-operating revenues are comprised of subsidies, grants and investment income.

2024-2023

Investment income increased by \$76.2 million compared to fiscal year 2023. The increase was mainly due to higher yields on new securities purchased and more funds available to invest during fiscal year 2024.

2023-2022

Investment income increased by \$102 million compared to fiscal year 2022. The increase was mainly due to higher yields on new securities purchased and more funds available to invest during fiscal year 2023.

Operating Expenses

Operating expenses are comprised of operations and maintenance, general and administrative, depreciation and amortization, and other operating expenses.

2024-2023

Total operations and maintenance expense increased by \$243 million or 14% compared to fiscal year 2023. This is due primarily to the \$145 million rental payment made to The City, as well as to collective bargaining increases and an increase in the rate used to calculate fringe benefits, higher water and wastewater treatment chemical costs, and investments in management information systems and cybersecurity measures.

Depreciation and amortization decreased by \$30.1 million compared to fiscal year 2023.

Other operating expenses decreased by \$39.1 million compared to fiscal year 2023, primarily due to decreases in program expenses and expenses related to the System's filtration avoidance determination.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

2023-2022

Total operations and maintenance expense increased by \$135 million or 8.6% compared to fiscal year 2022. This is due primarily to The City's collective bargaining settlement with DC37, an increase in the rate used to calculate fringe benefits, and increases in other than personal services expenses.

Depreciation and amortization decreased by \$15.8 million compared to fiscal year 2022.

Other operating expenses increased \$75.1 million compared to fiscal year 2022, primarily due to increases in program expenses, pollution remediation expenses, and expenses related to the System's filtration avoidance determination.

Non-Operating Expenses

Non-operating expenses are comprised of interest expense, gain on defeasance, cost of issuance, net loss on retirement of capital assets, and capital distribution.

2024-2023

Capital distribution decreased by \$110 million in fiscal year 2024 compared to fiscal year 2023. The decrease in capital distributions was primarily due to a decrease in the amount distributed to The City for the South Shore of Staten Island Coastal Storm Risk Management project (discussed further below) and a decrease in the land acquired and granted to The City.

Interest expense and cost of issuance increased by \$39.3 million. This increase was primarily due to the issuance of new bonds and higher short term interest expense, offset by amortization of bond premium and deferred refunding cost which decrease interest expense.

Gain on defeasance increased by \$11.6 million because of a cash defeasance in fiscal year 2024, while there was no cash defeasance in fiscal year 2023.

2023-2022

Capital distribution increased by \$124 million in fiscal year 2023 compared to fiscal year 2022. In fiscal year 2023, DEP distributed over \$50.0 million for the South Shore of Staten Island Coastal Storm Risk Management project. DEP is collaborating with the U.S. Army Corps of Engineers and other City agencies to design and construct the protective seawall at the Shoreline Parks in Staten Island. DEP is responsible for the interior drainage and stormwater retention components of this project, including bluebelts, to reduce runoff into the sewer system. The capital distributions amount also varies each year based on the land acquired and then granted to The City.

Interest expense and cost of issuance increased by \$112 million. This increase was primarily due to the issuance of new bonds and higher interest expense, offset by amortization of bond premium and deferred refunding cost which decrease interest expense.

Gain on defeasance decreased by \$9.2 million because there was no cash defeasance in fiscal year 2023.

Capital Contributions

Capital Contributions are comprised of federal, state and other contributions to the System's capital projects.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

2024-2023

Capital contributions increased by \$5.4 million in fiscal year 2024.

2023-2022

Capital contributions increased by \$1.2 million in fiscal year 2023.

Change in Net Position (Deficit)

2024-2023

The change in net position (deficit) represents the net total of operating revenues and expenses, non-operating revenues and expenses, and capital contributions. The change in net position (deficit) increased by \$7.0 million in fiscal year 2024 compared to fiscal year 2023. As explained in more detail above, such increase was due primarily to the combined effect of a \$58.8 million increase in operating revenue, a \$76.2 million increase in investment income, a \$110 million decrease in capital distributions, and a \$39.1 million decrease in other operating expenses, offset by a \$39.3 million increase in interest expense and cost of issuance and a \$243 million increase in operations and maintenance expense.

2023-2022

The change in net position (deficit) represents the net total of operating revenues and expenses, non-operating revenues and expenses, and capital contributions. The change in net position (deficit) increased by \$15.4 million in fiscal year 2023 compared to fiscal year 2022. As explained in more detail above, such increase was due primarily to the combined effect of a \$324 million increase in operating revenue and \$102 million increase in investment income, offset by a \$124 million increase in capital distributions, a \$112 million increase in interest expense and cost of issuance, a \$135 million increase in operations and maintenance expense, and a \$75.1 million increase in other operating expenses.

Ending Net Position (Deficit)

2024-2023

The ending net position (deficit) represents the net total of operating revenues and expenses, non-operating revenues and expenses, capital contributions, and beginning balance of net position (deficit). Ending net position (deficit) increased by \$240 million or 12.7% compared to fiscal year 2023.

2023-2022

The ending net position (deficit) represents the net total of operating revenues and expenses, non-operating revenues and expenses, capital contributions, and beginning balance of net position (deficit). Ending net position (deficit) increased by \$233 million or 14.0% compared to fiscal year 2022.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

The following is a summary of the System's assets, deferred outflows of resources, liabilities, deferred inflows of resources and net position (deficit) as of June 30 (in thousands):

				Vari	ance
	2024	2023	2022	2024 vs 2023	2023 vs 2022
Assets Current assets Residual interest in sold liens Capital assets	\$ 4,349,877 69,080 34,123,301	\$ 4,132,652 63,505 33,555,582	\$ 3,670,122 63,391 33,058,749	\$ 217,225 5,575 567,719	\$ 462,530 114 496,833
Total assets	38,542,258	37,751,739	36,792,262	790,519	959,478
Deferred outflows of resources: Accumulated change in fair value of hedging derivative Deferred changes in net pension liability Unamortized asset retirement obligations Deferred changes in OPEB liability	- 84 9,151 1,424	36,705 412 9,640 672	60,991 707 10,158 632	(36,705) (328) (489) 752	(24,286) (295) (518) 40
Total deferred outflows of resources	10,659	47,429	72,488	(36,770)	(25,059)
Total assets and deferred outflows of resources	\$ 38,552,917	\$ 37,799,168	\$ 36,864,750	\$ 753,749	\$ 934,418
Liabilities: Current liabilities Long-term liabilities	\$ 1,306,819 34,865,354	\$ 1,445,031 34,264,447	\$ 1,127,273 33,957,896	\$ (138,212) 600,907	\$ 317,758 306,551
Total liabilities	36,172,173	35,709,478	35,085,169	462,695	624,309
Deferred inflows of resources: Unamortized deferred bond refunding costs Deferred changes in net pension liability Deferred changes in OPEB liability	246,087 (23) 672	195,060 36 846	117,958 125 1,032	51,027 (59) (174)	77,102 (89) (186)
Total deferred inflows of resources	246,736	195,942	119,115	50,794	76,827
Net position (deficit): Net investment in capital assets Restricted for debt service Restricted for operations and maintenance Unrestricted deficit	894,731 1,929,493 333,555 (1,023,771)	718,114 1,905,323 322,235 (1,051,924)	685,990 1,573,633 285,656 (884,813)	176,617 24,170 11,320 28,153	32,124 331,690 36,579 (167,111)
Total net position (deficit)	2,134,008	1,893,748	1,660,466	240,260	233,282
Total liabilities, deferred inflows of resources, and net position (deficit)	\$ 38,552,917	\$ 37,799,168	\$ 36,864,750	\$ 753,749	\$ 934,418

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

Current Assets

Current assets are comprised of restricted cash and cash equivalents, restricted investments, accrued interest and federal subsidy receivable, receivable from The City, and accounts receivable.

2024-2023

Current assets increased by \$217 million or 5.3%. Restricted investments, including restricted cash and cash equivalents, increased by \$97.0 million primarily in the revenue fund and construction fund. Construction fund balances fluctuate due to the timing of bonds issuances and payments to The City for capital costs. Restricted assets held in the Authority's escrow accounts and in the debt service reserve fund declined by \$45.1 million and \$69.1 million, respectively. Assets held in the escrow accounts decline when funds are applied to repayment of debt. The decline in the debt service reserve fund is largely due to a \$60.5 million release of funds held in the reserve fund as a result of a reduction in the reserve requirement. Accounts receivable net of allowance for uncollectable increased by \$82.3 million and receivable from The City decreased by \$0.7 million.

2023-2022

Current assets increased by \$463 million or 12.6%. Restricted investments, including restricted cash and cash equivalents, increased by \$397 million primarily in the revenue fund and construction fund. Construction fund balances fluctuate due to the timing of bonds issuances and payments to The City for capital costs. Restricted assets held in the Authority's escrow accounts and in the debt service reserve fund declined by \$84.6 million and \$68.0 million, respectively. Assets held in the escrow accounts decline when funds are applied to repayment of debt. The decline in the debt service reserve fund is largely due to a \$59.7 million release of funds held in the reserve fund as a result of a reduction in the reserve requirement. Accounts receivable net of allowance for uncollectable increased by \$84.7 million and receivable from The City decreased by \$23.5 million.

Current Liabilities

Current liabilities are comprised of accounts payable, interest payable, revenue received in advance, current portion of bonds and notes payable, payable to The City, and service credits on customer accounts.

2024-2023

Current liabilities decreased by \$138 million, or 9.6%, compared to fiscal year 2023. This was primarily due to a decrease in the current portion of bonds and notes payable.

2023-2022

Current liabilities increased by \$318 million, or 28.2%, compared to fiscal year 2022. This was primarily due to an increase in the current portion of bonds and notes payable.

Long-Term Liabilities

Long-term liabilities are comprised of bonds and notes payable, pollution remediation obligation, interest rate swap agreements, net, revenue requirements payable to the Authority, net pension liability, net OPEB liability, and other long-term liabilities.

2024-2023

Long-term liabilities increased by \$601 million, or 1.7%, primarily due to the issuance of new debt to fund capital projects, offset by the retirement of existing debt through debt service payments and refundings.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

2023-2022

Long-term liabilities increased by \$307 million, or 1.0%, primarily due to the issuance of new debt to fund capital projects, offset by the retirement of existing debt through debt service payments and refundings.

Capital Assets

The System's capital assets include buildings, machinery and equipment, vehicles, water supply and wastewater treatment systems, and water distribution and sewage collection systems, as well as utility construction.

Capital assets as of June 30 are detailed as follows (in thousands):

				Vari	ance
	2024	2023	2022	2024 vs 2023	2023 vs 2022
Nondepreciable assets Utility construction in progress	\$ 7,154,102	\$ 6,881,740	\$ 6,271,077	\$ 272,362	\$ 610,663
Depreciable assets Utility plant in service:					
Buildings	35,821	35,821	35,821	-	
Machinery and equipment	5,750,220	5,630,449	5,549,134	119,771	81,315
Vehicles	286,826	277,656	287,885	9,170	(10,229)
Water supply and distribution and wastewater treatment and					
sewage collection systems	41,551,667	40,416,747	39,595,255	1,134,920	821,492
Total utility plant in service	47,624,534	46,360,673	45,468,095	1,263,861	892,578
Less accumulated depreciation for:					
Buildings	31,467	31,184	30,900	283	284
Machinery and equipment	3,658,051	3,404,626	3,156,160	253,425	248,466
Vehicles	157,669	146,626	146,485	11,043	141
Water supply and distribution and wastewater treatment and					
sewage collection systems	16,808,148	16,104,395	15,346,878	703,753	757,517
Total accumulated					
depreciation	20,655,335	19,686,831	18,680,423	968,504	1,006,408
Total utility plant in service - net	26,969,199	26,673,842	26,787,672	295,357	(113,830)
Total capital assets - net	\$ 34,123,301	\$ 33,555,582	\$ 33,058,749	\$ 567,719	\$ 496,833

2024-2023

The Authority issues debt to pay for the capital improvements to the System and related costs. Costs related to the System's filtration avoidance determination, including land acquisition in the upstate watershed area and certain costs associated with pollution remediation, are financed with debt but are not recorded as the System's assets on the combining statements of net position (deficit). The cumulative amount of expenses not capitalized as assets as of June 30, 2024 was \$1.98 billion. These costs or distributions are expensed in the System's combining statements of revenues, expenses, and changes in net position (deficit) in the years incurred. The land purchased is granted to The City and becomes The City's capital asset because it is not subject to the method of capitalization under which the System reports its capital assets.

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

Total gross additions to non-depreciable assets utility construction in progress were \$1.58 billion and a total of \$1.29 billion of completed projects were moved from utility construction in progress into depreciable assets utility plant in service. This resulted in a \$272 million increase in utility construction in progress, representing a 4.0% net increase compared to fiscal year 2023. The System completed \$237 million of construction work involving the Catskill Aqueduct repair and rehabilitation, constructed sanitary and storm sewers at Sheldon Avenue in Staten Island with a project value of \$42.7 million, constructed additional sanitary and storm sewers at Beach 20th Street in Rockaway Beach, Queens involving a project value of \$39.8 million, completed \$28.6 million of solid facility modifications at North River, and installed \$26.8 million of centrifuges at Wards Island. Total capital assets, net of depreciation, increased by \$568 million, a 1.7% increase from fiscal year 2023.

2023-2022

The Authority issues debt to pay for the capital improvements to the System and related costs. Costs related to the System's filtration avoidance determination, including land acquisition in the upstate watershed area and certain costs associated with pollution remediation, are financed with debt but are not recorded as the System's assets on the combining statements of net position (deficit). The cumulative amount of expenses not capitalized as assets as of June 30, 2023 was \$1.77 billion. These costs or distributions are expensed in the System's combining statements of revenues, expenses, and changes in net position (deficit) in the years incurred. The land purchased is granted to The City and becomes The City's capital asset because it is not subject to the method of capitalization under which the System reports its capital assets.

Total gross additions to non-depreciable assets utility construction in progress were \$1.52 billion and a total of \$909 million of completed projects were moved from utility construction in progress into depreciable assets utility plant in service. This resulted in a \$611 million increase in utility construction in progress, representing a 9.7% net increase compared to fiscal year 2022. The System completed the construction of 1,900 bioswales around the areas of Jamaica Bay Watershed of \$104 million, constructed Level 1 Biological Nutrient Removal system at Coney Island Waste Water Treatment Plant of \$51.8 million, completed the overflow chamber expansions at Westchester Creek of \$30.4 million, and built bluebelt, storm and sanitary sewers, and water main replacement at New Creek in Staten Island for \$49.0 million. Total capital assets, net of depreciation, increased by \$497 million, a 1.5% increase from fiscal year 2022.

Deferred Outflows of Resources

Deferred outflows of resources are comprised of accumulated changes in fair value of hedging derivative, deferred changes in net pension liability, unamortized asset retirement obligations, and deferred changes in OPEB liability.

2024-2023

Deferred outflows from hedging decreased by \$36.7 million, or 100%, compared to fiscal year 2023 due to the termination of the Authority's hedging derivative instruments.

2023-2022

Deferred outflows from hedging decreased by \$24.3 million, or 39.8%, compared to fiscal year 2022 due to an increase in the fair value of the hedging derivative instruments.

Debt Administration

The debt program of the Authority includes commercial paper notes and long-term debt issued to the public, as well as bond anticipation notes ("BANs") and interest-subsidized bonds issued to the New York State Environmental Facilities Corporation ("EFC"). Commercial paper notes and BANs are interim financing instruments. In fiscal years 2024 and 2023, the Authority did not issue any commercial paper notes, relying

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

instead on bond and BANs proceeds to reimburse The City for payments made for water and sewer capital projects. The Authority periodically issues long-term debt to retire outstanding BANs and commercial paper notes. The Authority also issues refunding bonds to refinance higher cost debt and uses current revenues to defease debt.

As of June 30, 2024, the total outstanding debt of the System was \$32.58 billion, which was comprised of adjustable-rate bonds, fixed-rate bonds and BANs. The following table summarizes debt program activities for the fiscal year ended June 30, 2024 (in thousands):

	Outstanding Principal Balance at June 30, 2023	Issued	Principal Retired	Principal Defeased	Outstanding Principal Balance at June 30, 2024
First resolution bonds Second resolution bonds Second resolution BANs	\$ 455,741 31,616,997 179,857	\$ 3,605,006 331,423	\$ - (546,685) -	\$ (50,000) (2,516,982) (500,331)	\$ 405,741 32,158,336 10,949
Total bonds payable	\$ 32,252,595	\$ 3,936,429	\$ (546,685)	\$ (3,067,313)	\$ 32,575,026

During fiscal year 2024, the Authority issued \$2.84 billion of water and sewer system revenue bonds to the public, including \$1.76 billion of refunding bonds and \$1.08 billion of new money bonds. Additionally, the Authority issued \$296 million of refunding water and sewer system revenue bonds and \$464 million of new money bonds to EFC. The Authority also drew down \$331 million of proceeds from BANs issued to EFC. The Authority used new money bond proceeds to finance capital improvements to the System, to refinance BANs, and to pay for bond issuance costs.

