BEFORE THE
STATE OF NEW JERSEY
BOARD OF PUBLIC UTILITIES

IN THE MATTER OF THE PETITION OF
NEW JERSEY-AMERICAN WATER COMPANY, INC.
FOR APPROVAL OF INCREASED TARIFF RATES AND
CHARGES FOR WATER AND WASTEWATER SERVICE, AND
OTHER TARIFF MODIFICATIONS

BPU Docket No. WR2201____

Direct Testimony of

PATRICK L. BARYENBRUCH

On Behalf of

New Jersey-American Water Company, Inc.

January 14, 2022

Exhibit P-10

NEW JERSEY-AMERICAN WATER COMPANY, INC.

I. INTRODUCTION

1. Q. Please state your name, position and business address.

A. My name is Patrick L. Baryenbruch. I am the President of my own consulting practice, Baryenbruch & Company, LLC, which was established in 1985. In that capacity, I provide consulting services to utilities and their regulators. My business address is 2832 Claremont Road, Raleigh, North Carolina 27608.

2. Q. Summarize your academic and professional background.

A. I received a Bachelor's degree in Accounting from the University of Wisconsin Oshkosh and a Master's in Business Administration degree from the University of Michigan. I am a member of the American Institute of Certified Public Accountants and the North Carolina Association of Certified Public Accountants.

I began my career with Arthur Andersen & Company, where I performed financial audits of utilities, banks and finance companies. I left to pursue an M.B.A. degree. Upon graduation from business school, I worked with the management consulting firms of Theodore Barry & Associates and Scott Consulting Group (now ScottMadden) before establishing my own firm.

3. Q. Do you hold any professional certifications?

A. Yes. I am a Certified Public Accountant ("CPA") with an active license from the states of Wisconsin and North Carolina. I am a Certified Information Technology Professional, an accreditation awarded by the American Institute of Certified Public Accountants to CPA professionals who can demonstrate expertise in information

technology management. I also hold a Global Information Assurance Certification in cybersecurity from the SANS Institute.

4. Q. Have you provided testimony in other regulatory proceedings on the issue of utility/affiliate transactions?

A. Yes. During my career, I have performed more than 120 evaluations of affiliate charges to 41 utility companies. I have acted as an expert witness on utility/affiliate charges in over 80 rate case proceedings before regulators in 20 states. Exhibit PLB-1 presents my previous affiliate transaction-related assignments.

5. Q. What other work experience do you have with the utility industry?

A. Much of my career has been spent as a management consultant for projects related to the utility industry. I have performed consulting assignments for more than 60 utilities and 10 public service commissions. I have participated as project manager, lead consultant or staff consultant for 24 commission-ordered management and prudence audits of public utilities. Of these, I have been responsible for evaluating the area of affiliate charges and allocation of corporate expenses in the commission-ordered audits of Connecticut Light and Power, Connecticut Natural Gas, General Water Corporation (now United Water Company), Philadelphia Suburban Water Company (now Aqua America), and Pacific Gas & Electric Company.

My firm performed the commission-ordered audit of Southern California Edison's 2002, 2003, 2004 and 2005 transactions with its non-regulated affiliate companies. For 20 years, I have also been heavily involved in providing consulting services

related to information technology ("IT") infrastructure within the utility industry. These projects involve improvements in IT business management practices of utility IT organizations, covering processes such as business planning, risk management, performance measurement and reporting, cost recovery, budgeting, cost management and personnel development.

I was a member of the project management team for several very large-scale IT implementation projects involving more than 800,000 hours of work performed by hundreds of utility client employees and contractor personnel.

6. Q. Please describe the basis for your Direct Testimony in this case.

A. I am presenting the results of my study that evaluated the services provided by American Water Works Service Company, Inc. ("Service Company") during the 12 months ended June 30, 2021 (the "historical period") to New Jersey-American Water Company, Inc. ("NJAWC" or "the Company").

7. Q. Are you sponsoring any exhibits in your testimony?

A. Yes. I am sponsoring PLB-1, which is my CV, and PLB-2, which is the Market to Cost Comparison of Service Company Charges to New Jersey American Water Company. This study was undertaken in conjunction with NJAWC's rate case and the results are true to the best of my knowledge and belief.

