



**NEW YORK CITY
WATER AND WASTEWATER
RATE REPORT: PROPOSED RATES TO
TAKE EFFECT JULY 1, 2023**

MAY 2023

NEW YORK CITY
**WATER
BOARD**

The New York City Water Board (the “Board”) has prepared this information booklet to inform the public on its rate proposals that would take effect on July 1, 2023 and provide information on the financial condition of the water and wastewater system (the “System”).

New York City’s System is among the largest in the world. The water supply system delivers one billion gallons of high quality drinking water every day to approximately 8.3 million people in New York City (the “City”) and approximately one million residents in the counties north of the City. The City’s fourteen Wastewater Resource Recovery Facilities (WRRFs) treat 1.2 billion gallons of wastewater daily. The City’s water and sewer infrastructure plays a critical role in promoting public health and the City’s economic vitality.

The City is a unique asset, constituting the largest urban center in the United States, and is a global destination for commerce, tourism, and diplomacy. Protecting the City’s water and wastewater infrastructure has been a key priority of successive Mayoral administrations. The Adams administration has continued that tradition since entering office in 2022, emphasizing environmentally sound and sustainable policies for the City’s infrastructure. The City’s water and wastewater system, like the City itself, is characterized by its large physical scale, as well as its composition consisting of thousands of unique, important, and distinct infrastructure assets.

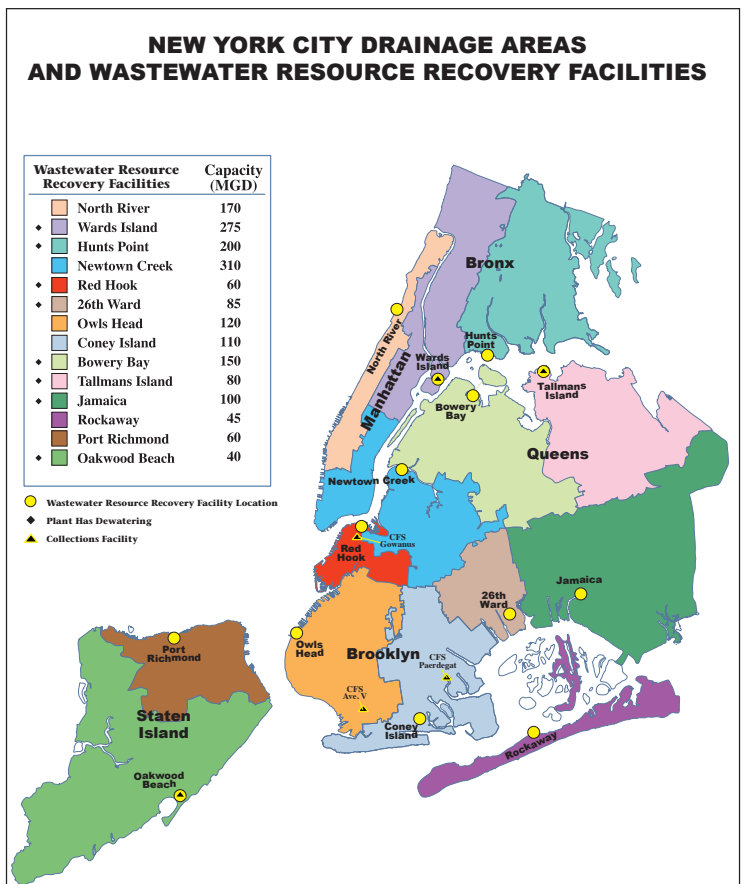
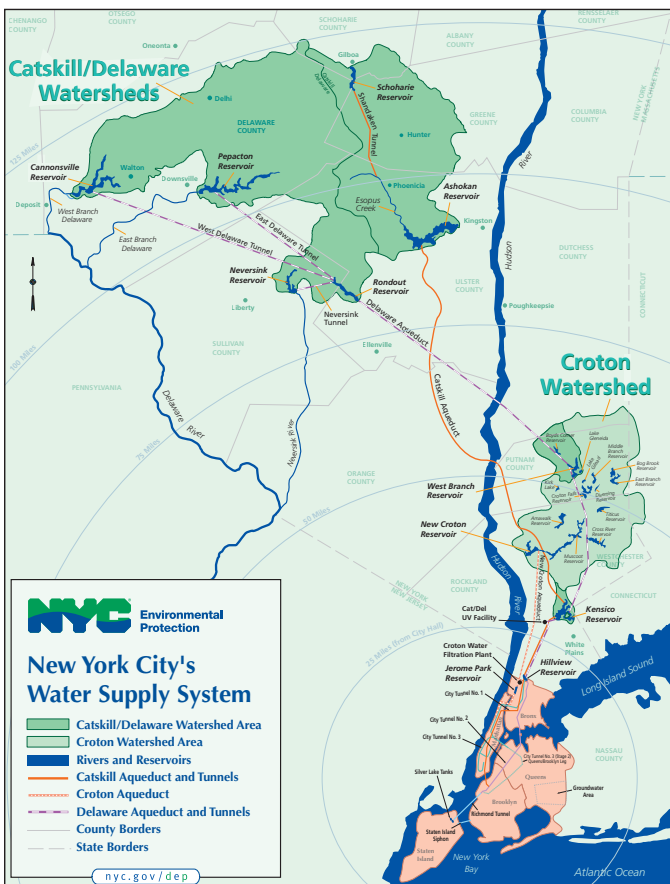
Revenue from rates charged for service covers the System’s capital and operating expenses. Most properties are charged a metered water rate based on consumption. Approximately 3% of accounts are billed on the basis of non-volumetric flat rates, billing programs that are available in most cases only after installing water efficiency improvements. Wastewater charges for meter-billed and flat-rate properties are assessed at 159% of water charges.