During fiscal year 2024, the Authority issued \$2.06 billion of bonds to refund \$2.35 billion of outstanding bonds. These refundings resulted in an accounting gain of \$117 million. This amount is deferred and amortized over the shorter of the remaining life of the old debt or the life of the new debt. The Authority reduced its aggregate debt service for principal and interest by \$198 million and obtained an economic benefit (present value savings) of \$224 million.

During fiscal year 2024, the Authority did not legally defease any outstanding bonds. The Authority executed an in-substance defeasance of \$213 million using current resources.

As of June 30, 2023, the total outstanding debt of the System was \$32.25 billion, which was comprised of adjustable-rate bonds, fixed-rate bonds and BANs. The following table summarizes debt program activities for the fiscal year ended June 30, 2023 (in thousands):

	Outstanding Principal Balance at June 30, 2022	Issued	Principal Retired	Principal Defeased	Outstanding Principal Balance at June 30, 2023
First resolution bonds Second resolution bonds Second resolution BANs	\$ 789,871 30,651,162 101,126	\$ 3,317,911 613,298	\$ - (348,911) -	\$ (334,130) (2,003,165) (534,567)	\$ 455,741 31,616,997 179,857
Total bonds payable	\$ 31,542,159	\$ 3,931,209	\$ (348,911)	\$ (2,871,862)	\$ 32,252,595

In fiscal year 2023, the Authority issued \$2.44 billion of water and sewer system revenue bonds to the public, including \$1.85 billion of refunding bonds and \$596 million of new money bonds. Additionally, the Authority issued \$367 million of refunding water and sewer system revenue bonds and \$538 million of new

MANAGEMENT'S DISCUSSION AND ANALYSIS (UNAUDITED) - CONTINUED

June 30, 2024 and 2023

money bonds to EFC. The Authority also drew down \$613 million of proceeds from BANs issued to EFC. The Authority used new money bond proceeds to finance capital improvements to the System and to pay for bond issuance costs.

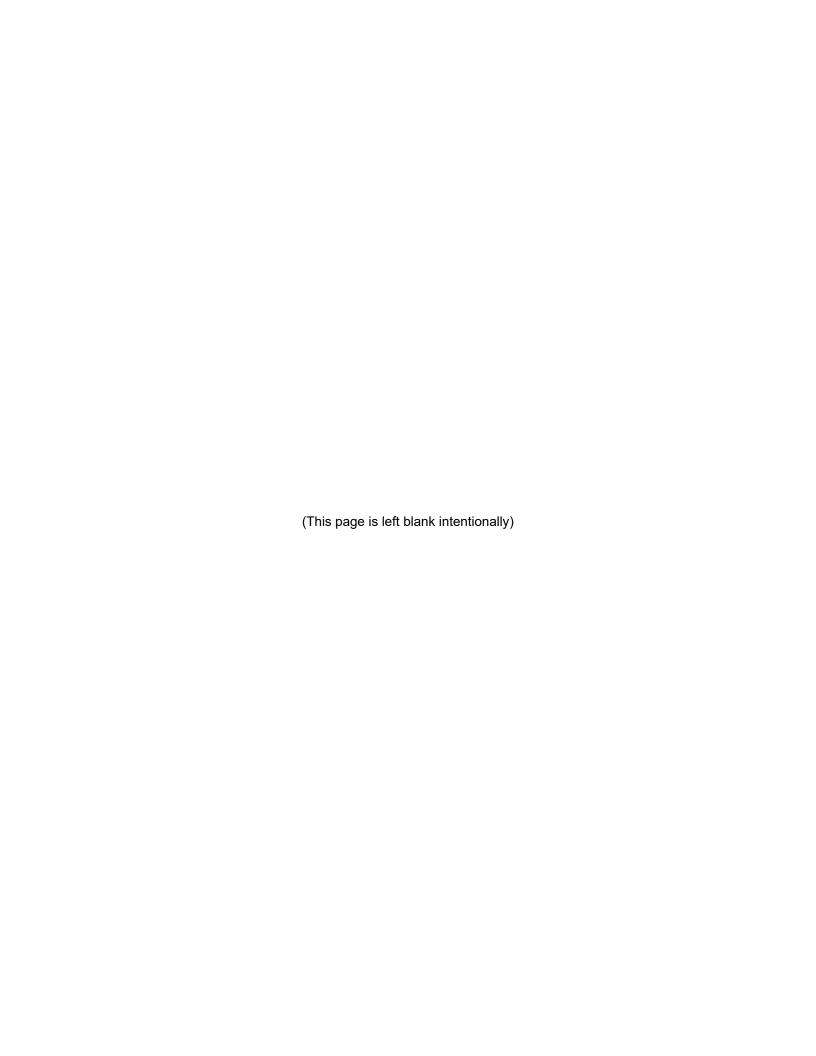
During fiscal year 2023, the Authority issued \$2.19 billion of bonds to refund \$2.34 billion of outstanding bonds. These refundings resulted in an accounting gain of \$106 million. This amount is deferred and amortized over the shorter of the remaining life of the old debt or the life of the new debt. The Authority reduced its aggregate debt service for principal and interest by \$298 million and obtained an economic benefit (present value savings) of \$200 million.

During fiscal year 2023, the Authority did not legally defease any outstanding bonds using current resources.

Request for Information

This financial report is provided as an overview of the System's finances. Questions concerning any of the information in this report or requests for additional information should be directed to Investor Relations, New York City Municipal Water Finance Authority, 255 Greenwich Street, New York, New York 10007 or to NYWInvestors@omb.nyc.gov.

* * * * * *



COMBINING STATEMENTS OF NET POSITION (DEFICIT)

June 30, 2024

			Ne	w York City			
ASSETS AND DEFERRED OUTFLOWS OF RESOURCES	Wat	ter Board		nicipal Water Finance Authority	,	Eliminations	Total
AGGETG AND DETERMED GOTT EGYTG OF NEGGGROEG		ter board		(in tho			 Total
ASSETS				(,	
Current assets							
Restricted cash and cash equivalents	\$	303,832	\$	2,369,492	\$	-	\$ 2,673,324
Restricted investments		43,851		396,351		-	440,202
Accrued interest and federal subsidy receivable		3,294		46,076		-	49,370
Accounts receivable:							
Billed - less allowance for uncollectable							
water and sewer receivables of \$748,227		780,856		-		-	780,856
Unbilled - less allowance for uncollectable							
water and sewer receivables of \$30,849		332,077		-		-	332,077
Receivable from The City of New York		74,048		=		=	 74,048
Total current assets		1,537,958		2,811,919			4,349,877
Non-current assets							
Utility plant in service - less							
accumulated depreciation of \$20,655,335	2	26,969,199		_		_	26,969,199
Utility plant construction		7,154,102					 7,154,102
Total capital assets	;	34,123,301		-		-	34,123,301
Residual interest in sold liens		69,080		_		_	69,080
Revenue required to be billed by and received							
from the Water Board				9,287,203		(9,287,203)	 =
Total non-current assets	;	34,192,381		9,287,203		(9,287,203)	 34,192,381
Total assets	;	35,730,339		12,099,122		(9,287,203)	38,542,258
Deferred outflows of resources							
Deferred changes in net pension liability		-		84		-	84
Unamortized asset retirement obligations		9.151		-		_	9.151
Deferred changes in OPEB liability		-		1,424		<u> </u>	 1,424
Total deferred outflows of resources		9,151		1,508		<u> </u>	10,659
Total assets and deferred outflows of resources	\$:	35,739,490	\$	12,100,630	\$	(9,287,203)	\$ 38,552,917

COMBINING STATEMENTS OF NET POSITION (DEFICIT) - CONTINUED

June 30, 2024

		New York City		
LIABILITIES, DEFERRED INFLOWS OF RESOURCES AND NET POSITION (DEFICIT)	Water Board	Municipal Water Finance Authority	Eliminations	Total
	Trator Board		usands)	- I Ottai
LIABILITIES		(iii siiic	,	_
Current liabilities				
Accounts payable	\$ 10,180	\$ 7,671	\$ -	\$ 17,851
Interest payable	-	61,912	-	61,912
Current portion of bonds and notes payable	-	534,617	_	534,617
Payable to the City of New York	-	583,042	-	583,042
Service credits on customer accounts	109,397			109,397
Total current liabilities	119,577	1,187,242		1,306,819
Long-term liabilities				
Bonds and notes payable	-	34,765,150	-	34,765,150
Pollution remediation obligation	77,069	-	-	77,069
Revenue requirements payable to the Authority	9,287,203	-	(9,287,203)	-
Net pension liability	-	588	·	588
Net OPEB liability	=	3,097	-	3,097
Other long-term liability	18,405	1,045		19,450
Total long-term liabilities	9,382,677	34,769,880	(9,287,203)	34,865,354
Total liabilities	9,502,254	35,957,122	(9,287,203)	36,172,173
Deferred inflows of resources				
Unamortized deferred bond refunding costs	-	246,087	_	246,087
Deferred changes in net pension liability	-	(23)	_	(23)
Deferred changes in OPEB liability		672		672
Total deferred inflows of resources		246,736		246,736
Net position (deficit)				
Net investment in capital assets	34,123,301	(33,228,570)	-	894,731
Restricted for debt service	· · ·	1,929,493	-	1,929,493
Restricted for operations and maintenance	333,555	· · ·	-	333,555
Unrestricted (deficit) net position	(8,219,621)	7,195,850		(1,023,771)
Total net position (deficit)	26,237,235	(24,103,227)		2,134,008
Total liabilities, deferred inflows of resources				
and net position (deficit)	\$ 35,739,490	\$ 12,100,630	\$ (9,287,203)	\$ 38,552,917

COMBINING STATEMENTS OF NET POSITION (DEFICIT)

June 30, 2023

	New York City			
		Municipal Water Finance	_	
ASSETS AND DEFERRED OUTFLOWS OF RESOURCES	Water Board	Authority	Eliminations	Total
		(in tho	usands)	
ASSETS				
Current assets				
Restricted cash and cash equivalents	\$ 311,573	\$ 2,677,390	\$ -	\$ 2,988,963
Restricted investments	22,991	4,598	-	27,589
Accrued interest and federal subsidy receivable	692	10,050	=	10,742
Accounts receivable:				
Billed - less allowance for uncollectable				
water and sewer receivables of \$623,506	700,077	-	-	700,077
Unbilled- less allowance for uncollectable				
water and sewer receivables of \$29,082	330,526	-	-	330,526
Receivable from The City of New York	74,755	·		74,755
Total current assets	1,440,614	2,692,038		4,132,652
Non-current assets				
Utility plant in service - less				
accumulated depreciation of \$19,686,831	26,673,842	-	-	26,673,842
Utility plant construction	6,881,740	<u> </u>		6,881,740
Total capital assets	33,555,582	-	-	33,555,582
Residual interest in sold liens	63,505	-	-	63,505
Revenue required to be billed by and received				
from the Water Board	-	9,829,264	(9,829,264)	
Total non-current assets	33,619,087	9,829,264	(9,829,264)	33,619,087
Total assets	35,059,701	12,521,302	(9,829,264)	37,751,739
Deferred outflows of resources				
Accumulated decrease in fair value of hedging				
derivative	-	36,705	-	36,705
Deferred changes in net pension liability	=	412	=	412
Unamortized asset retirement obligations	9,640	-	-	9,640
Deferred changes in OPEB liability	<u> </u>	672		672
Total deferred outflows of resources	9,640	37,789		47,429
Total assets and deferred outflows of resources	\$ 35,069,341	\$ 12,559,091	\$ (9,829,264)	\$ 37,799,168
				

COMBINING STATEMENTS OF NET POSITION (DEFICIT) - CONTINUED

June 30, 2023

		New York City		
		Municipal Water		
LIABILITIES, DEFERRED INFLOWS OF RESOURCES AND		Finance		
NET POSITION (DEFICIT)	Water Board	Authority	Eliminations	Total
LIABILITIES		(in tho	usands)	
Current liabilities				
Accounts payable	\$ 21,496	\$ 5,507	\$ -	\$ 27,003
Interest payable	-	60,228	-	60,228
Current portion of bonds and notes payable	-	725,401	-	725,401
Payable to the City of New York	-	542,710	-	542,710
Service credits on customer accounts	89,689			89,689
Total current liabilities	111,185	1,333,846	-	1,445,031
Long-term liabilities				
Bonds and notes payable	-	34,141,381	-	34,141,381
Pollution remediation obligation	62,240	-	-	62,240
Interest rate swap agreement - net	-	36,705	-	36,705
Revenue requirements payable to the Authority	9,829,264	-	(9,829,264)	-
Net pension liability	-	824	-	824
Net OPEB liability	-	2,024	-	2,024
Other long-term liability	18,048	3,225		21,273
Total long-term liabilities	9,909,552	34,184,159	(9,829,264)	34,264,447
Total liabilities	10,020,737	35,518,005	(9,829,264)	35,709,478
Deferred inflows of resources				
Unamortized deferred bond refunding costs	-	195,060	=	195,060
Deferred changes in net pension liability	-	36	_	36
Deferred changes in OPEB liability		846		846
Total deferred inflows of resources		195,942		195,942
Net position (deficit)				
Net investment in capital assets	33,555,582	(32,837,468)	_	718,114
Restricted for debt service	-	1,905,323	=	1,905,323
Restricted for operations and maintenance	322,235	-	_	322,235
Unrestricted (deficit) net position	(8,829,213)	7,777,289		(1,051,924)
Total net position (deficit)	25,048,604	(23,154,856)		1,893,748
Total liabilities, deferred inflows of resources				
and net position (deficit)	\$ 35,069,341	\$ 12,559,091	\$ (99,829,264)	\$ 37,799,168

COMBINING STATEMENTS OF REVENUES, EXPENSES AND CHANGES IN NET POSITION (DEFICIT)

For the year ended June 30, 2024

	New \		
	Water Board	Municipal Water Finance Authority	_ Total
	Water Board	(in thousands)	10141
Operating revenues		(
Water supply and distribution	\$ 1,594,989	\$ -	\$ 1,594,989
Sewer collection and treatment	2,536,031	-	2,536,031
Bad debt expense	(126,487)	-	(126,487)
Other operating revenues	257,188		257,188
Total operating revenues	4,261,721		4,261,721
Operating expenses			
Operations and maintenance	1,952,826	-	1,952,826
General and administrative	3,764	41,358	45,122
Other operating expenses	125,328	-	125,328
Depreciation and amortization	992,055		992,055
Total operating expenses	3,073,973	41,358	3,115,331
Operating income (loss)	1,187,748	(41,358)	1,146,390
Non operating revenues (expenses)			
Interest expense	-	(1,176,562)	(1,176,562)
Gain on defeasance	-	11,559	11,559
Cost of issuance	-	(24,277)	(24,277)
Net loss on retirement and impairment			
of capital assets	(8,270)	-	(8,270)
Subsidy income	-	145,355	145,355
Capital distributions	(51,263)	-	(51,263)
Investment income	35,269	136,912	172,181
NET INCOME (LOSS) BEFORE CAPITAL			
CONTRIBUTIONS	1,163,484	(948,372)	215,113
Capital contributions	25,147		25,147
CHANGE IN NET POSITION (DEFICIT)	1,188,631	(948,371)	240,260
NET POSITION (DEFICIT) - Beginning of year	25,048,604	(23,154,856)	1,893,748
NET POSITION (DEFICIT) - End of year	\$ 26,237,235	\$ (24,103,227)	\$ 2,134,008

COMBINING STATEMENTS OF REVENUES, EXPENSES AND CHANGES IN NET POSITION (DEFICIT)