II. OBJECTIVES AND METHODOLOGY

8. Q. What were the objectives of your study?

A. This study was undertaken to answer four questions concerning the services provided by the Service Company to NJAWC, each of which bears on the reasonableness of those charges as incurred during the historical period. First, were the Service Company's charges to NJAWC for various Administrative and General ("A&G") expenses during the historical period in line with the level of such charges to other utilities from their service companies? Second, was NJAWC charged costs that were in line with market value for managerial and professional services provided by the Service Company during the historical period? Third, were historical period costs for customer services provided by Service Company's customer accounts services in line with those of other comparable utilities? Fourth, are the services NJAWC receives from the Service Company necessary?

9. Q. Please describe the methodology you employed in conducting your study relative to the market to cost comparison for NJAWC's Service Company costs.

A. To answer the four questions contemplated in the study, I utilized the following basic methodologies. First, in order to place the overall reasonableness of Service Company charges into context, I compared NJAWC's relevant Service Company charges per regulated retail customer for A&G expenses to the same charges for utility companies that must file the Federal Energy Regulatory Commission ("FERC") Form 60 – Annual Report of Service Companies. This information is

publicly available and provides a useful comparison of utility service company charges generally. Second, to determine if the value of Service Company charges during the historical period were in line with the market prices of such services, I compared the cost per hour for managerial and professional services provided by Service Company personnel to hourly billing rates that would be charged by outside providers of equivalent services. Third, to determine whether Service Company's charges during the historical period for customer account services were comparable to other utilities I compared NJAWC's customer account services expenses to those of neighboring investor-owned electric utilities. Fourth, to determine the necessity of Service Company services I investigated the services Service Company provided to NJAWC during the historical period and analyzed whether these services would be required if NJAWC were not part of the American Water organization. The methodologies employed and data upon which I relied are all shown in my study set forth as Schedule PLB-2.

III. CONCLUSIONS

10. Q. What conclusions were you able to draw concerning question number 1, whether the A&G costs that Service Company charges to NJAWC were consistent with those charged to other utilities by their respective service companies?

A. I was able to determine that the Service Company's historical period cost per NJAWC customer is reasonable because it is in line with the cost per customer for the proxy service companies. During the historical period, NJAWC was charged $72

per customer for A&G-related services provided by the Service Company. This compares to an average of $115 per customer for service companies reporting to the FERC. Seventeen of the 22 utility service companies that filed a FERC Form 60 for 2020 had a higher per-customer A&G cost than NJAWC's charges from the Service Company.

11. Q. Why is a comparison of A&G costs useful to a determination of the reasonableness of the Service Company's charges to NJAWC?

A. A&G-related services cover the functions identified below and provide a useful comparison because the processes involved in delivering these services are similar across utility types.

Executive Management	Information Technology
Finance	Procurement
Accounting	Rates and Regulatory
Taxes	Legal
Financial Planning and Analysis	Human Resources
Internal Auditing	Customer Services

12. Q. What conclusions were you able to draw concerning question number 2, whether NJAWC received value for services provided by the Service Company?

A. The comparison of the value of services was accomplished by comparing the cost per hour for Service Company managerial and professional services to those of outside service providers to whom these duties could be assigned. Based on my study, I concluded that:

(1) NJAWC was charged a reasonable value for managerial and professional services during the 12 months ended June 30, 2021.

(2) On average, the hourly rates for outside service providers are 85% higher than the Service Company's hourly rates. Consequently, the Company obtains services from Service Company that are considerably below the market prices for such services.

(3) The managerial and professional services provided by the Service Company are vital and could not be procured externally by NJAWC without careful supervision on the part of NJAWC. If these services were contracted entirely to outside providers, NJAWC would have to add at least five positions to manage activities of outside firms. These positions would be required to ensure the quality and timeliness of services provided.

(4) If all the managerial and professional services now provided by the Service Company had been outsourced during the historical period, NJAWC would have incurred approximately $31.6 million in additional expenses. This amount includes the higher cost of outside providers and the cost of five new NJAWC positions needed to direct the outsourced work.

(5) This Study's hourly rate comparison understates the cost advantages that accrue to NJAWC from its use of the Service Company. Outside service providers generally bill for every hour worked. Service Company exempt personnel, on the other hand, charge a maximum of eight hours per day even when they work more hours. If all overtime hours of Service Company

personnel were factored into the hourly rate calculation, the Service Company would have had an even greater annual dollar advantage than the $31.6 million cited above.