NEW YORK CITY WATER BOARD

The New York City Water Board’s mission is to establish rates for and distribute the collected revenues of the Water and Sewer System of the City of New York, proactively considering the optimal level to achieve efficient financing of the System’s infrastructure and sustainable provision of high-quality service at a fair price to our customers.

Water Board Members:

- Alfonso L. Carney, Jr., Chair
- Evelyn Fernandez-Ketcham
- Adam Freed
- Jonathan E. Goldin
- Jukay Hsu
- Arlene M. Shaw
- Daniel Zarrilli



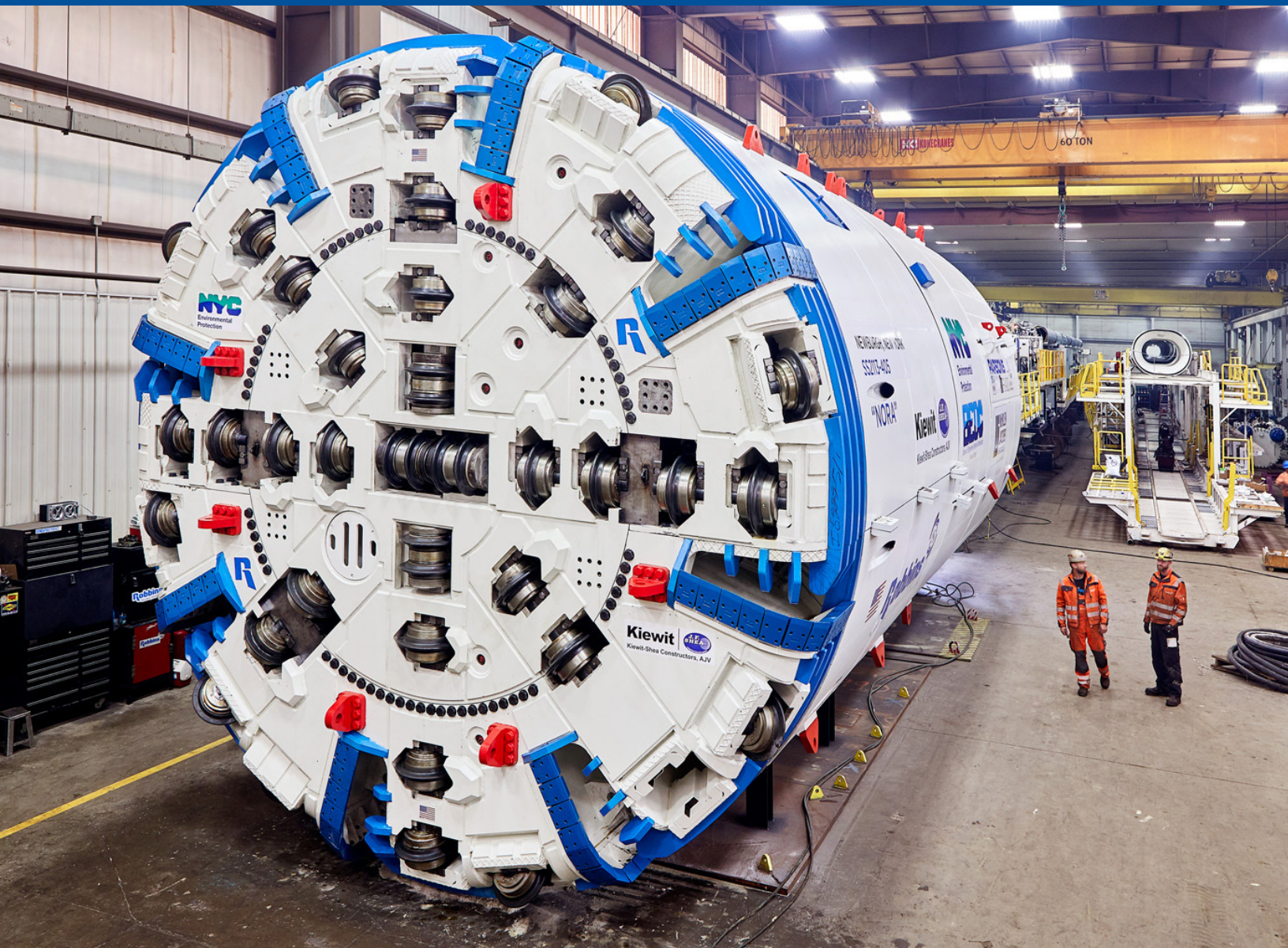
Water Board Rate Adoption Process

- ▶ The New York City Municipal Water Finance Authority projects debt service on bonds issued to finance water and wastewater capital projects and certifies the annual debt service to the Board.
- ▶ The Department of Environmental Protection, working in partnership with the City's Office of Management and Budget (OMB), projects the System's operating and maintenance expenses, which OMB then certifies in an annual communication to the Board based on the Mayor's Executive Budget.
- ▶ The System's consulting engineer certifies that the annual expenses and capital investment are reasonable and appropriate to maintain the viability of the System.
- ▶ The System's rate consultant certifies that revenues are sufficient to cover expenses, that the proposed rate structure will support the revenue requirement, and that the proposed policies will advance the Board's mission.