For the year ended June 30, 2023

	New York City				
		_	Municipal Water	_	
	Water B	oard	Finance Authority		Total
	-		(in thousands)		
Operating revenues	_		,		
Water supply and distribution	\$ 1,58	32,456	\$ -	\$	1,582,456
Sewer collection and treatment		16,104	· -		2,516,104
Bad debt expense		98,632)	_		(98,632)
Other operating revenues		03,039			203,039
Total enerating revenues	4.20	12.067			4,202,967
Total operating revenues	4,20	02,967			4,202,907
Operating expenses					
Operations and maintenance	1,7	10,007	-		1,710,007
General and administrative		4,222	42,931		47,153
Other operating expenses	16	64,464	-		164,464
Depreciation and amortization		22,165			1,022,165
Total operating expenses	2,90	00,858	42,931		2,943,789
Operating income (loss)	1,30	02,109	(42,931)		1,259,178
Non operating revenues (expenses)					
Interest expense			(1,142,733)		(1,142,733)
Cost of issuance		-	(18,793)		(18,793)
Net loss on retirement and impairment			,		, , ,
of capital assets		(1,566)	_		(1,566)
Subsidy income		-	183,001		183,001
Capital distributions	(16	31,577)	· -		(161,577)
Investment income	,	31,089	64,918		96,007
NET INCOME (LOSS) BEFORE CAPITAL					
CONTRIBUTIONS	1 1-	70,055	(956,538)		010 517
CONTRIBUTIONS	1,17	70,055	(950,556)		213,517
Capital contributions		19,765			19,765
CHANGE IN NET POSITION (DEFICIT)	1,18	39,820	(956,538)		233,282
NET POSITION (DEFICIT) - Beginning of year	23,85	58,784	(22,198,318)		1,660,466
NET POSITION (DEFICIT) - End of year	\$ 25,04	18,604	\$ (23,154,856)	\$	1,893,748

COMBINING STATEMENT OF CASH FLOWS

For the year ended June 30, 2024

	New York City					
	Water Board		Municipal Water Finance Authority			Total
			(in thousands)			
Cash flows from operating activities:						
Receipts from customers	\$	4,160,707	\$	_	\$	4,160,707
Payments for operations and maintenance	·	(2,009,944)	·	_	·	(2,009,944)
Payments for administration		(5,526)		(42,062)		(47,588)
Net cash provided by (used in)						
operating activities		2,145,237		(42,062)		2,103,175
Cash flows from capital and related						
financing activities:						
Proceeds from issuing bonds, notes and other						
borrowings - net of issuance costs		_		4,347,679		4,347,679
Receipts from contribution made by other organization		292		-		292
Acquisition and construction of capital assets		_		(1,582,683)		(1,582,683)
Payments by (to) the Water Board to the Authority		(2,165,075)		2,165,075		-
Repayments of bonds, notes and other borrowings		-		(3,618,357)		(3,618,357)
Interest paid on bonds, notes and other borrowings				(1,323,433)		(1,323,433)
Net cash used in capital and						
related financial activities		(2,164,783)		(11,718)		(2,176,501)
Cash flows from investing activities:						
Sales and maturities of investments		512,744		46,558		559,302
Purchases of investments		(534,367)		(439,096)		(973,463)
Interest on investments		33,429		138,420		171,849
Net cash provided by (used in)						
investing activities		11,806		(254,118)		(242,312)
NET DECREASE IN RESTRICTED CASH AND CASH EQUIVALENTS		(7,741)		(307,898)		(315,638)
RESTRICTED CASH AND CASH EQUIVALENTS - Beginning of year		311,573		2,677,390		2,988,963
RESTRICTED CASH AND CASH EQUIVALENTS - End of year	\$	303,832	\$	2,369,492	\$	2,673,324

COMBINING STATEMENT OF CASH FLOWS - CONTINUED

For the year ended June 30, 2024

	New York City					
			icipal Water Finance Authority		Total	
			(in t	:housands)		
Reconciliation of operating income (loss) to net cash provided by (used in) operating activities:						
Operating income (loss)	\$	1,187,748	\$	(41,358)	\$	1,146,390
Adjustments to reconcile operating income (loss) to net				,		
cash provided by (used in) operating activities:						
Amortization		846		-		846
Depreciation		991,209		-		991,209
Other operating expenses						
paid for with bond proceeds		20,693		-		20,693
Pollution remediation expense		8,718		-		8,718
Changes in assets and liabilities:						
Pollution remediation liability		14,829		-		14,829
Receivables - net		(82,330)		-		(82,330)
Receivable from the City		707		-		707
Residual interest in sold liens		(5,575)		-		(5,575)
Accrued expenses payable		(6)		-		(6)
Accounts payable		(11,310)		(704)		(12,014)
Refunds payable		19,708				19,708
NET CASH PROVIDED BY (USED IN) OPERATING ACTIVITIES	\$	2,145,237	\$	(42,062)	\$	2,103,175

The following are the noncash capital and related financing activities (in thousands):

Interest expense includes the amortization of net (premium) and discount in the amount of \$211,784 at June 30, 2024.

Capital expenditures in the amount of \$583,042 had been incurred but not paid at June 30, 2024.

The Water Board received federal, state, and other capital contributions of \$25,147 in fiscal year 2024.

COMBINING STATEMENT OF CASH FLOWS

For the year ended June 30, 2023

	New York City				
	Water Board		Municipal Water Finance Authority		Total
			(in	thousands)	
Cash flows from operating activities:					
Receipts from customers	\$	4,055,246	\$	-	\$ 4,055,246
Payments for operations and maintenance		(1,723,858)		-	(1,723,858)
Payments for administration		(1,953)		(42,742)	(44,695)
Net cash provided by (used in)					
operating activities		2,329,435		(42,742)	 2,286,693
Cash flows from capital and related					
financing activities:					
Proceeds from issuing bonds, notes and other					
borrowings - net of issuance costs		-		4,109,026	4,109,026
Receipts from capital grants awarded to the governmental enterprise		-		33,105	33,105
Receipts from contribution made by other organization		292		-	292
Acquisition and construction of capital assets		-		(1,696,198)	(1,696,198)
Payments by the Water Board to the Authority		(2,323,645)		2,323,645	-
Repayments of bonds, notes and other borrowings		-		(3,221,177)	(3,221,177)
Interest paid on bonds, notes and other borrowings		<u> </u>		(1,207,510)	 (1,207,510)
Net cash provided by (used in) provided by capital and					
related financial activities		(2,323,353)		340,891	 (1,982,462)
Cash flows from investing activities:					
Sales and maturities of investments		137,500		207,767	345,267
Purchases of investments		(20,913)		75,557	54,644
Interest on investments		27,900		62,801	 90,701
Net cash provided by					
investing activities		144,487		346,125	 490,612
NET INCREASE IN RESTRICTED CASH AND CASH EQUIVALENTS		150,569		644,274	794,843
RESTRICTED CASH AND CASH EQUIVALENTS - Beginning of year		161,004		2,033,116	 2,194,120
RESTRICTED CASH AND CASH EQUIVALENTS - End of year	\$	311,573	\$	2,677,390	\$ 2,988,963

COMBINING STATEMENT OF CASH FLOWS - CONTINUED

For the year ended June 30, 2023

	New York City					
	Water Board		A	nicipal Water Finance Authority thousands)		Total
Reconciliation of operating income (loss) to net cash provided by (used in) operating activities:			(
Operating income (loss)	\$	1,302,109	\$	(42,931)	\$	1,259,178
Adjustments to reconcile operating income (loss) to net						
cash provided by (used in) operating activities:						
Amortization		840		-		840
Depreciation		1,021,325		-		1,021,325
Other operating expenses						
paid for with bond proceeds		40,617		-		40,617
Pollution remediation expense		13,310		-		13,310
Changes in assets and liabilities:						
Pollution remediation liability		10,562		-		10,562
Receivables - net		(84,670)		-		(84,670)
Receivable from the City		23,473		-		23,473
Residual interest in sold liens		(114)		-		(114)
Accrued expenses payable		6		-		6
Accounts payable		7,925		189		8,114
Refunds payable		(5,948)				(5,948)
NET CASH PROVIDED BY (USED IN) OPERATING ACTIVITIES	\$	2,329,435	\$	(42,742)	\$	2,286,693

The following are the noncash capital and related financing activities (in thousands):

Interest expense includes the amortization of net (premium) and discount in the amount of \$197,890 at June 30, 2023.

Capital expenditures in the amount of \$542,710 had been incurred but not paid at June 30, 2023.

The Water Board received federal, state, and other capital contributions of \$19,765 in fiscal year 2023.

NOTES TO COMBINING FINANCIAL STATEMENTS

June 30, 2024 and 2023

NOTE 1 - ORGANIZATION

The New York City Water and Sewer System (the "System") provides water supply, treatment and distribution, and sewage collection, treatment, and disposal for the citizenry of The City of New York (the "City"). The System, as presented in the accompanying combining financial statements, began operations on July 1, 1985, and is a joint operation consisting of two legally separate and independent entities: the New York City Municipal Water Finance Authority (the "Authority") and the New York City Water Board (the "Water Board"). The Authority is a public benefit corporation created in accordance with the New York City Municipal Water Finance Act (the "Act"), duly enacted into law as Chapter 513 of the laws of 1984 of the State of New York. The Water Board was created by Chapter 515 of the laws of 1984 of the State of New York. The Act also empowers the Authority to issue debt to finance the cost of capital improvements to the System and to refund any and all outstanding bonds and general obligation bonds that The City issued for water and sewer purposes. The Act empowers the Water Board to lease the System from The City and to set and collect water rates, fees, rents and other charges for use of, or for services furnished, rendered, or made available by, the System to generate enough revenue to pay debt service on the Authority's debt and to place the System on a self-sustaining basis.

The Financing Agreement by and among The City of New York, the New York City Municipal Water Finance Authority and the New York City Water Board dated as of July 1, 1985 provides that the Authority will issue bonds to finance the cost of capital investment and related costs of the System. It also sets forth the funding priority for debt service costs of the Authority, operating costs of the System, and the rental payment to The City, if requested.

The physical operation and capital improvements of the System are performed by The City's Department of Environmental Protection ("DEP") subject to contractual agreements with the Authority and the Water Board.

In accordance with Governmental Accounting Standards Board ("GASB") standards, the Water Board and the Authority are considered to be part of the same reporting entity (the "System") since they are fiscally interdependent. Accordingly, the accompanying combining financial statements for the System present the individual financial statements of the Water Board and the Authority as major funds. In addition, the accompanying combining financial statements present a total column, which represents the entity-wide financial statements of the System. Transactions and balances between the Water Board and the Authority are eliminated in the entity-wide combining financial statements.

NOTE 2 - SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

The accompanying financial statements of the System have been prepared using the economic resources measurement focus and the accrual basis of accounting. Revenues are recognized when earned and expenses are recognized when incurred. Other significant accounting policies are:

Component Unit

The System is a component unit of The City. The System leases the water and sewer-related capital assets from The City, which is responsible for the operations, maintenance and capital improvements of the System. The System reimburses The City for costs incurred for operations and maintenance and issues debt to pay for capital improvements.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Investments and Cash Equivalents

Investments and cash equivalents primarily consist of securities of the United States and its agencies, guaranteed investment contracts, forward purchase agreements, and the State of New York obligations. All investments are carried at fair value with the exception of money market funds that are carried at cost plus accrued interest. For purposes of the combining statement of cash flows and combining statement of net position (deficit), the System generally considers all highly liquid debt instruments purchased with an original maturity of three months or less to be cash equivalents.

Restricted Assets

Proceeds from the issuance of debt and monies set aside for debt service and operation and maintenance of the System are classified as restricted cash and cash equivalents and restricted investments in the combining statements of net position (deficit). These restrictions are based on the requirements of the applicable bond resolutions.

Lien Sales and Residual Interest in Sold Liens

The City periodically sells tax liens secured by water and sewer rents and surcharges, for which the Water Board receives the applicable sale proceeds. At the time of sale, the Water Board recognizes the proceeds as operating revenue and removes the related receivables. The Water Board maintains a residual interest in the liens, which represents the amount estimated to be received by the Water Board if and when liens held by the purchasing trusts generate cash flows above the amounts needed by the trusts to pay their operating costs, bondholders, and satisfy reserve requirements. As of June 30, 2024 and 2023, the Water Board had a receivable from the Tax Lien Trust of \$69.1 million and \$63.5 million, respectively.

Bond Premium and Discount and Bond Issuance Cost

Bond premiums and discounts are capitalized and amortized over the life of the related bond issue, using the effective yield method. Bond premiums and discounts are presented as additions or reductions to the face amount of the long-term bonds payable on the combining statement of net position (deficit). The amortized bond premiums and discounts are an off set to interest expense on the combining statement of revenues, expenses and changes in net position (deficit). Bond issuance costs are recognized and expensed in the period incurred, except for bond insurance premiums that are amortized over the life of the related bonds.

Utility Plant

Utility plant acquired through purchase or internal construction is recorded at cost, net of retirements. It is the Water Board's policy to capitalize assets with a cost of \$50,000 or more and a useful life of three years or longer. Contributed utility plant is recorded at its estimated historical cost based on appraisals or other methods when historical cost information is not available, net of accumulated depreciation. Depreciation is computed using the straight-line method based upon estimated useful lives, as follows:

Assets	Years
Buildings	40-50
Water supply and wastewater treatment systems	15-50
Water distribution and sewage collection systems	15-99
Machinery and equipment	3-35
Vehicles	10

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Maintenance and repairs of property are recorded as maintenance expense. Replacements and betterments are recorded as additions to utility plant. The System pays for certain improvements of assets that are not owned by The City or the System, as well as certain pollution remediation activities, through bond proceeds. These costs are reported as other operating expenses in the System's combining statement of revenues, expenses and changes in net position (deficit).

Contributed Capital

The System received federal, state and other capital contributions of \$25.1 million and \$19.8 million in fiscal years 2024 and 2023, respectively. These amounts are reported in the System's combining statements of revenues, expenses and changes in net position (deficit) as "Capital contributions" below net income (loss) before capital contributions. In addition, the System received \$292 thousand in both fiscal years 2024 and 2023, from Westchester County (the "County") to compensate the System for constructing a water conduit that provides treated water to the County. The County payments are reported as capital contributions in the System's combining statements of revenues, expenses and changes in net position (deficit) below net income (loss) before capital contributions and as receipts from contribution made by other organization in the System's combining statements of cash flows.

Operating Revenues and Operating Expenses

Operating revenues consist of services provided to customers of the System. Revenues are reported net of allowances, discounts and refunds and are based on billing rates imposed by the Water Board and upon customers' water and sewer usage or, in some cases, characteristics of customer properties. The System records unbilled revenue at year end based on meter readings collected as of June 30.

Operating expenses include, but are not limited to, costs incurred for maintenance, repair, and operations of the System; administration costs of the Water Board and the Authority; and rental payments to The City, if requested. In fiscal year 2023 no rental payment was requested by The City. In fiscal year 2024, The City requested and the System paid \$145 million which is included in operations and maintenance.

Revenues Received in Advance

Revenues received in advance of the period to which they relate are unearned and recorded as revenue when earned. Customer account credit balances are reported as a current liability "service credits on customer accounts" and are not included in accounts receivable.

Unamortized Deferred Bond Refunding Costs

Deferred bond refunding costs represent the accounting gains or losses incurred in bond refundings. They are reported as "unamortized deferred bond refunding costs" in "Deferred Inflows of Resources" and are amortized over the lesser of the remaining life of the old debt or the life of the new debt. The amortized deferred bond refunding cost is an off set to interest expense in the combining statement of revenues, expenses and changes in net position (deficit).

Use of Estimates

The preparation of the combining financial statements in accordance with accounting principles generally accepted in the United States of America, requires management to make estimates and assumptions in determining the amounts of assets, deferred outflows of resources, liabilities, deferred inflows of resources, and disclosure of contingent liabilities at the date of the combining financial statements and the reported amounts of revenues and expenses during the reporting period. Actual results could differ from those estimates.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Pensions

Net pension liabilities are required to be recognized and disclosed using the accrual basis of accounting. The Authority recognizes a net pension liability for New York City Employee Retirement System ("NYCERS") Qualified Pension Plan ("Pension Plan") in which it participates, which represents the Authority's proportional share of excess total pension liability over the Pension Plan assets, actuarially calculated, of a cost-sharing multiple-employer plan, measured as of the fiscal year end.

Changes in the net pension liability during the period are recorded as pension expense, or as deferred inflows of resources or deferred outflows of resources depending on the nature of the change, in the period incurred. Those changes in net pension liability that are recorded as deferred inflows of resources or deferred outflows of resources are amortized over the weighted-average remaining service life of all participants in the qualified Pension Plan and recorded as a component of pension expense beginning with the period in which they are incurred. The change in the Authority's proportion of the collective net pension liability and collective deferred outflows of resources and deferred inflows of resources related to the pension since the prior measurement date is recognized in the current reporting period over a closed period that is equal to the average of the expected remaining service lives of all employees provided with a pension through the Pension Plan.