(6) It would be difficult for NJAWC to find local service providers with the same specialized water and wastewater industry expertise as that possessed by the Service Company staff. Service Company personnel spend substantially all their time serving operating water and wastewater companies. This specialization brings with it a unique knowledge of water and wastewater utility operations and regulation that may not be available from local service providers and provides efficiencies over third-party providers.

(7) Most importantly, Service Company fees do not include any profit markup. Only its actual cost of service is being charged to NJAWC.

For all these reasons, the Service Company charges to NJAWC are reasonable and below the charges the Company would have to pay were it to source those services from the market.

13. Q. What conclusions were you able to draw concerning question number 3, whether the historical period costs of the Service Company's customer account services were comparable to such costs incurred by other utilities?

A. Because I found that these costs were comparable to the costs incurred by other utilities for such customer services, I concluded that the costs of the Service Company's customer account services were reasonable. Such costs are below the

average of the neighboring electric utility comparison group. This group of companies provides a reasonable proxy group for comparison to a regulated utility such as NJAWC. During the historical period, the per-customer cost of customer account services for NJAWC customers was $18.03, compared to the 2020 average of $44.44 for other comparable utilities.

14. Q. What conclusions were you able to draw concerning question number 4, whether the services NJAWC receives from the Service Company are necessary?

A. As my study demonstrates:

(1) The services that the Service Company provides are necessary and are required for a water and wastewater utility.

(2) There is no redundancy or overlap in the services provided by the Service Company to NJAWC.

15. Q. Does this complete your Direct Testimony?

A. Yes.

Patrick Baryenbruch's Previous Affiliate Transactions and Rate Case Engagements

	Client	State	Year	Purpose	Rate Case Witness?
1	Connecticut American Water	Connecticut	1999	Rate Case	Yes
2	Illinois American Water	Illinois	2007	Rate Case	Yes
3	Indiana American Water	Indiana	2017	Rate Case	Yes
4	Iowa American Water	Iowa	2020	Rate Case	Yes
5	Kentucky American Water	Kentucky	2003	Rate Case	Yes
		Kentucky	2006	Rate Case	Yes
		Kentucky	2008	Rate Case	Yes
		Kentucky	2009	Rate Case	Yes
		Kentucky	2018	Rate Case	Yes
6	Massachusetts American Water	Massachusetts	2000	Rate Case	Yes
7	Missouri American Water	Missouri	2002	Rate Case	Yes
		Missouri	2008	Rate Case	Yes
		Missouri	2014	Rate Case	Yes
		Missouri	2016	Rate Case	Yes
		Missouri	2019	Rate Case	Yes
8	New Jersey American Water	New Jersey	2005	Rate Case	Yes
		New Jersey	2007	Rate Case	Yes
		New Jersey	2009	Rate Case	Yes
		New Jersey	2010	Rate Case	Yes
		New Jersey	2014	Rate Case	Yes
		New Jersey	2017	Rate Case	Yes
		New Jersey	2019	Rate Case	Yes
9	New Mexico American Water	New Mexico	2007	Rate Case	Yes
10	New York American Water	New York	2006	Rate Case	Yes
		New York	2010	Rate Case	Yes
		New York	2013	Rate Case	Yes
		New York	2015	Rate Case	Yes
11	Ohio American Water	Ohio	2006	Rate Case	Yes
		Ohio	2010	Rate Case	Yes
12	Pennsylvania American Water	Pennsylvania	2008	Compliance	No
		Pennsylvania	2011	Compliance	No
		Pennsylvania	2014	Compliance	No
		Pennsylvania	2017	Compliance	No
13	Tennessee American Water	Tennessee	2006	Rate Case	Yes
		Tennessee	2010	Rate Case	Yes
14	Virginia American Water	Virginia	1996	Rate Case	Yes
		Virginia	1999	Rate Case	Yes
		Virginia	2000	Rate Case	Yes
		Virginia	2001	Rate Case	Yes
		Virginia	2003	Rate Case	Yes
		Virginia	2007	Rate Case	Yes
		Virginia	2009	Rate Case	Yes
		Virginia	2011	Rate Case	Yes
		Virginia	2014	Rate Case	Yes
		Virginia	2018	Rate Case	Yes
15	West Virginia American Water	West Virginia	2002	Rate Case	Yes
		West Virginia	2006	Rate Case	Yes
		West Virginia	2007	Rate Case	Yes
		West Virginia	2009	Rate Case	Yes
		West Virginia	2012	Rate Case	Yes
		West Virginia	2014	Rate Case	Yes
		West Virginia	2017	Rate Case	Yes
16	Atlanta Gas Light (Southern Co)	Georgia	2009	Rate Case	Yes
17	Atmos Energy Corporation	Virginia	2004	Compliance	No
18	Columbia Gas of Kentucky	Kentucky	2015	Rate Case	Yes
19	Columbia Gas of Maryland	Maryland	2015	Rate Case	Yes
20	Columbia Gas of Massachusetts	Massachusetts	2004	Rate Case	Yes
		Massachusetts	2006	Internal Info	No
		Massachusetts	2011	Internal Info	No
		Massachusetts	2012	Internal Info	No
		Massachusetts	2014	Internal Info	No
		Massachusetts	2017	Internal Info	No