- ▶ The Board holds a public hearing in each borough of the City. (See schedule below.)
- ▶ At its Annual Meeting, the Board adopts an Annual Budget based on the System's expenses that have been certified to it and adopts a rate. The Board must adopt a rate that will produce sufficient revenues to fund the System's expenses, and is tasked with equitably and affordably allocating the cost of water and wastewater service across the City's large and diverse property base.

CALENDAR OF EVENTS LEADING UP TO THE START OF THE NEXT FISCAL YEAR

Event	Date	Location	Time
DEP rate proposal to Water Board	Monday 1-May	NYC OMB 255 Greenwich St., 8th floor conf. room Manhattan	9:15 a.m.
Staten Island Public Hearing	Wednesday 24-May	Bernikow JCC of Staten Island 1466 Manor Road, Staten Island	6:00 p.m.
Queens Public Hearing	Thursday 25-May	JFK Jr. School 57-12 94th Street, Queens	6:00 p.m.
Manhattan Public Hearing	Tuesday 30-May	NYC OMB 255 Greenwich St., 8th floor conf. room Manhattan	2:00 p.m.
Brooklyn Public Hearing	Wednesday 31-May	Saint Francis College 179 Livingston Street, 5th Floor, Brooklyn	6:00 p.m.
Bronx Public Hearing	Thursday 1-Jun	Mercy College 1200 Waters Place, Bronx	6:00 p.m.
Water Board meets to vote on budget and final rate	Tuesday 6-June	NYC OMB 255 Greenwich St., 8th floor conf. room Manhattan	9:15 a.m.