For the contribution to the Pension Plan, the difference during the measurement period between the total amount of the Authority's contribution and the amount of the Authority's proportionate share of the total of such contributions from all employers and all nonemployee contributing entities is recognized in the Authority's pension expense, beginning in the current reporting period, over a closed period that is equal to the average of the expected remaining service lives of all employees provided with pension through the Pension Plan. The amount not recognized in pension expense is reported as deferred outflow of resources or deferred inflow of resources related to the pension.

Projected earnings on qualified Pension Plan investments are recognized as a component (reduction) of pension expense. Differences between projected and actual investment earnings are reported as deferred inflows of resources or deferred outflows of resources and amortized as a component of pension expense on a closed basis over a five-year period beginning with the period in which the difference occurred.

Changes in total pension liability arising from changes of benefit terms are required to be included in pension expense in the period the change is first reported in the net pension liability. The changes in the total pension liability resulting from (1) differences between expected and actual experience with regard to economic and demographic factors and (2) changes of assumptions regarding the expected future behavior of economic and demographic factors or other inputs are recognized as deferred outflows of resources or deferred inflows of resources related to the pension and included in the pension expense over a period equal to the average of the expected remaining service lives of all employees that are provided with benefits through the Pension Plan.

Recent Accounting Pronouncements

As a component unit of The City, the System implements new GASB standards in the same fiscal year as they are implemented by The City. The following are discussions of the standards requiring implementation in the current year and standards that may impact the System in future years.

• In June 2022, GASB issued Statement No. 100, Accounting Changes and Error Corrections-An Amendment to GASB Statement No. 62, ("GASB 100"). GASB 100 enhances accounting and financial reporting requirements for accounting changes and error corrections to provide more understandable, reliable, relevant, consistent, and comparable information for making decisions or assessing accountability. The requirements for GASB 100 are effective for accounting changes and error corrections made in fiscal years beginning after June 15, 2023, and all reporting periods

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

thereafter. Early application is encouraged. The adoption of GASB 100 did not have an immediate impact on the System's combining financial statements as there were no accounting changes or error corrections in the current fiscal year.

- In June 2022, GASB issued Statement No. 101, Compensated Absences ("GASB 101"). GASB 101 updates the recognition and measurement guidance for compensated absences and amends certain previously required disclosures. The requirements for GASB 101 are effective for fiscal years beginning after December 15, 2023, and all reporting periods thereafter. Early application is encouraged. The System has not completed the process of evaluating GASB 101.
- In December 2023, GASB issued Statement No. 102, Certain Risk Disclosures ("GASB 102"). GASB 102 improves financial reporting by requiring disclosures of certain concentrations or constraints and related events that have occurred or have begun to occur that make a government vulnerable to a substantial impact. The requirements for GASB 102 are effective for fiscal years beginning after June 15, 2024, and all reporting periods thereafter. Earlier application is encouraged. The System has not completed the process of evaluating GASB 102.
- In April 2024, GASB issued Statement No. 103, Financial Reporting Model Improvements ("GASB 103"). GASB 103 The requirements for GASB 103 are effective for fiscal years beginning after June 15, 2025, and all reporting periods thereafter. Earlier application is encouraged. The System has not completed the process of evaluating GASB 103 but expects it to have an impact on the presentation of the System's combining financial statements.

NOTE 3 - UTILITY PLANT

The following is a summary of utility plant activity for the fiscal years ended June 30, 2024 and 2023, respectively (in thousands):

	Balance at June 30, 2022	Additions	Deletions	Balance at June 30, 2023	Additions	Deletions	Balance at June 30, 2024
Nondepreciable assets: Utility construction in progress	\$621,271,077	\$ 1,519,724	\$ 909,061	\$ 6,881,740	\$ 1,567,196	\$ 1,294,834	\$ 7,154,102
Depreciable assets: Utility plant in service: Buildings Machinery and equipment Vehicles Water supply and distribution and wastewater treatment	35,821 5,549,134 287,885	- 82,271 1,889	956 12,118	35,821 5,630,449 277,656	121,370 9,282	1,599 112	35,821 5,750,220 286,826
and sewage collection systems	39,595,255	824,901	3,409	40,416,747	1,164,183	29,263	41,551,667
Total utility plant in service	45,468,095	909,061	16,483	46,360,673	1,294,835	30,974	47,624,534
Less accumulated depreciation for: Buildings Machinery and equipment Vehicles Water supply and distribution and	30,900 3,156,160 146,485	284 249,354 11,434	- 888 11,293	31,184 3,404,626 146,626	283 255,002 11,144	- 1,577 101	31,467 3,658,051 157,669
wastewater treatment and sewage collection systems	15,346,878	760,253	2,736	16,104,395	724,780	21,027	16,808,148
Total accumulated depreciation	18,680,423	1,021,325	14,917	19,686,831	991,209	22,705	20,655,335
Total utility plant in service - net	26,787,672	(112,264)	1,566	26,673,842	303,626	8,269	29,969,199
Total capital assets - net	\$ 33,058,749	\$ 1,407,460	\$ 910,627	\$ 35,555,582	\$ 1,870,822	\$ 1,303,103	\$ 34,123,301

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

NOTE 4 - DEPOSITS AND INVESTMENTS

Cash and Cash Equivalents

The System maintains deposits only at the depositary banks designated by the New York City Banking Commission. Further, as required by the Water and Sewer System General Revenue Bond Resolution and the Water and Sewer System Second General Revenue Bond Resolution (the "resolutions"), every bank that holds the Authority's cash deposits is required to have its principal office in the State of New York and have capital stock, surplus, and undivided earnings aggregating at least \$100 million. As of June 30, 2024 and 2023, cash was comprised of bank deposits and there was no difference between the carrying amounts and bank balances.

Restricted cash and cash equivalents were comprised of the following at June 30, 2024 and 2023, respectively (in thousands):

	2024		2023	
Restricted cash and cash equivalents: Cash Cash equivalents	\$	14,132 2,659,192	\$	12,492 2,976,471
Total restricted cash and cash equivalents	\$	2,673,324	\$	2,988,963

Custodial Credit Risk

Custodial credit risk is the risk that, in the event of the failure of the custodian, the System may not be able to recover the value of its deposits or collateral securities that are in the possession of an outside party. Deposits are exposed to custodial credit risk if they are not covered by depository insurance and the deposits are uncollateralized, collateralized with securities held by the pledging financial institution, or collateralized with securities held by the pledging financial institution's trust department or agent but not in the System's name. As of June 30, 2024 and 2023, the System had \$14.1 million and \$12.5 million of deposits, respectively. All deposits were either covered by federal depository insurance or collateralized with securities held by a third party custodian.

Investments

The System invests funds that are not immediately required for operations, debt service, or capital expenses. Funds held by the Authority are invested pursuant to the Authority's bond resolutions and in accordance with its investment guidelines, which restrict investments to obligations of, or guaranteed by, the United States of America, to certain highly rated obligations of the State of New York, to certain certificates of deposit and similar instruments issued by highly rated commercial banks, to certain highly rated corporate securities or commercial paper securities, to certain repurchase agreements with highly rated institutions, to certain highly rated money market funds, and to certain highly rated municipal obligations. All accounts held by the Water Board are invested in accordance with the Water Board's investment guidelines, which restrict investments to obligations of, or guaranteed by, the United States of America and to certain repurchase agreements with highly rated institutions.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

The System had the following restricted investments at June 30, 2024 and 2023 (in thousands):

	2024			2023			
Restricted investments	Water Board	Municipal Water Finance Authority	Total	Water Board	Municipal Water Finance Authority	Total	
U.S. Agencies securities U.S. Treasury securities New York State instrumentalities Money market funds Forward purchase agreements	\$ - 170,805 - 162,750	\$ - 1,010,886 17,265 1,734,062 3,626	\$ 1,181,691 17,265 1,896,812 3,626	\$ - 168,375 - 153,861 -	\$ 167,474 781,357 20,441 1,705,804 6,747	\$ 167,474 949,732 20,441 1,859,665 6,747	
Total investments including cash equivalents	333,555	2,765,839	3,099,394	322,236	2,681,823	3,004,059	
Less amounts reported as cash equivalents	(289,704) \$ 43,851	(2,369,488) \$ 396,351	(2,659,192) \$ 440,202	(299,245) \$ 22,991	(2,677,225) \$ 4,598	(2,976,470) \$ 27,589	
Total restricted investments	+ 10,001	+ + + + + + + + + + + + + + + + + + + 	Ţ : 10,202	Ţ	Ψ 1,000	Ţ <u></u>	

Fair Value Hierarchy

The System categorizes its fair value measurements within the fair value hierarchy established by generally accepted accounting principles. The hierarchy is based on the valuation inputs used to measure fair value of the assets. Level 1 inputs are quoted prices in an active market for identical assets; Level 2 inputs are significant other observable inputs; and Level 3 inputs are significant unobservable inputs.

The System has the following recurring fair value measurements as of June 30, 2024 and 2023:

- U.S. Agencies securities of \$0 and \$167 million, respectively, are valued using a matrix-pricing model (Level 2 inputs).
- U.S. Treasury securities of \$1.18 billion and \$950 million, respectively, are valued using a matrix-pricing model (Level 2 inputs).
- New York State instrumentalities of \$17.3 million and \$20.4 million, respectively, are valued using a matrix-pricing model (Level 2 inputs).
- Money Market Funds of \$1.90 billion and \$1.86 billion, respectively, are valued using a matrix-pricing model (Level 2 inputs).
- Forward Purchase Agreements of \$3.6 million and \$6.7 million, respectively, are valued using the market approach, with observable inputs and using a matrix pricing technique (Level 2 inputs).
- Interest Rate Derivatives of \$0 and \$(36.7) million, respectively, are valued using the income approach (Level 2 inputs).

Credit Risk

Both the Water Board and the Authority have Board of Directors approved investment guidelines and policies in place designed to protect principal by limiting credit risk. This is accomplished through ratings, collateral, and diversification requirements that vary according to the type of investment. Investments held by the System at June 30, 2024 and 2023 may include obligations of, or guaranteed by, the United States of America, the Federal Home Loan Mortgage Corporation, the Federal Home Loan Bank, the Federal National Mortgage Association, the Federal Agriculture Mortgage Corporation, and the Federal Farm Credit

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Bank. Also, held by the Authority, are direct obligations of agencies or public authorities of the State of New York, which at the time of purchase were rated in one of the two highest rating categories. In addition, the Authority has entered into investment agreements and a guaranteed investment contract with financial institutions whose long-term debt obligations, or whose obligations under such an investment agreement or guaranteed investment contract, are guaranteed by a financial institution whose senior long-term debt obligations were rated in one of the two highest rating categories for comparable types of obligations by each rating agency at the time such agreement or contract was entered into.

Interest Rate Risk

Changes in interest rates impact fair value of investments. Investments by the System are not expected to be liquidated prior to maturity and investment agreements are not expected to be terminated prior to their expiration dates, thereby limiting cash flow exposure from rising interest rates.

Segmented time distribution on investments and cash equivalents as of June 30, 2024 (in thousands):

	 Fair Value Amount
Maturity Date	
Under 6 months Over 6 months to 1 year Over 1 year to 3 years Over 3 years and beyond Over 3 years and beyond (Forward Purchase Agreement adj.) 1	\$ 3,076,618 8,582 2,586 7,982 3,626
Total	\$ 3,099,394

¹Includes the fair value of \$3.6 million related to Forward Purchase Agreements

Segmented time distribution on investments and cash equivalents as of June 30, 2023 (in thousands):

Maturity Date	 Fair Value Amount
Under 6 months Over 6 months to 1 year Over 1 year to 3 years Over 3 years and beyond Over 3 years and beyond (Forward Purchase Agreement adj.) 1	\$ 2,932,270 47,024 9,114 8,904 6,747
Total	\$ 3,004,059

¹Includes the fair value of \$6.7 million related to Forward Purchase Agreements

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Concentration of Credit Risk

Concentration of credit risk is the risk of loss attributed to the magnitude of the System's investment in a single issuer. The System's investment policy limits the amount the System may invest in any particular issuer. As of June 30, 2024, the System had 38% of its restricted investments invested in Federally Guaranteed Securities, 1% in Municipal Bonds, and 61% in First American Government Obligation Money Market Fund.

Custodial Credit Risk

With respect to investments, custodial credit risk is the risk that, in the event of the failure of the custodian, the System may not be able to recover the value of its investment or collateral securities that are in the possession of an outside party. Investment securities are exposed to custodial credit risk if the securities are uninsured, are not registered in the name of their government, and are held by either the counterparty or the counterparty's trust department or agent but not in the name of the government. None of the investments were registered in the System's name. The types and amounts of investments are listed in the table on page 34.

NOTE 5 - DERIVATIVE INSTRUMENTS

On April 23, 2024, the Authority terminated its two remaining derivatives. The Authority paid a combined \$19.3 million to terminate the \$401 million in outstanding fixed payor swaps. Prior to termination, the Authority was paying 3.439% and receiving 67% of SOFR plus 7.67 basis points. Terminating these swaps eliminated risk from and enabled the Authority to refund the underlying bonds for savings.

As of June 30, 2024, the Authority had no outstanding derivatives.

As of June 30, 2023, the Authority had the following (in thousands):

Туре	Notional Amount	Effective Date	Maturity Date	Terms	Fair Value	Counterparty Credit Rating (Moody's/S&P/Fitch)
Hedging derivatives						
Synthetic fixed rate	\$ 240,600	10/24/07	6/15/36	Pay 3.439% receive 67% of 1-month LIBOR	\$(22,025)	Aa2/AA-/NR
Synthetic fixed rate	160,400	10/24/07	6/15/36	Pay 3.439% receive 67% of 1-month LIBOR	(14,680)	Aa1/A+/AA
Totals	\$ 401,000			LIBOR	\$(36,705)	

LIBOR: London Interbank Offered Rate Index

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Hedging Derivative Instruments

Effective October 24, 2007, the Authority executed two interest rate exchange agreements, in conjunction with its sale of \$401 million of Adjustable Rate Fiscal 2008 Series BB Second Resolution Bonds. Under these agreements, the Authority initially paid fixed interest rate of 3.439% in exchange for a floating rate based on 67% of one-month LIBOR on the combined notional amount of \$401 million. The agreements are with two separate counterparties: one agreement with Goldman Sachs Mitsui Marine Derivative Products in the amount of \$241 million and the second agreement with Bank of America in the amount of \$160 million. These agreements allowed the Authority to achieve a fixed rate cost lower than the cost of conventional fixed rate debt at the time of issuance. The Authority's obligations under these interest rate exchange agreements are payable on a parity with the related Second Resolution revenue bonds.

LIBOR Discontinuation

On March 5, 2021, IBA and the Financial Conduct Authorities announced a LIBOR cessation date for most USD LIBOR tenors, including 1-month LIBOR, as of June 30, 2023.

The Authority amended its interest rate agreements by adhering to the Fallback Protocol published by the International Swaps and Derivatives Association on October 23, 2020, which provides a mechanism to incorporate the fallback rate equivalent to the sum of the Secured Overnight Financing Rate ("SOFR") and a spread adjustment of 11.448 basis points. As a result, when terminated, the derivatives had a floating rate of 67% of SOFR plus 7.67 basis points (67% of the fallback rate of SOFR plus 67% of 11.448 basis points), effective July 1, 2023.

Financial Statement Effect

The fair value of hedging derivatives at June 30, 2024 and 2023 was \$0 and \$(36.7) million, respectively. The Authority does not currently have investment derivatives.

NOTE 6 - AGREEMENT

The Water Board is a party to an Agreement of Lease (the "Agreement") with The City, which transfers the water and sewer related property to the Water Board for the term of the Agreement. The Agreement term commenced on July 1, 1985, and continues until the later of the fortieth anniversary of the commencement of the Agreement or the date on which all bonds, notes or other obligations of the Authority are paid in full or provision for such payment has been made pursuant to the applicable debt instrument. The Agreement provides for payments to The City to cover the following:

- a. An amount sufficient to pay the cost of administration, maintenance, repair, and operation of the Agreement property, which includes overhead costs incurred by The City that are attributable to the Agreement property, net of the amount of any federal, the State, or other operating grants received by The City; and
- b. An amount sufficient to reimburse The City for capital costs incurred by The City for the construction of capital improvements to the Agreement property that are not paid or reimbursed from any other source.