Patrick Baryenbruch's Previous Affiliate Transactions and Rate Case Engagements

	Client	State	Year	Purpose	Rate Case Witness?
21	Columbia Gas of Pennsylvania	Pennsylvania	2015	Rate Case	No
		Pennsylvania	2020	Rate Case	Yes
22	Columbia Gas of Virginia	Virginia	2003	Compliance	No
		Virginia	2004	Compliance	No
		Virginia	2005	Rate Case	Yes
		Virginia	2006	Compliance	No
		Virginia	2007	Compliance	No
		Virginia	2008	Compliance	No
		Virginia	2009	Rate Case	Yes
		Virginia	2010	Compliance	No
		Virginia	2011	Compliance	No
		Virginia	2012	Compliance	No
		Virginia	2013	Rate Case	Yes
		Virginia	2014	Compliance	No
		Virginia	2015	Rate Case	Yes
		Virginia	2016	Compliance	No
		Virginia	2017	Rate Case	Yes
		Virginia	2018	Compliance	No
		Virginia	2019	Compliance	No
		Virginia	2020	Compliance	No
23	Northern Indiana Public Service	Indiana	2015	Internal Info	No
		Indiana	2016	Rate Case	Yes
24	Dominion Resources, Inc.	Virginia	2008	Rate Case	Yes
		Virginia	2009	Compliance	No
		Virginia	2010	Compliance	No
		Virginia	2011	Compliance	No
		Virginia	2012	Compliance	No
		Virginia	2014	Compliance	No
		Virginia	2017	Compliance	No
		Virginia	2019	Compliance	No
25	Duke Energy	North Carolina	2006	Compliance	No
26	Elizabethtown Gas (Southern Co)	New Jersey	2008	Rate Case	Yes
27	Electric Transmission Texas	Texas	2016	Rate Case	Yes
28	General Water Works of Rio Rancho	New Mexico	1993	Rate Case	Yes
29	General Water Works of Virginia	Virginia	1992	Rate Case	Yes
30	Po River Water and Sewer	Virginia	1993	Rate Case	Yes
		Virginia	2007	Rate Case	Yes
		Virginia	2008	Rate Case	Yes
31	Progress Energy	North Carolina	2001	Internal Info	No
32	Roanoke Gas	Virginia	2006	Compliance	No
33	Southern California Edison	California	2002	Compliance	No
		California	2003	Compliance	No
		California	2004	Compliance	No
		California	2005	Compliance	No
34	AEP Texas	Texas	2018	Rate Case	Yes
35	Southwestern Electric Power	Texas	2016	Rate Case	Yes
		Texas	2020	Rate Case	Yes
36	Virginia Natural Gas (Southern Co)	Virginia	2004	Compliance	No
		Virginia	2005	Rate Case	Yes
		Virginia	2010	Rate Case	Yes
37	United Water of Pennsylvania	Pennsylvania	2004	Rate Case	Yes
38	Corix Infrastructure/Water Services Corp.	Enterprise	2018	Internal Info	No
		Enterprise	2019	Internal Info	No
39	Massanutten Public Service Company	Virginia	2006	Rate Case	Yes
		Virginia	2008	Rate Case	Yes
		Virginia	2013	Rate Case	Yes
		Virginia	2019	Rate Case	Yes
40	Water Service Corporation Kentucky	Kentucky	2010	Rate Case	Yes
		Kentucky	2012	Rate Case	Yes
		Kentucky	2019	Rate Case	Yes
41	Corix Utilities Oklahoma	Oklahoma	2019	Compliance	Yes
42	Great Basin Water Company	Nevada	2020	Rate Case	Yes