DEP INFRASTRUCTURE INVESTMENT OVERVIEW



DEP's ongoing commitment to improving and maintaining the City's water and wastewater system, and prioritizing sustainability and resource reuse, is reflected in DEP's largest-ever capital budget, which includes \$31.3 billion of funding spanning Fiscal Years 2023 to 2033.

Preparatory work for the anticipated repair work to the Delaware Aqueduct is underway and in the final stages. The closure of the Delaware Aqueduct is expected to begin in October 2023, with repair work expected to require a five-to-eight-month time period to complete.

During the time the Aqueduct is undergoing repairs, the Rondout-West Branch Tunnel will provide conveyance for water from the Catskill and Delaware watershed areas to customers located east of the Hudson River. The core construction work on the bypass tunnel was completed during 2022, with the remaining capital construction work completed during the course of 2023, and funded from the remaining \$108 million of capital commitments reflected in DEP's current capital plan.

Source: NYC DEP capital budget department and office of the agency chief engineer; NYC Municipal Water Finance Authority official statement dated March 9, 2023; diagram per Kiewit-Shea Constructors J.V., "TBM Tunneling Under High Water Pressures Rondout West Branch Bypass Tunnel", September 9-11, 2019



The Hunts Point Wastewater Resource Recovery Facility is undergoing \$325 million of capital improvements during the 10-Year Capital Plan forecast period. The work includes constructing four new digesters to enable beneficial resource reuse, additions and improvements to the natural gas infrastructure located at the site, improved intra-facility logistics, and the construction of new waste product storage tanks. The Facility's electrical infrastructure has also been upgraded, including a new connection to the Facility's substation. New piping is also planned and includes installing new pipes and waterproofing the areas immediately adjacent to the new pipe.



The Queens-Brooklyn section of Water Tunnel Number 3 is fully funded in the capital plan, and includes \$416 million during the Fiscal Year 2023 to 2033 plan years. The expected operational readiness date is 2032.

Source: NYC DEP capital budget department and office of the agency chief engineer; NYC Municipal Water Finance Authority official statement dated March 9, 2023; photograph from NYC DEP Bureau of Public Affairs and Communications, October 12, 2017; Construction Index UK (April 10, 2022)



DEP completed \$29 million of sewer and water upgrades in the Gerritsen Beach neighborhood of Brooklyn, completing the work nine months ahead of schedule and \$3.5 million below budget. The scope of work included the upgrading of nearly 13,000 feet of water mains, 1,510 feet of sewers, and 1,050 feet of stormwater conveyance. More than 60 individual blocks were rebuilt with new pavement, sidewalks, curbs, signage, and pedestrian ramps. The construction design work was performed by the City's in-house design team. The Gerritsen work was a good example of the City, Federal FEMA, and the New York State legislature, each of which contributed funding, working together to complete a project on time and under budget.



An extensive series of drinking water and drainage improvements were undertaken in the Queen's neighborhoods of Bayside, Auburndale, and eastern sections of Murray Hill. The work involved outfitting the area with new water and sewer infrastructure, catch basins, sidewalks and roadways, in a combined DEP, DDC, and DOT effort. New water mains and sewers were installed along 9.5 miles of the water and wastewater system's conveyance length, in addition to 3.5 miles of DOT street improvements. Other improvements included 5,800 feet of 72" water mains and 8,300 feet of 48" water mains, and nearly 10,000' of wastewater conveyance. The work was designed by the City's in-house water and wastewater design team, and extended along 33rd Avenue, 37th Avenue, and 38th Avenues in Queens, beginning at 156th Street and extending eastward to 216th Street.