In addition to the payments described above, the Water Board pays rent to The City, if requested, each fiscal year in an amount not to exceed the greater of: (a) the principal and interest payable on general obligation bonds issued by The City for water and sewer purposes certified by The City to be paid within such fiscal year; or (b) 15% of principal and interest payable on the bonds of the Authority to be paid within such fiscal year. In fiscal year 2023, no rental payment was requested by The City. In fiscal year 2024, The City requested and the System paid \$145 million.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

A summary of operations and maintenance and rental expenses for the years ended June 30 is as follows (in thousands):

	 2024	 2023
Water supply, treatment, transmission and distribution Sewer collection and treatment systems The City agency support cost Fringe benefits Judgments and claims Reversal of prior year payables	\$ 626,951 810,179 69,979 317,274 11,970 (28,527)	\$ 589,560 763,091 68,618 277,243 13,306 (1,811)
Operation and maintenance	1,807,826	1,710,007
Rental payments to The City	 145,000	
Total operations and maintenance expenses	\$ 1,952,826	\$ 1,710,007

NOTE 7 - PAYABLE TO AND RECEIVABLE FROM THE CITY

As of June 30, 2024 and 2023, all utility construction and other projects financed by the Authority debt and recorded by the System, which have not been reimbursed to The City, are recorded as a payable to The City. The Authority had a payable to The City of \$583 million and \$543 million as of June 30, 2024 and 2023, respectively, net of the amount of state or federal and other capital grants recognized by The City.

As of June 30, 2024 and 2023, the Water Board had a receivable from The City of \$74.0 million and \$74.8 million, respectively. The receivable from The City is a result of the difference between budget estimates and actual expenses for operations and maintenance.

NOTE 8 - OTHER OPERATING EXPENSES

A summary of other operating expenses for the years ended June 30 is as follows (in thousands):

	 2024	 2023
Pollution remediation Payments for watershed improvements Program expense	\$ 23,547 20,692 81,089	\$ 23,872 38,553 102,039
Total other operating expenses	\$ 125,328	\$ 164,464

The City's DEP manages both the System's operations and its capital program, and it also manages other projects with long-term benefits to the System, which do not result in capital assets of the System and that are paid for using the Authority's bond proceeds. Such long-term benefit projects include payment for environmental protection, related improvement in the watershed areas, and pollution remediation projects throughout the System. The System has estimated these amounts based on the current value of outlays expected to be incurred for pollution remediation, which it is currently obligated to perform. Actual future outlays will differ from the estimated amounts if the prices or techniques for remediation measures change or differ from the estimates.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

In fiscal years 2024 and 2023, the System incurred program expenses of \$81.1 million and \$102 million, respectively.

The System offers its residential customers the option to enroll into a protection program on their water and sewer lines against any breakage for a monthly fee. The fee is included in the participating customer utility bill. This protection program is offered by American Water Resources.

The System also operates two core assistance programs available to eligible customers, the Home Water Assistance Program and the Multi-Family Water Assistance Program. Both programs were offered to customers in fiscal year 2023 and fiscal year 2024. In addition, from time to time the Board also offers one-time customer programs. During fiscal year 2023, the Board made a Water Bill Amnesty Program available to eligible customers, as well as programs benefiting certain affordable multi-family residential properties and accounts participating in the New York State Low Income Household Water Assistance Program.

NOTE 9 - LONG-TERM LIABILITIES

Debt Program Description

The Authority issues debt to finance the capital needs of the System. The Authority's debt is issued under two bond resolutions, the Water and Sewer System General Revenue Bond Resolution (the "First Resolution") and the Water and Sewer System Second General Revenue Bond Resolution ("the Second Resolution", each a "Resolution"). Bonds and notes issued by the Authority are special obligations of the Authority payable solely from and secured by a pledge of and lien on the gross revenues of the System, subject to the priorities set forth in each Resolution, and from money and securities in any of the funds and accounts defined and established under each Resolution, other than the arbitrage rebate fund, subject to the priorities set forth in each Resolution. The Water Board is obligated to set rates and collect revenues sufficient to fund principal and interest requirements, as well as to meet certain debt service coverage and operating cost funding requirements. Each Resolution specifies certain events of default, such as failure to pay debt service, the Authority's filing or otherwise seeking relief in bankruptcy court, failure to comply with the certain provisions of each respective Resolution and certain other governing documents, that under certain conditions could, upon the written request of the holders of not less than a majority in principal amount of the bonds outstanding under each Resolution, result in acceleration of debt service payments.

The debt program of the Authority includes commercial paper notes and long-term debt, as well as bond anticipation notes ("BANs") and interest-subsidized bonds issued to the New York State Environmental Facilities Corporation ("EFC"). In fiscal years 2024 and 2023, the Authority exclusively relied on proceeds from BANs and long-term bond issuances to reimburse The City for the System's capital expenditures. The Authority issues long-term debt to retire commercial paper notes and BANs. The Authority also periodically issues refunding bonds to refinance higher-coupon debt and defeases bonds using current revenues.

The Authority is currently authorized to have outstanding up to \$600 million of commercial paper notes. As of June 30, 2024 and 2023, none were outstanding. As of June 30, 2024 and 2023, there was \$11.0 million and \$180 million of BANs outstanding, respectively. As of June 30, 2024 and 2023, the BANs principal balance of \$172 million and \$354 million, respectively, was available for future draw down.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Changes in Long-Term Liabilities

In fiscal years 2024 and 2023, the long-term debt was as follows (in thousands):

Bonds/BANs payable	Balance at June 30, 2023	Additions	Deletions	Balance at June 30, 2024	Due Within One Year
First resolution bonds Second resolution bonds issued to the public Second resolution bonds issued to EFC Second resolution notes issued to EFC Second resolution bonds-direct placement	\$ 455,741 25,059,953 6,057,044 179,857 500,000	\$ - 2,845,060 759,946 331,423	\$ (50,000) (2,068,360) (845,307) (500,331) (150,000)	\$ 405,741 25,836,653 5,971,683 10,949 350,000	\$ 231,305 292,364 10,948
Total before premium and discounts	32,252,595	3,936,429	(3,613,998)	32,575,026	534,617
Premium (discounts) - net	2,614,187			2,724,741	
Total debt	\$ 34,866,782	\$ 3,936,429	\$ (3,613,998)	\$35,299,767	\$ 534,617
Bonds/BANs payable	Balance at June 30, 2022	Additions	Deletions	Balance at June 30, 2023	Due Within One Year
First resolution bonds Second resolution bonds issued to the public Second resolution bonds issued to EFC Second resolution notes issued to EFC Second resolution bonds-direct placement	\$ 789,871 24,285,718 5,865,444 101,126 500,000	\$ - 2,443,395 874,516 613,298	\$ (334,130) (1,669,160) (682,916) (534,567)	\$ 455,741 25,059,953 6,057,044 179,857 500,000	\$ - 250,515 295,030 179,857
Total before premium and					
discounts	31,542,159	3,931,209	(3,220,773)	32,252,595	725,401
	31,542,159 2,716,719	3,931,209 196,609	(3,220,773)	32,252,595 2,614,187	725,401

Debt Program Administration

In fiscal year 2024, the Authority issued \$2.85 billion of new money bonds to the public. The Authority used new money bond proceeds to finance capital improvements to the System and to pay for bond issuance costs. In addition, in fiscal year 2024, the Authority drew down \$331 million of BANs proceeds and applied them to finance capital improvements to the System.

During fiscal year 2024, as further detailed in the bullets below, the Authority issued \$2.06 billion of bonds to refund \$2.35 billion of outstanding bonds. These refunding transactions resulted in a cumulative accounting gain of \$117 million. The Authority reduced its aggregate debt service for principal and interest by \$198 million and obtained an economic benefit (present value savings) of \$224 million.

The following details the Authority's refunding activity in fiscal year 2024:

On October 5, 2023, NYW issued \$693 million of tax-exempt fixed rate Second Resolution bonds, Fiscal 2024 Series AA. \$504 million of proceeds from the sale funded capital projects of the System. The bonds also refunded the following Second Resolution fixed rate bonds: \$75.0 million of Fiscal 2020 Subseries BB-2, \$70.0 million of Fiscal 2019 Subseries DD-2, and \$32.9 million of Fiscal 2018 Subseries

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

CC-2. In addition, the bonds also refunded the following First Resolution variable rate bonds: \$50.0 million of Fiscal 2003 Subseries F-1B. The bonds have a final maturity of 2053.

On February 15, 2024, NYW issued \$42.6 million of fixed rate Second Resolution bonds, Fiscal 2024 Series 1 to the New York State Environmental Facilities Corporation ("EFC"). Proceeds of the bonds were used to pay off \$42.6 million of Fiscal 2022 Series 8-C Bond Anticipation Notes. The bonds have a final maturity of 2053.

On March 19, 2024, NYW issued \$1.36 billion of tax-exempt fixed rate Second Resolution bonds, Fiscal 2024 Series BB. \$225 million of proceeds from the sale funded capital projects of the System. The bonds also refunded the following Second Resolution fixed rate bonds: \$232 million of Fiscal 2014 Subseries CC-1, \$373 million of Fiscal 2014 Series DD, \$50.0 million of Fiscal 2015 Series AA, \$300 million of Fiscal 2015 Series DD, and \$382 million of Fiscal 2015 Series EE. The Bonds have a final maturity of 2054.

On April 2, 2024, NYW issued \$717 million of fixed rate Second Resolution bonds, Fiscal 2024 Series 3 to EFC. Proceeds of the bonds were used to refund \$149 million of Fiscal 2010 Series 4 and \$187 million of Fiscal 2014 Series 4. In addition, proceeds of the bonds were used to refinance \$274 million of Fiscal 2022 Series 8-C BAN and \$183 million of Fiscal 2024 Series 2 BAN with \$12.0 million of new money to be provided in future BAN draws. The bonds have a final maturity of 2053.

On April 23, 2024, NYW issued \$789 million of tax-exempt fixed rate Second Resolution bonds, Fiscal 2024 Series CC. \$426 million of proceeds from the sale funded capital projects of the System. The bonds also refunded \$401 million of Second Resolution variable rate Fiscal 2008 Series BB, and the following Second Resolution fixed rate bonds: \$8.8 million of Fiscal 2013 Series DD and \$43.3 million of Fiscal 2014 Series BB. The bonds have a final maturity of 2054. Concurrent with this transaction, the Authority used \$19.3 million of Authority cash to terminate its existing \$401 million in swaps associated with the 2008 Series BB bonds.

On June 13, 2024, NYW applied \$203 million to defease \$213 million in bonds from Fiscal 2017 Series 4, Fiscal 2017 Series 5, Fiscal 2018 Series 2, Fiscal 2019 Series 3, Fiscal 2020 Series 3, Fiscal 2020 Series 3, Fiscal 2020 Series 4, Fiscal 2020 Series 6, Fiscal 2020 Series 7, Fiscal 2021 Series 3, Fiscal 2022 Series 4, Fiscal 2022 Series 7, Fiscal 2023 Series 2, Fiscal 2023 Series 5, Fiscal 2023 Series 6, and Fiscal 2024 Series 1. The escrow for this in-substance defeasance will mature on June 15, 2028.

To provide new money funding, over the course of the fiscal year, NYW drew \$331 million on BANs issued to EFC. From time to time the Authority defeases some of its bonds by placing proceeds of refunding bonds or current revenue in irrevocable escrow accounts to provide for all future debt service payments on the defeased bonds. The escrow account assets and the liability for the defeased bonds are not included in the System's combining financial statements. As of June 30, 2024 and 2023, \$256 million and \$222 million, of the Authority's defeased bonds, respectively, were still outstanding.

Index Rate Bonds

As of June 30, 2024 and 2023, the Authority had outstanding \$350 million and \$500 million of index rate bonds respectively, which were purchased by banks through direct placement. The index rate bonds are adjustable rate bonds that pay interest based on a specified market index. The terms of the index rate bonds provide for a 9% rate of interest, commencing on an identified step-up date, if such bonds are not converted or refunded prior to such date. Interest rates on the Authority's index rate bonds cannot exceed 9%. In fiscal years 2024 and 2023, interest rates on the Authority's index rate bonds averaged 4.12% and 3.18%, respectively.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Adjustable Rate Demand Bonds

As of June 30, 2024 and 2023, the Authority had \$3.86 billion and \$4.16 billion of adjustable rate demand bonds ("VRDBs") outstanding, respectively. VRDBs may be tendered at the option of their holders prior to their maturity. VRDBs are remarketed by remarketing agents on a daily or weekly basis. Interest rates determined by such remarketing agents for such periods represent the lowest rate of interest that would cause the VRDBs to have a market value equal to par. VRDBs interest rates cannot exceed 9%. In fiscal years 2024 and 2023, interest rates on the Authority's variable rate demand bonds averaged 3.36% and 2.29%, respectively.

The VRDBs are backed by either a Standby Bond Purchase Agreement ("SBPA") or a Letter of Credit ("LOC"), providing for the purchase of the VRDBs by a bank in the event they cannot be remarketed. In such case, the interest rate on the VRDBs would typically increase and would be determined by reference to specified index rates plus a spread (in some cases, with a minimum rate), up to a maximum rate of 25%. No VRDBs were held by such banks during the fiscal years ended June 30, 2024 and 2023. SBPAs and LOCs may be terminated by the respective banks upon the occurrence of specified events of default. None of the SBPAs or LOCs supporting adjustable rate demand bonds provides for acceleration. However, in connection with such LOCs, the Authority has agreed that, following a specified period of time in which the LOC bank holds unremarketed VRDBs, the Authority will exchange such VRDBs for refunding bonds maturing within five years and providing for amortization during such period.

The Authority had the following adjustable variable rate demand bonds outstanding as of June 30, 2024:

Expiration or

				Expiration or
	,	Outstanding		Optional
Series		Outstanding ncipal Amount	SBPA or LOC Provider	Termination by Provider
Selles	FIII	ncipai Amount	SBPA OI LOC PIOVIDEI	Flovidei
2013 AA-1	\$	50,000,000	PNC Bank, N.A.	10/2/24
2003 F-2	*	101.655.000	Citibank, N.A.	10/25/24
2016 AA-2		100.000.000	PNC Bank, N.A.	10/25/24
2000-C		107,500,000	Sumitomo Mitsui Banking Corporation	5/2/25
2015 BB-2		100,000,000	Mizuho Bank, Ltd	6/13/25
2015 BB-1		100,000,000	Bank of America, N.A.	7/9/25
2014 AA-5		100,435,000	Mizuho Bank, Ltd	8/19/25
2014 AA-6		100,435,000	Mizuho Bank, Ltd	8/19/25
2023 BB-1		100,000,000	Mizuho Bank, Ltd	12/15/25
2023 BB-2		100,000,000	Mizuho Bank, Ltd	12/15/25
2021 EE-2		225,500,000	State Street Bank and Trust Company	3/6/26
2009 BB-1		100,435,000	UBS AG, Stamford Branch	5/4/26
2009 BB-2		100,435,000	UBS AG, Stamford Branch	5/4/26
2011 FF-2		100,000,000	JPMorgan Chase Bank, N.A.	5/27/26
2015 BB-4		100,000,000	Barclays Bank PLC	6/17/26
2007 CC-1		160,500,000	Sumitomo Mitsui Banking Corporation	9/14/26
2017 BB-3		39,500,000	Sumitomo Mitsui Banking Corporation	9/14/26
2014 AA-1		125,000,000	JPMorgan Chase Bank, N.A.	9/17/26
2014 AA-2		125,000,000	JPMorgan Chase Bank, N.A.	9/17/26
2017 BB-1A		100,000,000	State Street Bank and Trust Company	10/5/26
2017 BB-1B		100,000,000	State Street Bank and Trust Company	10/5/26
2016 AA-1		100,000,000	Bank of America, N.A.	10/27/26
2011 DD-2		75,000,000	JPMorgan Chase Bank, N.A.	11/12/26
2007 CC-2		50,000,000	State Street Bank and Trust Company	1/20/27
2014 AA-4		100,000,000	State Street Bank and Trust Company	1/20/27
2017 BB-2		50,000,000	State Street Bank and Trust Company	1/20/27
2011 FF-1		100,000,000	Bank of America, N.A.	3/15/27
2019 BB		100,000,000	TD Bank, N.A.	4/27/27