Total Studies	124
Number of Rate Cases	83
Number of Utility Clients	42
Number of States	20

Market to Cost Comparison of Service Company Charges to New Jersey American Water Company

12 Months Ended June 30, 2021

November 2021

Baryenbruch & Company, LLC

New Jersey American Water Company
Market to Cost Comparison of Service Company Charges
12 Months Ended June 30, 2021

Contents

I – Introduction

Purpose of This Study

This Market-to-Cost Comparison of American Water Works Service Company, Inc. (Service Company) Charges to New Jersey American Water Company (NJAWC) study (Study) was undertaken to answer four questions concerning the services provided by Service Company to NJAWC:

1. Were the Service Company's charges to NJAWC for administrative and general (A&G)-related services in line with comparable costs charged by service companies to electric utilities during the 12-months ended June 20. 2021?

2. Was NJAWC charged a reasonable value for managerial and professional services provided by the Service Company during the 12 months ended June 30, 2021?

3. Were the 12 months ended June 30, 2021, costs of the Service Company's customer account services comparable to those of other utilities?

4. Are the services NJAWC receives from the Service Company necessary?

Study Results

Concerning question 1, the following conclusion was reached:

- The Service Company's 12 months ended June 30, 2021, cost per NJAWC customer is reasonable compared to costs per customer for electric and combination electric/gas service companies. During the 12 months ended June 30, 2021, NJAWC was charged $72 per customer for A&G related services provided by the Service Company. This compares to an average of $115 per customer for service companies reporting to the Federal Energy Regulatory Commission (FERC). Seventeen of the 22 utility service companies that filed a FERC Form 60 for 2020 had higher per-customer A&G costs than NJAWC's charges from the Service Company.

Concerning question 2, the following conclusions were reached from this study:

- NJAWC was charged a reasonable value for managerial and professional services during the 12 months ended June 30, 2021.

- On average, the hourly rates for outside service providers are 85% higher than the Service Company's hourly rates. Consequently, the Company obtains services from Service Company that are considerably below the market prices for such services.

- The managerial and professional services provided by the Service Company are vital and could not be procured externally by NJAWC without careful supervision on the part of NJAWC. If these services were contracted entirely to outside providers, NJAWC would have to add at least five positions to manage activities of outside firms. These positions would be required to ensure the quality and timeliness of services provided.

- If all the managerial and professional services now provided by the Service Company had been outsourced during the 12 months ended June 30, 2021, NJAWC and its customers would have incurred approximately $31.6 million in additional expenses. This amount includes the higher cost of outside providers and the cost of five new NJAWC positions needed to direct the outsourced work.

- This Study's hourly rate comparison actually understates the cost advantages that accrue to NJAWC from its use of the Service Company. Outside service providers generally bill for every hour worked. Service Company exempt personnel, on the other hand, charge a maximum of eight hours per day even when they work more hours. If all overtime hours of Service Company personnel were factored into the hourly rate calculation, the Service Company would have had an even greater annual dollar advantage than the $31.6 million cited above.

- It would be difficult for NJAWC to find local service providers with the same specialized water and wastewater industry expertise as that possessed by the Service Company staff. Service Company personnel spend substantially all their time and bring a wealth of experience serving operating water and wastewater companies. This specialization and experience bring with it a unique knowledge of water and wastewater utility operations and regulation that may not be available from local service providers.

- Service Company fees do not include any profit markup. Only its actual cost of service is being charged to NJAWC.

Concerning question 3, the following conclusion was reached:

- The cost of the Service Company's customer account services is reasonable. Such costs are below the average of the neighboring electric utility comparison group. This group of companies provides a reasonable proxy group for comparison to a regulated utility of the size and scope of the Service Company and NJAWC. During the 12 months ended June 30, 2021, the cost of customer account services for NJAWC customers was $18.03, compared to the 2020 average of $44.44 for neighboring electric utilities.

Concerning question 4, the following conclusions were drawn:

- The services that the Service Company provides are necessary and required for a water and wastewater utility.

- There is no redundancy or overlap in the services provided by the Service Company to NJAWC. For all of the services provided (Exhibit 13), there was only one entity primarily responsible for the service.