Source: NYC DEP capital budget department and office of the agency chief engineer

Rate Proposal - Highlights (Rates Effective 7/1/2023)

- ▶ A proposed increase to in-City water rates of 4.42% from current levels, providing the system the revenues it needs to operate, while preserving the core rate affordability and supporting the Water Board's significant customer affordability amnesty program adopted at its December 2022 Board meeting
- ▶ No change to the minimum service charge, which will remain at \$0.49 per day for water, for customers demonstrating highly efficient water use levels
- ▶ Home Water Assistance Program: continuation for an additional program year of the expanded bill credit amount of \$145 per eligible account, and an expanded pool of eligible recipients up to 96,000 eligible accounts
- ▶ Multi-family Water Assistance Program: extending expanded program size into an additional program year, allowing up to 48,000 affordable apartments to receive a \$250 per apartment bill credit
- ▶ Deferral through June 30, 2024 of the 10% surcharge on certain properties automatically enrolled in the Multi-family Conservation Program that have not yet demonstrated administrative compliance with the program's terms

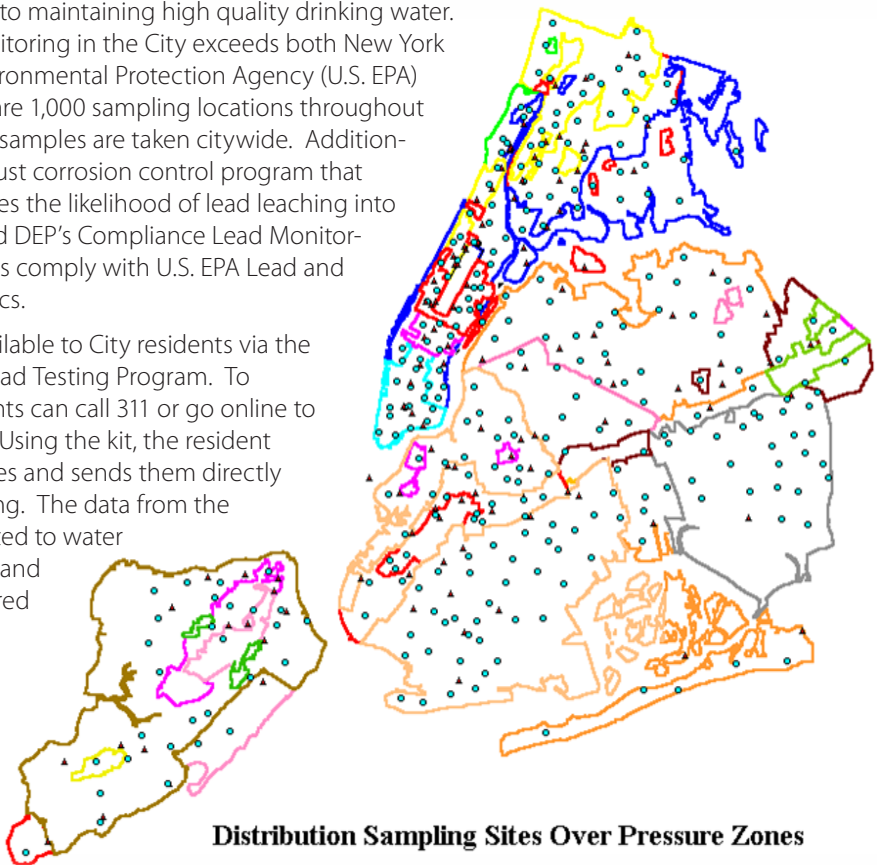


Water Sampling Station

WATER QUALITY

DEP is committed to maintaining high quality drinking water. Water quality monitoring in the City exceeds both New York State and U.S. Environmental Protection Agency (U.S. EPA) standards. There are 1,000 sampling locations throughout the City, and daily samples are taken citywide. Additionally, DEP has a robust corrosion control program that significantly reduces the likelihood of lead leaching into drinking water, and DEP's Compliance Lead Monitoring Program results comply with U.S. EPA Lead and Copper Rule metrics.

Lead testing is available to City residents via the Free Residential Lead Testing Program. To participate, residents can call 311 or go online to request a free kit. Using the kit, the resident takes water samples and sends them directly to the lab for testing. The data from the samples is submitted to water quality regulators, and the results are shared with the resident.