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Series	Outstanding Principal Amount	SBPA or LOC Provider	Expiration or Optional Termination by Provider
2011 DD-3A	50,000,000	US Bank, N.A.	9/30/27
2011 DD-3B	50,000,000	State Street Bank and Trust Company	9/30/27
2010 CC	200,000,000	State Street Bank and Trust Company	1/19/28
2023 CC	200,000,000	Barclays Bank PLC	2/16/28
2013 AA-2	150,000,000	Barclays Bank PLC	3/2/28
2011 DD-1	100,000,000	TD Bank, N.A.	4/21/28
2014 AA-3	100,000,000	TD Bank, N.A.	4/21/28
2015 BB-3	100,000,000	Sumitomo Mitsui Banking Corporation	7/7/28
2021 EE-1	100,000,000	US Bank, N.A.	8/21/28
	\$ 3,861,395,000		

The Authority had the following adjustable variable rate demand bonds outstanding as of June 30, 2023:

			Expiration or Optional
	Outstanding		Termination by
Series	Principal Amou	nt SBPA or LOC Provider	Provider
'-			
2000-C	\$ 107,500,0		5/2/25
2003 F-1-B	50,000,0	00 US Bank, N.A.	2/27/24
2003 F-2	101,655,0		10/25/24
2007 CC-1	160,500,0		9/14/26
2007 CC-2	50,000,0	00 State Street Bank and Trust Company	1/20/27
2008 BB-1	100,000,0	00 TD Bank, N.A.	3/2/28
2008 BB-2	101,000,0		10/20/23
2008 BB-5	50,000,0	00 Bank of America, N.A.	10/20/23
2009 BB-1	100,435,0		5/4/26
2009 BB-2	100,435,0		5/4/26
2010 CC	200,000,0		1/19/28
2011 DD-1	100,000,0		4/21/28
2011 DD-2	75,000,0	00 JPMorgan Chase Bank, N.A.	11/12/26
2011 DD-3A	50,000,0		9/30/27
2011 DD-3B	50,000,0		9/30/27
2011 FF-1	100,000,0		3/15/24
2011 FF-2	100,000,0	00 JPMorgan Chase Bank, N.A.	5/27/26
2013 AA-1	50,000,0		10/2/24
2013 AA-2	150,000,0		3/2/28
2014 AA-1	125,000,0		9/17/26
2014 AA-2	125,000,0	00 JPMorgan Chase Bank, N.A.	9/17/26
2014 AA-3	100,000,0	,	4/21/28
2014 AA-4	100,000,0		1/20/27
2014 AA-5	100,435,0		8/19/25
2014 AA-6	100,435,0	·	8/19/25
2015 BB-1	100,000,0		7/9/25
2015 BB-2	100,000,0		6/13/25
2015 BB-3	100,000,0		7/7/28
2015 BB-4	100,000,0		6/17/26
2016 AA-1	100,000,0		10/27/23
2016 AA-2	100,000,0		10/25/24
2017 BB-1A	100,000,0		10/5/26
2017 BB-1B	100,000,0	00 State Street Bank and Trust Company	10/5/26

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Series	Outstanding Principal Amount	SBPA or LOC Provider	Expiration or Optional Termination by Provider
2017 BB-2	50.000.000	State Street Bank and Trust Company	1/20/27
2017 BB-3	39,500,000	Sumitomo Mitsui Banking Corporation	9/14/26
2019 BB	100,000,000	TD Bank, N.A.	4/27/27
2021 EE-1	100,000,000	US Bank, N.A.	3/6/24
2021 EE-2	225,500,000	State Street Bank and Trust Company	3/6/26
2023 BB-1	100,000,000	Mizuho Bank, Ltd.	12/15/25
2023 BB-2	100,000,000	Mizuho Bank, Ltd.	12/15/25
2023 CC	200,000,000	Barclays Bank PLC	2/16/28
	\$ 4,162,395,000		

Adjustable Rate Remarketed SecuritiesSM

As of both June 30, 2024 and 2023, the Authority had outstanding \$100 million of Adjustable Rate Remarketed SecuritiesSM. The Authority's Adjustable Rate Remarketed SecuritiesSM are adjustable rate bonds not supported by a credit or liquidity facility. Upon any failure to remarket tendered Adjustable Rate Remarketed SecuritiesSM, if not purchased by the Authority, will continue to be held by the tendering holders, and all of the Adjustable Rate Remarketed SecuritiesSM of the applicable series will bear interest at an increased rate of interest of 12%. In fiscal years 2024 and 2023, interest rates on the Authority's Adjustable Rate Remarketed SecuritiesSM averaged 3.71% and 2.77%, respectively.

Debt service requirements to maturity, including amounts relating to BANs with maturities greater than one year at June 30, 2024 are as follows (in thousands):

	Bo	nds	Borrowings and [Borrowings and Direct Placements		
	Principal	Interest ¹	Principal	Interest ¹	Total	
Year ending June 30	<u> </u>					
2025	\$ 231,305,000	\$ 1,190,545,595	\$ 303,312,461	\$ 266,675,135	\$ 1,991,838,191	
2026	430,555,000	1,179,455,695	243,640,000	247,081,257	2,100,731,952	
2027	489,545,000	1,158,456,545	229,170,000	235,750,804	2,112,922,349	
2028	545,140,000	1,134,849,076	250,330,000	224,775,280	2,155,094,356	
2029	485,085,000	1,107,869,776	316,680,000	213,458,282	2,123,093,058	
2030-2034	2,800,845,000	5,167,270,496	1,403,425,000	881,827,916	10,253,368,412	
2035-2039	4,150,350,000	4,372,053,422	1,116,625,000	621,427,775	10,260,456,197	
2040-2044	5,967,615,000	3,230,290,901	1,045,880,000	414,841,212	10,658,627,113	
2045-2049	7,606,095,000	1,738,882,557	876,494,000	209,384,073	10,430,855,630	
2050-2054	3,535,860,000	431,213,592	547,075,193	50,126,517	4,564,275,302	
Total	\$ 26,242,395,000	\$ 20,710,887,655	\$ 6,332,631,654	\$ 3,365,348,251	\$56,651,262,560	

¹Projected interest expense for adjustable rate demand bonds and adjustable rate remarketed securities for fiscal year 2024 and thereafter is calculated using weighted-average interest rate as of June 30, 2024 of 3.36%. Projected interest expense for direct placement index rate bonds for fiscal year 2025 and thereafter is calculated using weighted-average interest rate as of June 30, 2024 of 4.12%. Interest rates on adjustable rate bonds are determined on a daily or weekly basis in accordance with the terms of such bonds.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Asset Retirement Obligations ("ARO")

Existing laws and regulations require the System to take specific action when retiring chemical and petroleum storage tanks. The System has 445 above and underground tanks with a capacity ranging from 10 to 100,000 gallons. The New York State Department of Conservation Under Title 6 of the New York Codes, Rules and Regulations requires that the System take specific steps to permanently take out the service including the removal, transportation and disposal of liquid, sludge, hazardous waste, piping and the tanks themselves; and to take remedial actions on the area surrounding the tanks. Based on contract estimates and invoice for similar projects, the System's ARO for storage tanks was \$15.5 million and \$15.1 million as of June 30, 2024 and 2023, respectively, with tanks having a remaining useful life ranging from 0 to 39 years.

DEP has entered into office space lease agreements requiring the removal of affixed furnishings including condensed filing systems, HVAC units, and distributions systems and the restoration of premises to original condition existing prior to installation of fixtures for which the System is responsible for paying. Based on engineer and architectural estimates, the ARO for leases was \$2.9 million as of both June 30, 2024 and 2023. The remaining lease terms range from two to three years.

Commitments and Contingencies

Construction – The System had contractual commitments of approximately \$7.71 billion and \$6.78 billion at June 30, 2024 and 2023, respectively, for water and sewer projects.

Risk Financing Activities – The System is self-insured and carries no commercial or insurance policies other than directors and officer's insurance for the Authority. Any claims made against the System are resolved through The City's legal support, and the amounts of the maximum liability for such judgments are described in the claims and litigation section below. The System is subject to claims for construction delays, property damage, personal injury, and judgments related to delays in construction deadlines under consent agreements.

Claims and Litigation - In accordance with the Agreement, the Water Board is required to reimburse The City for any judgment or settlement paid by The City arising out of a tort claim to the extent that The City's liability is related to capital improvements and the operation or maintenance of the System. However, in no event shall the payment made to The City, in any fiscal year, exceed an amount equal to 5% of the aggregate revenues shown on the prior year's audited combining financial statements of the System. In addition, the System is required to reimburse The City, to the extent requested by The City, for the payment of any judgment or settlement arising out of a contract claim with respect to the construction of capital improvements of the System. In addition, The City has agreed, subject to certain conditions, to indemnify the Authority, the Water Board, and their staffs against any and all liability in connection with any act done or omitted in the exercise of their powers, which is taken or omitted in good faith in pursuance of their purposes under the Act. Currently, The City is a defendant in a significant number of lawsuits pertaining to the System. The litigation includes, but is not limited to, actions commenced and claims asserted against The City arising out of alleged torts, alleged breaches of contract, condemnation proceedings, and other alleged violations of law. As of June 30, 2024, the potential future liability attributable to the System for claims outstanding against The City was estimated to be \$144 million. This amount is included in the estimated liability for unsettled claims, which is reported in The City's statement of net position (deficit). The potential future liability is The City's best estimate based on available information. The estimate may be revised as further information is obtained and as pending cases are litigated.

Arbitrage Rebate – To maintain the exemption from federal income tax of interest on bonds issued subsequent to January 1, 1986, the System will fund amounts required to be rebated to the Federal Government pursuant to Section 148 of the IRC of 1986, as amended (the "Code"). The Code requires the payment to the United States Treasury of the excess amount earned on all non-purpose obligations over

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

the amount that would have been earned if the gross proceeds of the issue were invested at a rate equal to the yield on the issue, together with any earnings attributable to such excess. Construction funds, debt service funds, or any other funds or accounts funded with proceeds of such bonds, including earnings, or pledged to or expected to be used to pay interest on such bonds are subject to this requirement. Payment is to be made after the end of the fifth bond year and after every fifth bond year thereafter and within 60 days after retirement of the bonds. During fiscal years 2024 and 2023, the System paid \$428 thousand and \$1.2 million, respectively, in arbitrage rebates. At June 30, 2024 and 2023, the Authority had a liability of \$1 million and \$3.2 million, respectively. These amounts are included in accounts payable in the combining statements of net position (deficit).

NOTE 10 - RESTRICTED ASSETS

As of June 30, 2024 and 2023, certain cash, investments, and accrued interest of the System were restricted as follows (in thousands):

The Water Board	2024	. <u></u>	2023
Operation and maintenance reserve fund Local water fund WB expense fund	\$ 333,555 14,118 10	\$	322,236 12,318 10
Subtotal - The Water Board	347,683		334,564
The Authority			
Revenue fund Debt service reserve fund Construction fund Arbitrage rebate fund Escrow accounts	1,830,490 172,110 763,233 10		1,721,502 241,185 674,204 37 45,060
Subtotal - The Authority	2,765,843		2,681,988
Total restricted assets	\$ 3,113,526	\$	3,016,552

The operation and maintenance reserve fund is established as a depository to hold a reserve as required by the First Resolution. As of June 30 of each year, the reserve fund is required to hold one-sixth of the operating expenses as set forth in the following year's annual budget. It is funded through the cash receipts of the Water Board.

The local water fund is established as the account to which all revenues are deposited. Its assets are subject to the payment priority set forth in the Resolutions.

The revenue fund is established as a depository to fund the debt service, the Authority's expenses, debt service reserve, and escrow accounts. It is funded through cash transfers from the Water Board.

The debt service reserve fund is established as a depository to hold the First Resolution bond maximum annual debt service requirement for the next or any future fiscal year. It is funded through revenue bond proceeds and the revenue fund.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

The debt service fund is established as a depository to pay all principal and interest payments on the Authority's debt for the current fiscal year. It is funded through the revenue fund. On or prior to June 30, the balances in the debt service fund are transferred to the revenue fund.

The construction fund is established as a depository to pay all capital construction costs incurred by The City and reimbursed by the Authority. It is funded through the proceeds of commercial paper, bond, and note sales.

The escrow accounts are established as a depository to refund debt in future years. It is funded through bond proceeds or the revenue fund.

NOTE 11 - PENSION PLANS

General information about the Pension Plan

Plan Description – The Authority's eligible employees are provided with pension benefits through the New York City Employee Retirement System ("NYCERS") Qualified Pension Plan ("QPP" or "Pension Plan"). The Pension Plan is a cost-sharing, multiple-employer defined benefit pension plan administered by NYCERS.

The Pension Plan functions in accordance with existing State statutes and City laws that are the basis by which benefit terms and the Authority's and its members' contribution requirements are established and amended. NYCERS issues a publicly available financial report that can be obtained from NYCERS management at 335 Adams Street, Brooklyn, New York 11201 or at www.nycers.org.

Benefits Provided – The Pension Plan provides pension benefits to retired employees generally based on the salary, length of service, and membership tier ("Tier"). For certain members, voluntary member contributions also impact pension benefits provided. In addition, the Pension Plan provides automatic cost-of-living-adjustments and other supplemental pension benefits to certain retirees and beneficiaries. Subject to certain conditions, members become fully vested as to benefits upon the completion of five years of service. Upon termination of employment before retirement, certain members are entitled to refunds of their own contributions, including accumulated interest, less any outstanding loan balances. In the event of disability during employment, participants may receive retirement allowances based on satisfaction of certain service requirements and other provisions. The Pension Plan also provides death benefits.

The State Constitution provides that pension rights of public employees are contractual and shall not be diminished or impaired. In 1973, 1976, 1983, and 2012, significant amendments made to the State Retirement and Social Security Law modified certain benefits for employees joining the Pension Plan on or after the effective date of such amendments, creating membership tiers. Currently, there are several Tiers, referred to as Tier I, Tier II, Tier IV, and Tier VI. Members are assigned a Tier based on membership date. Chapter 18 of the Laws of 2012 (Chapter 18/12) amended the retirement benefits of public employees who establish membership in the Pension Plan on or after April 1, 2012. Chapter 18/12 is commonly referred to as Tier VI. Tier VI is expected to reduce future employer pension contributions.

Certain members of Tier I and Tier II of the NYCERS QPP have the right to make voluntary excess contributions, which are supplemental voluntary contributions. Members can elect to direct these contributions to an investment program under which such accumulated contributions are credited with interest at rates set by statute. The Authority does not have any Tier I, Tier II, or Tier III members.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Contributions and Funding Policy – Contribution requirements of participating employers and active members are determined in accordance with State statutes and City laws and are generally funded within the appropriate fiscal year. Employer contributions are actuarially determined under the One-Year Lag Methodology ("OYLM"). Under the OYLM, the actuarial valuation date is used for calculating the employer contributions for the second following fiscal year. For example, the June 30, 2022 actuarial valuation was used for determining the fiscal year 2024 employer contributions.

Employer contributions are determined annually to be an amount that, together with member contributions and investment income, provides for the Pension Plan assets to be sufficient to pay benefits when due. The aggregate statutory contribution due to NYCERS QPP from all participating employers for fiscal years 2024 and 2023 was \$3.57 billion and \$3.46 billion, respectively, and the amount of the Authority's contribution to the Pension Plan for such fiscal years 2024 and 2023 was \$128 thousand and \$160 thousand, respectively.

In general, Tier III and Tier IV members make basic contributions of 3.0% of salary regardless of age at membership. Effective October 1, 2000, in accordance with Chapter 126 of the Laws of 2000, Tier III and Tier IV members are not required to make any contributions after the 10th anniversary of their membership date or completion of 10 years of credited service, whichever is earlier. Tier VI members who joined between April 1, 2012 and March 31, 2013 contribute 3% of salary. Beginning April 1, 2013, when Tier VI took effect, joining members contribute between 3.0% and 6.0% of salary, depending on their salary level.

Information on the Employer's Proportionate Share of the Collective Net Pension Liability

The Authority's net pension liabilities reported as of June 30, 2024 and 2023 were measured as of those fiscal year-end dates. The total pension liability used to calculate those net pension liabilities were determined by actuarial valuations as of June 30, 2023 and 2022 and rolled forward to the measurement dates of June 30, 2024 and 2023.