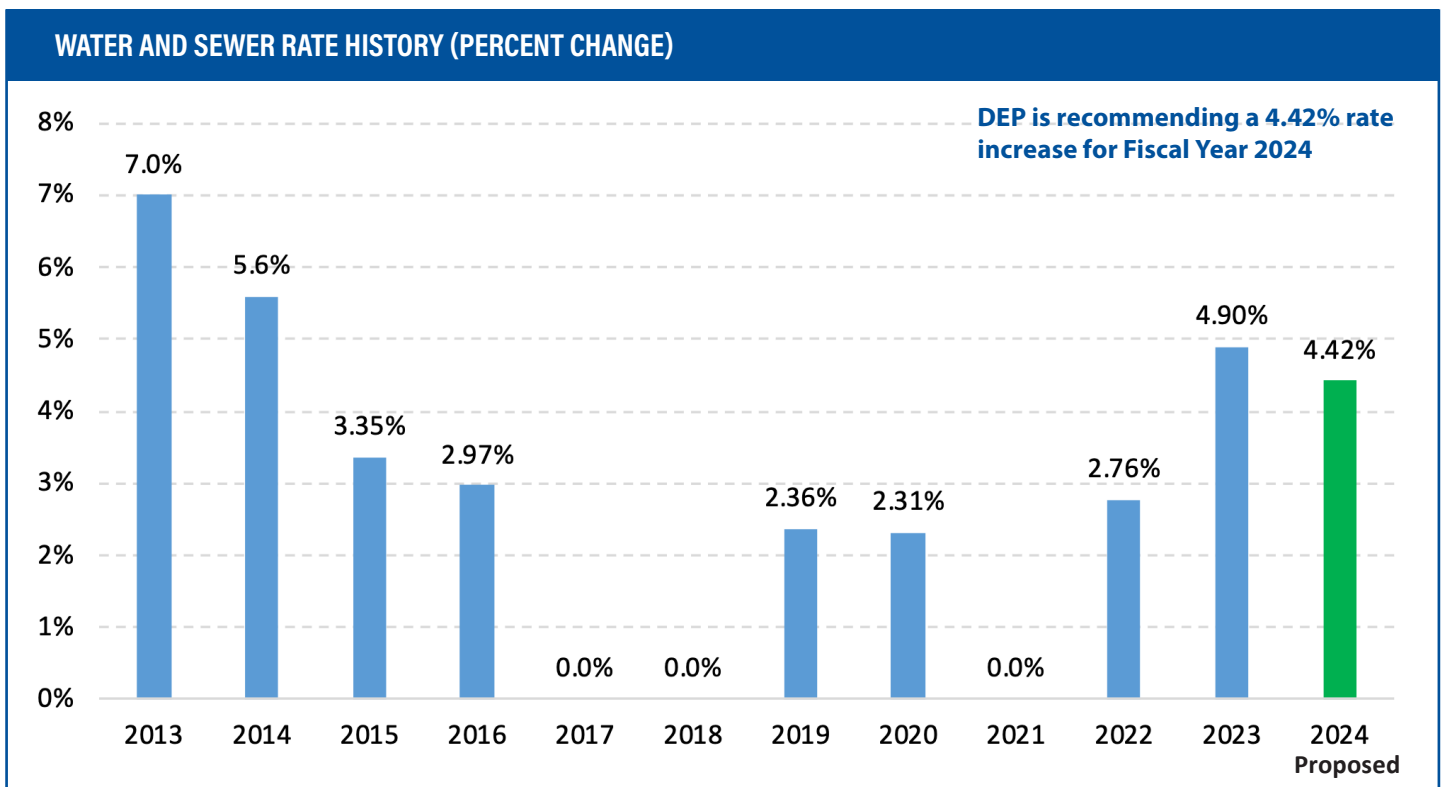
Distribution Sampling Sites Over Pressure Zones

To request a free kit, call 311 or visit nyc.gov/apps/311.

System and Water Rates Outlook

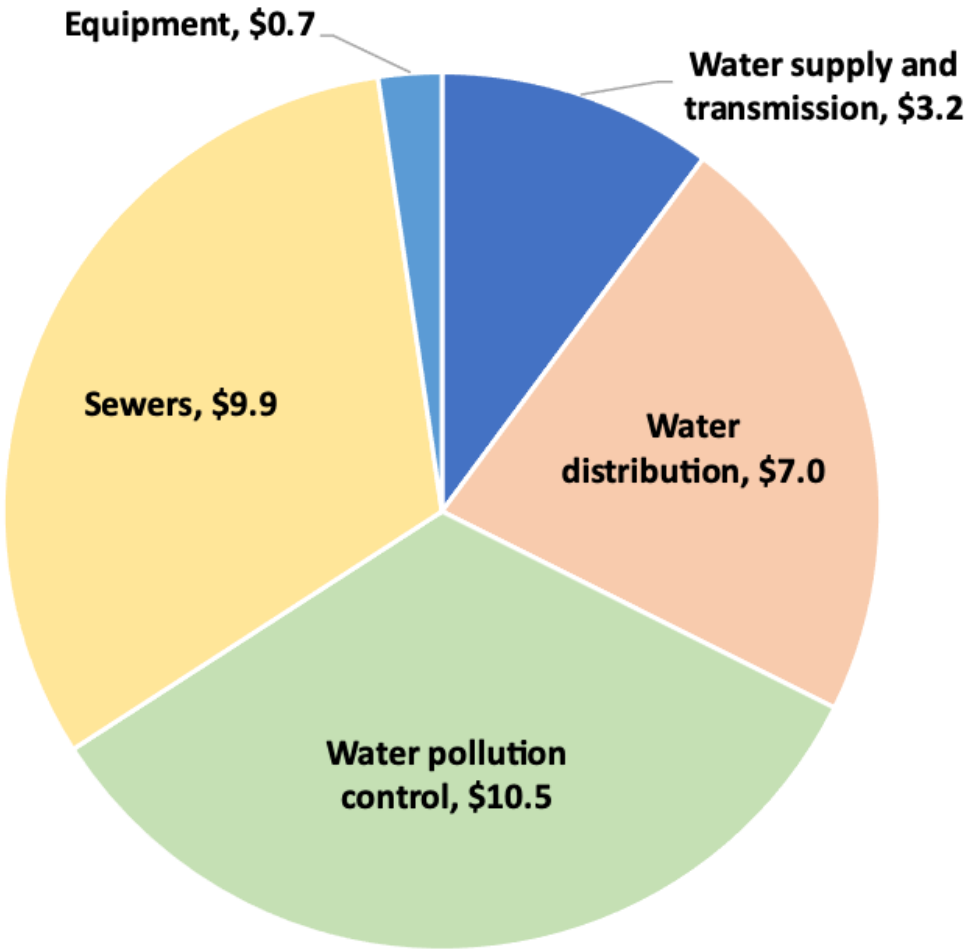
DEP and the Water Board seek to increase water and wastewater rates in line with increases to the costs they incur in running the City’s water and wastewater system. The major categories of costs incurred include personnel expenses, energy and chemical costs, property taxes on landholdings outside of the City, and interest and principal costs on debt issued by the system. In recent years, the rate increases have been in the low single digit percentage range, and there have been several years without any rate increase implemented. DEP and the Water Board’s need to seek rate increases also depends on the system’s overall revenue picture.

DEP and the Board’s budgets tend to increase over time, as the general level of costs increase, and the system’s capital budget grows, driven by the upgrading or replacement of aging system infrastructure assets, the need to hire and train new personnel, new technologies, and regulatory requirements, among other factors. DEP is currently implementing its largest-ever capital construction plan, which supports an ambitious combination of state of good repair, new construction, sustainability, and energy efficiency projects.



ANNUAL WATER AND WASTEWATER CHARGES	FY 2023	Proposed FY 2024 (Rates Effective 7/1/2023)	Monthly Increase
Average Single-Family Charge (70,000 gallons per year)	\$1,041	\$1,088	\$3.84
Average Multi-family Metered Charge (52,000 gallons per year)	\$773	\$808	\$2.85
Multi-family Conservation Program (Per Residential Unit)	\$1,134	\$1,184	\$4.18
Minimum Charged Properties (using less than 90 gallons per day)	\$463	\$463	\$0.00

CAPITAL IMPROVEMENT PROGRAM, FISCAL YEARS 2023 TO 2033 (\$ IN BILLIONS)



**TOTAL CITY CAPITAL PROJECT FUNDS,
FY 2023 - FY 2033: \$31.3 BILLION**

Source: capital funds are presented on an all-funds basis, including City and Federal source funds
Source: NYC Municipal Water Finance Authority official statement dated March 9, 2023