Information about the Authority net position and additions to and deductions from NYCERS QPP fiduciary net position has been determined on the same basis as that reported by NYCERS QPP. For this purpose, benefits and refunds are recognized when due and payable in accordance with the terms of the respective qualified pension plan, and investments are reported at fair value.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Actuarial Assumptions

Measurement of the total pension liability, on which the net pension liability is based, requires the use of assumptions about numerous future events that affect the benefit payments that will be made to employees in retirement. The following table provides a brief description of the significant assumptions used in the June 30, 2023 actuarial valuation to determine the fiscal year 2024 total pension liability:

Item	Assumption
Valuation Date	June 30, 2023 (Lag)
Assumed Rate of Return on Investment	7.0% per annum, net of investment expenses
Post-Retirement Mortality	Tables adopted by the Board of Trustees during fiscal year 2019. Applies mortality improvement scale MP-2020 published by the Society of Actuaries
Active Service: Withdrawal, Death, Disability, and Retirement	Tables adopted by the Board of Trustees during fiscal year 2019. Applies mortality improvement scale MP-2020 published by the Society of Actuaries to active ordinary death mortality rates and pre-commencement mortality rates for deferred vesteds
Salary Increases	Tables adopted by the Board of Trustees during fiscal year 2019. In general, Merit and Promotion Increases plus assumed General Wage increases of 3.0% per year
Inflation	Consumer Price Index (CPI) of 2.50% per year
Assumed Cost-of Living Adjustments	AutoCOLA – 1.5% per year; Escalation – 2.5% per year
Estimates of Certain Obligations	World Trade Center benefits and anticipated increases to pensioner benefits attributable to wage contract settlements

In accordance with the Administrative Code of The City of New York and with appropriate practice, the NYCERS Board of Trustees of the actuarially-funded Pension Plan is to periodically review and adopt certain actuarial assumptions as proposed by the Chief Actuary of the New York City Retirement Systems (the "Actuary") for use in the determination of Employer Contributions, which are also generally used to determine the total pension liability, as applicable.

In June 2019, Bolton, Inc. issued their actuarial experience study report for the four-year and ten-year periods ended June 30, 2017. Based, in part, on this report, the Actuary proposed and the Boards of Trustees of NYCERS adopted changes in actuarial assumptions including a change to Mortality Improvement Scale MP-2018 beginning in fiscal year 2019. Milliman, Inc. is performing the current experience study that covers the period through June 30, 2021.

In July 2021, the Actuary proposed and the Board of Trustees of NYCERS adopted changes in actuarial assumptions including a change to Mortality Improvement Scale MP-2020 beginning in fiscal year 2021.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Expected Rate of Return

The long-term expected rate of return was determined using a building-block method in which best-estimate ranges of expected future real rates of return (expected returns, net of the Pension Plan investment expense and inflation) are developed for each major asset class. These ranges are combined to produce the long-term expected rate of return by weighting the expected real rates of return by the target asset allocation percentage and by adding expected inflation.

The target allocation and best estimates of arithmetic real rates of return for each major asset class are summarized in the following table:

	Target Asset Allocation	Long-Term Expected Real Rate of Return
Asset class		
U.S. public market equities	23.5%	6.8%
Developed public market equities	11.6	7.2
Emerging public market equities	4.9	8.6
Fixed income	31.5	3.3
Private equities	10.0	11.6
Private real estate	8.0	7.0
Infrastructure	4.5	6.3
Opportunistic fixed income	6.5	8.5
Total	100.0%	

Discount Rate

The discount rate used to measure the total pension liability of the Pension Plan as of June 30, 2024 and 2023, was 7.0% per annum. The projection of cash flows used to determine the discount rate assumed that employee contributions will be made at the rates applicable to the current Tier for each member and that employer contributions will be made based on rates determined by the Actuary. Based on those assumptions, the Pension Plan fiduciary net position is projected to be available to make all projected future benefit payments of current active and non-active members. Therefore, the long-term expected rate of return on the pension fund investments was applied to all periods of projected benefit payments to determine the total pension liability.

Sensitivity of the Authority's Proportionate Share of the Net Pension Liability to Changes in the Discount Rate

The following table presents the Authority's proportionate share of the net pension liability using the discount rate of 7.0% for fiscal years 2024 and 2023, as well as what the Authority's proportionate share of the net pension liability would be if it were calculated using a discount rate that is one-percentage point lower (6.0%) or one-percentage point higher (8.0%) than the current rate:

June 30, 2024						Jun	e 30, 2023				
Current							Current				
1% Decrease Discount Rate (6.0%) (7.0%)				19	1% Decrease Discount Rate (6.0%) (7.0%)			19	% Increase (8.0%)		
\$	998,287	\$	587,898	\$	241,239	\$	1,335,044	\$	823,884	\$	392,466

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Pension Liability

At June 30, 2024 and 2023, the Authority reported a liability of \$0.6 million and \$0.8 million, respectively, for its proportionate share of the net pension liability. The Authority's portion of the net pension liability was based on projection of the Authority's long-term share of contributions to the Pension Plan relative to the projected contributions of all participating City governments and their component units, actuarially determined. At June 30, 2024 and 2023, the Authority's proportion was 0.004% and 0.005%, respectively.

Pension Expense

For the years ended June 30, 2024 and 2023, the Authority recognized pension expense of \$161 thousand and \$176 thousand, respectively.

Deferred Outflows and Inflows of Resources

At June 30, 2024 and 2023, the Authority reported total deferred outflows of resources and deferred inflows of resources related to pensions from the following sources:

		Fiscal Year 2024				Fiscal Year 2023			
	D	eferred	Deferred		Deferred		Deferred		
	Οu	ıtflows of	Ir	Inflows of		utflows of	Inflows of		
	Re	esources	Resources		Resources		Resources		
Difference between expected									
and actual experience	\$	1,836	\$	82,870	\$	92,693	\$	3,670	
Changes of assumptions		5,226		-		1		16,747	
Net difference between projected and actual earnings									
on pension plan investments		-		7,667		102,709		-	
Changes in proportion and difference between the Authority's contributions and proportionate share of									
contributions		(29,715)		(6,299)		216,416		15,140	
Total	\$	(22,653)	\$	84,238	\$	411,819	\$	35,557	

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Amounts reported as deferred outflows of resources and deferred inflows of resources related to pensions at June 30, 2024 will be recognized in pension expense as follows:

Fiscal Year Ended June 30				iscal Year 2023
2024	\$	_	\$	92,886
2025		54,408		89,913
2026		150,301		211,909
2027		(45,369)		(10,214)
2028		(43,382)		(8,232)
2029		(8,995)		-

NOTE 12 - OTHER POST-EMPLOYMENT BENEFITS

Plan Description

The Authority's Other Postemployment Benefits Plan ("OPEB Plan") is a single-employer defined benefit plan administered by the New York City Office of Labor Relations. The plan provides certain health and related benefits to eligible retirees and their beneficiaries/dependents of the New York City Municipal Water Finance Authority in accordance with GASB Statement No. 75 ("GASB 75") Accounting and Financial Reporting for Postemployment Benefits Other Than Pensions.

The OPEB Plan consists of three programs: (1) the New York City Health Benefits Program; (2) Welfare Fund Program; and (3) Medicare Part B Program. The Authority's policy is to follow the eligibility criteria applicable to retirees of The City and to provide benefits substantially the same as those provided to The City retirees and eligible beneficiaries/dependents.

The following presents a summary of the Authority's census data used in the June 30, 2024 and 2023 OPEB actuarial valuations:

Group	2024	2023
Active	9	10
Inactive plan members entitled to but not yet receiving benefits Inactive plan members or beneficiaries currently receiving	3	2
benefits	7	5
Total	19	17

Funding Policy

The Authority is not required to provide funding for the OPEB Plan, other than the pay-as-you-go amount necessary to provide current benefits to retirees and eligible beneficiaries/dependents. For the years ended June 30, 2024 and 2023, the Authority had seven retirees and made contributions of \$108 thousand and \$71 thousand, respectively. Members are not required to contribute; although, retirees may elect basic health insurance programs and/or optional coverage that requires contributions. Plan retiree participants who opt for other basic or enhanced coverage must contribute 100% of the incremental costs above the premiums for the benchmark plan. The OPEB Plan also reimburses covered retirees and eligible spouse 100% of the Medicare Part B premium rate applicable to a given year, and there is no retiree contribution to the welfare fund (the "Welfare Fund") that covers retirees for various health care benefits not provided through the basic coverage.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Annual OPEB Cost and Net OPEB Liability

The Authority's annual OPEB cost is calculated based on the annual expense ("Expense"), an amount that was actuarially determined in accordance with GASB 75. Actuarial valuations involve estimates and assumptions about the probability of events far into the future. The entry age actuarial cost method was used in the actuarial valuation prepared as of June 30, 2022 for the fiscal year ended June 30, 2023, which was the basis for the fiscal year 2023 Expense calculation. Under this method, as used in this OPEB Plan valuation, the actuarial present value ("APV") of benefits ("APVB") of each individual included in the actuarial valuation is allocated on a level basis over the earnings of the individual between entry age and assumed exit age(s). The employer portion of this APVB allocated to the valuation year is the employer normal cost. The portion of this APVB that is not provided for on the valuation date by the APV of future employer normal cost or future member contributions is the total OPEB Plan liability. The excess of the total OPEB Plan liability over the plan fiduciary net position, which represents the assets of the plan, is the net OPEB Plan liability.

All changes in the net OPEB Plan liability as of June 30, 2024 and 2023 are being amortized over the future working lifetime of all plan participants for purposes of calculating the expense except for the amount of change in plan assets, which would be amortized over a five-year period using level-dollar amortization. This plan, however, is not assumed to have any assets.

Total OPEB Liability

The Authority's total OPEB Plan liabilities of \$3.1 million and \$2.0 million were measured as of June 30, 2024 and 2023, respectively, and were determined by actuarial valuations as of those dates.

The following table shows changes in the Authority's net OPEB Plan liability for fiscal years 2024 and 2023:

Components	 2024	 2023
Net OPEB liability – beginning of the year Service cost Interest Differences between expected and actual experience Changes in assumptions or other inputs Actual benefit payments	\$ 2,024,102 68,554 84,212 1,043,358 (14,958) (108,326)	\$ 1,770,915 70,742 73,891 112,539 66,800 (70,785)
Net changes	 1,072,840	 253,187
Net OPEB liability – end of the year	\$ 3,096,942	\$ 2,024,102

The Authority's annual OPEB Plan expense for fiscal years 2024 and 2023 was as follows:

Components	 2024	 2023
Service costs Interest on the total OPEB Plan liability Changes in assumptions or other inputs Difference between expected and actual experience	\$ 68,554 84,212 233,970 (131,273)	\$ 70,742 73,891 (129,096) 82,098
Total OPEB plan expense	\$ 255,463	\$ 97,635

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Funded Status and Funding Progress

As of June 30, 2024, the most recent actuarial measurement date, the cost was 0% funded. The total OPEB Plan liability for benefits was \$3.1 million, and the plan fiduciary net position was \$0, resulting in a net OPEB Plan liability of \$3.1 million. The covered employee payroll (annual payroll of active employees covered by the OPEB Plan) was \$1.2 million, and the ratio of the net OPEB Plan liability to the covered employee payroll was 252.2%.

Actuarial Methods Assumptions and Other Inputs

Actuarial valuations of an ongoing plan involve estimates of the value of reported amounts and assumptions about the probability of occurrence of events far into the future, such as assumptions about future employment, demographic, salary increase, mortality, and the healthcare cost trend. The actuarial assumptions used in the fiscal year 2024 and the fiscal year 2023 OPEB Plan valuations are a combination of those used in the NYCERS pension actuarial valuations and those specific to the OPEB Plan valuations. These assumptions are generally unchanged from the previous valuation except as noted below.

Amounts determined regarding the funded status of the OPEB Plan and the annual Expense of the Authority are subject to continual revision as actual results are compared with past expectations and new estimates are made about the future. Projections of benefits for financial reporting purposes are based on the types of benefits provided at the time of each valuation and the historical pattern of the sharing of benefit costs between the employer and employees to that point. The actuarial methods and assumptions used include techniques that are designed to reduce short-term volatility in total OPEB Plan liability, consistent with the long-term perspective of the calculations.

For fiscal year 2019, the Office of the Actuary (the "OA") conducted a full review of the actuarial assumptions and methods used to fund the NYCRS. These reviews led to formalized recommendations titled "Proposed Changes in Actuarial Assumptions and Methods Used in Determining Employer Contributions for Fiscal Years Beginning on and After July 1, 2018 for [NYCRS]," also referred to as the 2019 Assumptions and Methods ("2019 A&M") and were adopted by all five of the NYCRS Boards.

On July 27, 2021, the actuary issued a memorandum titled "Proposed Changes to Actuarial Assumptions and Methods." The actuarial assumptions and methods described in that memorandum amend certain assumptions and methods from the 2019 A&M. This revised set of actuarial assumptions and methods are referred to as the "Revised 2021 A&M."

The 2019 A&M and Revised 2021 A&M reports are available on the Reports page of the OA website (www.nyc.gov/actuary).

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

The OPEB Plan-specific actuarial assumptions used in the fiscal year 2024 OPEB Plan valuation are as follows:

Item	Assumption
Valuation Date	June 30, 2023
Measurement Date	June 30, 2024
Discount Rate ¹	4.21% per annum for the June 30, 2024 measurement date 4.13% per annum for the June 30, 2023 measurement date
Actuarial Cost Method	Entry Age Normal cost method, level percent of pay calculated on an individual basis
Salary Increase	3.00% per annum, which includes an inflation rate of 2.50% and a general wage increase rate of 0.50%
Inflation	Consumer Price Index (CPI) of 2.50% per year

¹Rates are based solely on the S&P Municipal Bond 20-Year High Grade Rate Index, since the plan has no assets, as per guidance under GASB 75

Per Capita Claims Costs

GHI/EBCBS plans are insured via a Minimum Premium arrangement, while the HIP and many of the Other HMOs are community-rated. Costs reflect age-adjusted premiums for all plans.

The initial monthly premium rates used in the valuations are shown in the following table:

	Monthly Rates at Average Age		
Plan	2024		
HIP HMO Non-Medicare Single Non-Medicare Family Medicare	\$ 927.13 2,271.46 209.40	\$ 871.42 2,134.99 199.62	
GHI/EBCBS Non-Medicare Single Non-Medicare Family Medicare	998.60 2,620.46 208.60	917.92 2,409.11 201.59	
Other HMOs ¹ Non-Medicare Single Non-Medicare Family Medicare Single Medicare Family	1,403.21 3,804.02 328.69 657.70	1,302.87 3,567.29 311.73 620.28	

Other HMO premiums represent the weighted average of the total premium for medical (not prescription drug) coverage, including retiree contributions, of the HMO plans (other than HIP) based on actual enrollment.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Additionally, the individual monthly rates at age 65 used in the valuations are shown the following table:

	Monthly Rates at Age 65				
Plan	2024	2023			
HIP HMO Non-Medicare Medicare	\$ 1,961.99 209.40	\$ 1,844.10 199.62			
GHI/EBCBS Non-Medicare Medicare	2,142.97 198.54	1,970.02 192.11			
Other HMOs	Varies by	y system			

Welfare Fund

For the fiscal year 2023 valuation, the Welfare Fund contribution reported for fiscal year 2024, including any reported retroactive amounts, was used as the per capita cost for valuation purposes. Reported annual contribution amounts for the last two years for NYCERS are shown in Section V-b of the OPEB Plan valuation report dated September 6, 2024. Welfare Fund rates are based on actual reported union Welfare Fund code for current retirees.

The weighted-average annual contribution rates used for future retirees is shown below:

	Annual Rate				
Retirement Plan		2024		2023	
NYCERS	\$	1.729	\$	1,867	

Medicare Part B Premiums

Medicare Part B Premiums are as follows:

Calendar Year	Monthly Premium
2019	\$ 134.43
2020	143.21
2021	146.97
2022	167.82
2023	164.90
2024	174.70

Medicare Part B premium reimbursement amounts have been updated to reflect the actual premium rates announced for calendar years through 2024. Due to recent cost-of-living increase in Social Security benefits, the portion of Medicare Part B participants protected by the hold-harmless provision decreased from 3.5% in 2022 to 1.5% in 2023.

For Calendar Years 2023 and 2024, no participants were assumed to be protected by the hold-harmless provision and the monthly premium was set equal to the Calendar Years 2023 and 2024 announced amounts.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

For the fiscal year 2023 OPEB Plan valuation, the annual premium used was \$2,037.60, which is equal to 12 times an average of the calendar year 2023 and 2024 monthly premiums shown.

An additional 11.4% load is added to the base Medicare Part B premium amounts each year to account for the income-related Medicare Part B premiums for high-income individuals. This assumption was updated from the previous valuation to reflect more recent experience.

Medicare Part B Premium Reimbursement Assumption

90% of Medicare participants are assumed to claim reimbursement; based on historical data.

Health Care Cost Trend Rate ("HCCTR")

Year Ending	Pre-Medicare Plans	Medicare Plans	Medicare Part B Premiums	Welfare Fund Contributions
2024	7.00%	4.80%	5.00%	3.50%
2025	7.00	4.70	5.00	3.50
2026	6.75	4.70	5.00	3.50
2027	6.50	4.60	5.00	3.50
2028	6.25	4.60	5.00	3.50
2029	6.00	4.50	5.00	3.50
2030	5.75	4.50	5.00	3.50
2031	5.50	4.50	5.00	3.50
2032	5.25	4.50	5.00	3.50
2033	5.00	4.50	5.00	3.50
2034	4.75	4.50	5.00	3.50
2035 and later	4.50	4.50	5.00	3.50

Age and Gender-Related Morbidity

The premiums are age and gender adjusted for GHI/EBCBS, HIP and Other HMOs. The assumed relative costs of coverage are consistent with information presented in the 2013 study *Health Care Costs – From Birth to Death*, sponsored by the Society of Actuaries.

For non-Medicare costs, a sample of factors used are:

Age	Male	Female	Age	Male	Female		
20	0.170	0.225	45	0.355	0.495		
25	0.146	0.301	50	0.463	0.576		
30	0.181	0.428	55	0.608	0.671		
35	0.227	0.466	60	0.783	0.783		
40	0.286	0.467	64	0.957	0.917		

Children costs assume a factor of 0.229.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Medicare costs prior to age 65 assume an additional disability-related morbidity factor. A sample of factors are:

Age	Male	Female	Age	Male	Female		
20	0.323	0.422	65	0.919	0.867		
25	0.278	0.565	70	0.946	0.885		
30	0.346	0.804	75	1.032	0.953		
35	0.432	0.876	80	1.122	1.029		
40	0.545	0.878	85	1.217	1.116		
45	0.676	0.929	90	1.287	1.169		
50	0.883	1.082	95	1.304	1.113		
55	1.159	1.260	99 and Older	1.281	0.978		
60	1.493	1.470					

The age adjustment for the non-Medicare GHI/EBCBS premium reflects a reduction for the estimated margin anticipated to be returned of 4.0% and 2.0% in the GHI and EBCBS portion of the monthly premium, respectively. The non-Medicare GHI portion is \$467.58 out of \$998.60 for single coverage and \$1,239.79 out of \$2,620.46 for family coverage for fiscal year 2024 rates. The Non-Medicare EBCBS portion is the remainder of the premium.

Similarly, the age adjustment for the Medicare GHI/EBCBS premium reflects a reduction for the Medicare GHI/EBCBS premium reflects a reduction for the estimated margin anticipated to be returned of 4.0% and 3.0% in the GHI and ECBS portion of the monthly premium, respectively. The Medicare GHI portion is \$111.59 out of the \$208.60 for the fiscal year 2024 rates. The EBCBS portion is the remainder of the premium.

Participation Rates

Actual elections are used for current retirees. Portions of current retirees not eligible for Medicare are assumed to change elections upon attaining age 65 based on the patterns of elections of Medicare-eligible retirees.

For current retirees who appear to be eligible for health coverage but have not made an election (i.e., non-filers), the valuation reflects single GHI/EBCBS coverage and Part B premium and benefits only, to approximate the obligation if these individuals were to file for coverage. For future retirees, the portion assumed not to file for future benefits, and therefore valued similarly, is 13.0% for NYCERS in 2024. This non-filer group also includes some participants who do not qualify for coverage because they were working less than 20 hours a week at termination.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Detailed assumptions for future retirees are presented below:

Plan Participation Assumptions

Plan	NYCERS
Pre-Medicare GHI/EBCBS HIP HMO Other HMO Waiver	75% 18 2 5
Medicare GHI HIP HMO Other HMO Waiver	75 16 5 4
Post-Medicare Migration Other HMO to GHI HIP HMO to GHI GHI to HIP HMO GHI to Other HMO HIP HMO to Other HMO	0 0 0 0 10
Pre-Medicare Waiver To GHI at 65 To HIP HMO at 65 To Other HMO at 65	0 0 20

Dependent Coverage

Dependent coverage is assumed to terminate when a retiree dies.

Dependents

Child dependents of current retirees are assumed to receive coverage until age 26. Children are assumed to be covered for eight years after retirement.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Male retirees were assumed to be four years older than their wives, and female retirees were assumed to be two years younger than their husbands. Dependent assumptions based on distribution of coverage of recent retirees are shown in the following table:

Dependent Coverage Assumptions

Group	NYCERS
<u>Male</u>	
Single Coverage	35%
Spouse	35
Child/No Spouse	8
Spouse and Child	22
Total	100%
Female Single Coverage	67%
Spouse Child/No Spouse	22
Child/No Spouse	<i>I</i>
Spouse and Child	4
Total	100%

COBRA Benefits

Employees and beneficiaries who enroll in COBRA coverage contribute 102% of the premium. There is no cost to the Authority for COBRA beneficiaries who enroll in community-rated HMOs, including HIP, since these individuals pay their full community rate. However, The City's costs under the experience-rated GHI/EBCBS coverage are affected by the claims for COBRA-covered individuals, who typically utilize services at a much higher rate than active participants.

The valuation assumes 15% of employees not eligible for OPEB elect COBRA coverage for 15 months based on experience of other large employers. A lump-sum COBRA cost of \$1,700 was assumed for terminations during fiscal year 2024. This lump-sum amount is increased by the Pre-Medicare HCCTR for future years, but is not adjusted for age-related morbidity.

Active Off-Payroll ("AOP")

Active members off payroll on known short-term leave of absence are treated as actives, and the remaining members are included as inactive members entitles to but not yet receiving benefits if they have me the OPEB vesting requirements. Otherwise, they are not included in the valuation.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Sensitivity of the Net OPEB Plan Liability to Changes in the Discount Rate

The following table presents the Authority's proportionate share of the net OPEB Plan liability using the discount rate of 4.21% for fiscal year 2024 and 4.13% for fiscal year 2023, as well as what the Authority's proportionate share of the net OPEB Plan liability would be if it were calculated using a discount rate that is 1% lower or 1% higher than the current rate:

	June 30, 202	4			June 30, 2023							
Current					Current							
		1% Increase (5.21%)	19	% Decrease (3.13%)	Di	scount Rate (4.13%)	1	% Increase (5.13%)				
\$ 3,529,525	\$ 3,096,94	2 \$	2,745,799	\$	2,307,404	\$	2,024,102	\$	1,792,463			

Sensitivity of the Net OPEB Plan Liability to Changes in the Healthcare Cost Trend Rate

The following table presents the Authority's proportionate share of net OPEB Plan liability using the healthcare cost trend rate of 7.0% (Pre-Medicare Plans) and 4.8% (Medicare Plans) for fiscal year 2024 and 7.0% (Pre-Medicare Plans) and 4.8% (Medicare Plans) for fiscal year 2023, as well as what the Authority's proportionate share of the net OPEB Plan liability would be if it were calculated using healthcare cost trend rates that are 1% lower or 1% higher than the current healthcare cost trend rates:

	June 30, 2024			June 30, 2023					
	Current Trend		Current Trend						
1% Decrease (6.0% / 3.8%)	Rate (7.0% / 4.8%)	1% Increase (8.0% / 5.8%)	1% Decrease (6.0% / 3.8%)	Rate (7.0% / 4.8%)	Rate 1% Increase				
\$ 2,671,725	\$ 3,096,942	\$ 3,632,372	\$ 1,714,277	\$ 2,024,102	\$ 2,420,800				

Deferred Outflows of Resources and Deferred Inflows of Resources Related to the OPEB Plan

At June 30, 2024 and 2023, the Authority reported deferred outflows of resources and deferred inflows of resources related to the OPEB Plan from the following sources:

		Fiscal \	Year 2	2024		Fiscal Year 2023			
		Deferred Outflows of		Deferred	_	Deferred	_	Deferred	
		Resources		nflows of esources	_	utflows of esources		nflows of esources	
Difference between expected and actual experience	\$	1,354,064	\$	117,095	\$	585,472	\$	157,891	
Changes of assumptions or other inputs		70,183		555,224		86,423		687,779	
Total	\$	\$ 1,424,247		672,319	\$	671,895		845,670	

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

Amounts reported as deferred outflows of resources and deferred inflows of resources related to the OPEB Plan at June 30, 2024 and 2023 will be recognized in OPEB expense as follows:

Fiscal Year Ended June 30	Fiscal Year 2024	Fiscal Year 2023		
2024	\$ -	\$	(46,998)	
2025	102,697		(46,322)	
2026	103,373		(18,248)	
2027	131,447		(17,091)	
2028	132,604		(30,474)	
2029	119,221		(29,992)	
2030	119,703		15,131	
2031	145,361		219	
2032	219		-	

NOTE 13 - POLLUTION REMEDIATION OBLIGATIONS

The System reports pollution remediation obligations ("PROs") as required by the GASB. The System's PROs may arise as a result of: (1) federal, state, and local laws and regulations; (2) violations of pollution-related permits or licenses; (3) a determination by the System that there is an imminent endangerment to public health and safety as a result of an existing pollution condition; (4) the System being named in a lawsuit to compel remediation or being identified by a regulator as a party responsible or potentially responsible for remediation; and/or (5) the System's voluntarily commencement of remediation. As of June 30, 2024 and 2023, the System reported \$77.1 million and \$62.2 million of liabilities for known PROs, respectively.

The System has estimated these amounts based on the current value of outlays expected to be incurred for pollution remediation, which it is currently obligated to perform. Actual future outlays will differ from the estimated amounts if the prices or techniques for remediation measures change or differ from estimates, if and when additional information about existing pollution conditions becomes known to the System in the future and/or if applicable laws or regulations change.

Remediation outlays for certain pollution conditions currently known to the System are not included in the reported liabilities because they are not yet reasonably estimable. These include certain locations that the System has been informed have been designated under federal law as Superfund sites to address alleged hazardous substances, pollutants, or contaminants at these sites and for which the System may be named as a potentially responsible party for the remediation because there are the System's facilities operated at these locations.

NOTE 14 - SUBSEQUENT EVENTS

The System evaluated its June 30, 2024 combining financial statements for subsequent events through October 11, 2024, the date the combining financial statements were issued and noted the following:

On August 8, 2024, the Authority drew down \$126 million of Fiscal 2022 Series 8 BAN proceeds. The proceeds were used to fund capital projects of the System.

NOTES TO COMBINING FINANCIAL STATEMENTS - CONTINUED

June 30, 2024 and 2023

On September 13, 2024, the Standby Bond Purchase Agreement between the Authority and PNC Capital Markets LLC, under which liquidity support is provided for the Authority's Water and Sewer System Revenue Bonds, Adjustable Rate Fiscal 2013 Series AA, Subseries AA-1, which was scheduled to expire on October 2, 2024, was extended to October 2, 2027.

On September 13, 2024, the Standby Bond Purchase Agreement between the Authority and PNC Capital Markets LLC, under which liquidity support is provided for the Authority's Water and Sewer System Revenue Bonds, Adjustable Rate Fiscal 2016 Series AA, Subseries AA-2, which was scheduled to expire on October 25, 2024, was extended to October 25, 2027.

On October 2, 2024, the Standby Bond Purchase Agreement between the Authority and Citibank, N.A., under which liquidity support is provided for the Authority's Water and Sewer System Revenue Bonds, Adjustable Rate Fiscal 2003 Series F, Subseries F-2, which was scheduled to expire on October 25, 2024, was replaced by a Standby Letter of Credit and Reimbursement Agreement between the Authority and Sumitomo Mitsui Banking Corporation. The new agreement is scheduled to expire on October 2, 2029.

On October 2, 2024 the Authority issued \$887 million of fixed rate Second Resolution bonds, Fiscal 2025 Series AA. Proceeds of the bonds were used to fund capital projects, refinance \$75.0 million Fiscal 2020 Series BB, Subseries BB-2 bonds, \$35.0 million Fiscal 2020 Series GG, Subseries GG-2 bonds, and \$50.0 million Fiscal 2022 Series CC, Subseries CC-2 bonds, and purchase \$44.5 million tendered bonds (\$42.1 million of Fiscal 2016 Series BB bonds, \$1.4 million of Fiscal 2017 Series EE bonds, \$550 thousand of Fiscal 2018 Series AA bonds, \$25.0 thousand of fiscal 2018 Series BB bonds, \$10.0 thousand of Fiscal 2019 Series CC bonds, \$50.0 thousand of Fiscal 2021 Series BB bonds and \$5.0 thousand of Fiscal 2022 Series BB bonds). The Bonds have a final maturity of 2054.



SCHEDULE OF CHANGES FOR TOTAL OPEB PLAN LIABILITY AND RELATED RATIOS

As of June 30*, (in thousands):

	2024 2023		2022	2021	2020	2019	2018	2017	
Total OPEB liability									
Service cost	\$ 69	\$ 71	\$ 112	\$ 112	\$ 97	\$ 111	\$ 94	\$ 101	
Interest	84	74	44	54	53	47	42	43	
Differences between expected									
and actual experience	1,043	112	334	(114)	(43)	572	(106)	(96)	
Changes of assumptions	(15)	67	(628)	(34)	33	(336)	35	(222)	
Benefits payments	(108)	(71)	(19)	(19)	(21)	(23)	(20)	(15)	
Cadillac tax repeal					(18)				
Net Changes in Total OPEB liability Total OPEB liability - beginning	1,073 2,024	253 1,771	(157) 1,928	(1) 1,929	102 1,828	371 1,457	45 1,412	(189) 1,601	
Total OPEB liability - ending	\$ 3,097	\$ 2,024	\$ 1,771	\$ 1,928	\$ 1,929	\$ 1,828	\$ 1,457	\$ 1,412	
Covered employee payroll	\$ 1,228	\$ 1,295	\$ 1,156	\$ 1,209	\$ 1,187	\$ 942	\$ 859	\$ 1,038	
Total OPEB Plan liability as a percentage of covered employee payroll	252.2%	156.3%	153.2%	159.4%	162.4%	193.9%	169.6%	135.9%	

^{*}This data is presented for those years for which information is available.

Notes to the Schedule:

Changes of assumption: Changes of assumption and other inputs reflect the effects of changes in the discount rate each period. The following are the discount rates used in each period:

Years	Discount Rate
2024	4.21%
2023	4.13
2022	4.09
2021	2.18
2020	2.66
2019	2.79
2018	2.98
2017	3.13

The Authority funds OPEB benefits on a pay-as-you-go basis and contributions are not actuarially determined. No assets are accumulated in a trust that meet the criteria of GASB codification P22.101 to pay related benefits for the OPEB Plan. Therefore, the required supplementary information related to actuarially determined contributions for the 10 most current fiscal years is not applicable.

SCHEDULE OF THE AUTHORITY'S PROPORTIONATE SHARE OF THE NET PENSION LIABILITY Last 10 Fiscal Years* (in thousands):

		2024	2023	2022	2021	2020	2019	2018	2017	2016	2015
Authority's proportion of the net pension liability	%	0.004	0.005	0.005	0.005	0.002	0.002	0.003	0.004	0.005	0.005
Authority's proportionate share of the net pension liability	\$	589	824	1,014	343	422	393	516	828	1,215	1,012
Authority's covered payroll	\$	1,227	1,295	1,156	1,209	1,187	942	859	1,038	1,148	1,289
Authority's proportionate share of the net pension liability as a percentage of its covered payroll	%	48.0	63.6	87.7	28.4	35.6	41.7	60.1	79.8	105.8	78.5
Plan fiduciary net position as a percentage of the total pension liability	%	84.3	82.2	81.3	93.1	76.9	78.8	78.8	74.8	69.6	73.1

SCHEDULE OF THE AUTHORITY'S PENSION CONTRIBUTIONS

Last 10 Fiscal Years (in thousands):

		2024	2023	2022	2021	2020	2019	2018	2017	2016	2015
Actuarially determined contribution	\$	128	160	214	201	75	78	111	136	170	161
Contribution in relation to the actuarially determined contribution	\$	(128)	(160)	(214)	(201)	(75)	(78)	(111)	(136)	(170)	(161)
Contribution deficiency (excess)	\$	-	-	-	-	-	-	-	-	-	-
Authority's covered payroll1	\$	1,227	1,295	1,156	1,209	1,187	942	859	1,038	1,148	1,289
Contribution as a percentage of covered payroll	%	10.4	12.4	18.5	16.6	6.3	8.3	12.9	13.1	14.8	12.5

¹Covered payroll data from the actuarial valuation date with one-year lag