WATER BOARD RATE AFFORDABILITY AND CUSTOMER ASSISTANCE PROGRAMS

	Pre-Expansion Annual Program Budget	50% Program Expansion, Proposed to Extend into FY 2024	Proposed Continuation of Expansion Budget in FY 2024
Multi-Family Water Assistance Program (4-unit +)	\$10 million	Additional 8,000 affordable apartment unit credits, for 48,000 total credits of \$250 each	\$12 million
Home Water Assistance Program (1-4 unit)	\$6 million	Larger \$145 bill credit to all recipients, and additional 45,000 new recipients (96,000 total)	\$14 million
Leak Forgiveness Program	\$4 million	Program in line with current terms, 50% bill credit for self-reported leaks that are fixed	\$4 million
Total Affordability Programs	\$20 million	Proposal includes extending the \$10 million program funding expansion into FY 2024	\$30 million

Note: budgeted funds available for the Leak Forgiveness Program are an estimate; program funding can be increased based on availability of a pool of qualifying program applicants

TYPICAL ANNUAL RESIDENTIAL WATER CHARGES

Residential use charges will remain lower than in other large cities

Based on 70k gallons per year

	New York City	30 Large City Average ¹	NYC vs. Average
2019	\$945	\$1,119	-15.5%
2020	\$967	\$1,173	-17.6%
2021	\$967	\$1,216	-20.5%
2022	\$994	\$1,262	-21.2%
2023	\$1,041	\$1,309	-20.5%
2024	\$1,088	NA	NA

Note 1: based on rates in effect as of February of each calendar year, using rates in effect during each fiscal year to calculate representative charges

PROJECTED SYSTEM REVENUES AND EXPENSES (\$ MILLIONS)

	FY 2023	FY 2024
REVENUES		
Operating Revenues		
Receipts from Customers Located in New York City	\$3,841	\$3,953
Upstate Revenue	85	90
Miscellaneous Revenue	22	23
Other Revenues		
Interest on Funds	43	70
Federal Subsidy on Outstanding Build America Bonds	48	48
Projected Total Revenues	\$4,040	\$4,183
EXPENSES		
Schedule of Forecast Debt Service		
Outstanding 1st Resolution Bonds	23	19
Anticipated New 1st Resolution Bonds	0	0
Outstanding 2nd Resolution Bonds issued to the Public	1,153	1,432
Anticipated 2nd Resolution Bonds to be issued to the public	0	45
Interest Payments on Commercial Paper Notes	0	0
Outstanding 2nd Resolution Bonds issued to the Environmental Facilities Corporation ("EFC")	566	532
Anticipated 2nd Resolution Bonds to be issued to the EFC	0	9
Less: EFC Subsidy and Capitalized Interest	-102	-100
Forecast Debt Service for Current and Upcoming Year	\$1,640	\$1,937
Offset in Part by Prior Year Revenues for Current Year Debt	-1,286	-1,563
Forecast Net Debt Service for Current and Upcoming Year	\$353	\$374
Operating Expenses		
Municipal Water Finance Authority Operations	50	53
Water Board Operations	55	57
Water System Component	757	779
Wastewater System Component	1,027	1,126
Allocated Central and Shared Expenses	10	10
Central Allocations for Legal Expenses and Settlements	8	8
Net Operating Expenses	\$1,908	\$2,032
Plus (Minus) Other Expense Adjustments:		
Prior Year O&M Adjustments for Over (Under) Spending	-57	0
Incremental Deposits to Water Board O&M Reserve Fund	10	10
Rental Payments for System Assets Requested by the City	0	0
PAYGO or Debt Structuring Transactions	350	325
Cash Released from Escrows	-87	-47
Total Net Debt Service, Operating and Other Expenses	\$2,477	\$2,694
Projected Balance at Year-End for Next Year Debt Service	\$1,563	\$1,489
Ratio of Revenues to First Resolution Debt Service	177.4x	221.7x
Ratio of Revenues Net of Authority Operations to Total Net Debt Service	11.3x	11.1x

Note: This listing is for information only and does not follow the Flow of Funds priority established under the Financing Agreement.

NEW YORK CITY
WATER
BOARD