II – Background

Overview of American Water Works Service Company

American Water's Service Company exists to provide certain shared services to American Water subsidiaries. It follows a service company model used by many utility holding companies that own multiple regulated utilities. By consolidating executive and professional services into a single service company, utility holding companies are able to realize the following benefits for customers:

- Purchasing Economies – Common expenses (e.g., insurance, chemicals, piping) can be procured on a much larger scale, thereby providing greater bargaining power for the combined entity compared to individual utility operating companies. A service company facilitates enterprise-wide purchasing programs through its procurement and contract administration functions.

- Operating Economies of Scale – A service company is able to deliver services more efficiently because workloads can be balanced across more persons and facilities. For instance, American Water's Service Company is able to maintain one principal data center for the entire organization. This is much more cost-efficient than each operating utility funding its own data center with large, fixed hardware, software and staffing costs.

- Continuity of Service – Centralizing service company personnel who perform similar services facilitates job cross-training and sharing of knowledge and expertise. This makes it easier to manage staff turnover and absences and to sustain high levels of service to operating utilities. An individual operating utility might experience considerable disruption if a key professional left and it were necessary to hire outside to fill the vacancy.

- Maintenance of Enterprise-Wide Standards – Personnel in American Water's Service Company establish standards for many functions (e.g., engineering designs, operating procedures and maintenance practices). It is easier to align operating utility operations because their implementation is supported by the Service Company.

- Improved Support and Guidance – American Water's Service Company provides another dimension of management and financial support and guidance that supplements local operating utility management. The Service Company facilitates standard planning and reporting, which helps ensure that operating utilities meet the requirements of their customers in a cost-effective manner.

- Retention of Personnel – A service company organization provides operating utility personnel with another career path beyond what may be available on a local level. These opportunities tend to improve employee retention.

American Water follows the model for other utility service companies in another important regard: its services are provided to affiliate operating utilities, like NJAWC, at cost. American Water's Service Company is not a profit-making entity. It assigns only its actual expenses to the American Water subsidiaries it services.

II – Background

The Service Company provides services to American Water operating companies from the following locations:

- One Water Street – Service Company employees at One Water Street provide corporate governance and service functions, including executive management, finance, accounting, audit, tax, regulatory, external affairs, engineering, supply chain, human resources and benefits services. One Water Street also includes American Water's main Information Technology (IT) Services center for employees, provides software delivery and enhancements and provides local on-site support as well as the IT Service Desk for remote assistance for all employees using personal computers in the performance of their day-to-day activities. Further, One Water Street supports mission-critical systems such as SCADA as well as emerging technologies such as geographic information systems and mobility. It provides technical expertise in project governance and release management while ensuring compliance with all governmental regulations.

- Central Lab – The national trace substance laboratory is located in Belleville, Illinois, and performs testing for all American Water operating companies.

- Customer Relations and Customer Service Centers – Provides customer relations and field resource coordination services from two locations: Belleville, Illinois, and Wilkes Barre, Pennsylvania, and provides customer communication, billing and collection services from various locations.

- Information Technology Services Center – The IT Services Center supports the technology infrastructure required to run business applications and communications systems for American Water's operating companies. American Water's primary data center is an IBM facility in Sterling Forest, New York.

- Haddon Heights IT Services Center – American Water's data center, located in Haddon Heights, New Jersey, maintains data servers for back-up and disaster recovery.

- Regional Support Services – Operating companies are provided with certain support services that are delivered more effectively on a regional basis because individual operating company workloads are not sufficient to warrant maintaining their own full-time staff for these activities. These services require closer proximity to operating companies and therefore are located closer to the operating companies the employees provide service to instead of one of the corporate locations.

Service Company Accounting

Service Company maintains an accounting ledger for recording transactions (e.g., labor, expenses, overhead, capital and other assets, liabilities and equity) in a Service Company ledger separate from affiliates' ledgers. Monthly financial statements are prepared that summarize month-to-date and year-to-date costs, budgets and prior year, with variances and explanations, by category and function. Accounting categories by transaction type are described below:

- Service Company Labor: The Service Company utilizes a system that tracks time and attendance. Employees electronically enter hours worked (including vacation, sick, family leave, etc.) and accounting information (e.g., business unit; formula; pay type) and electronically submit the timesheet for approval. Submitted timesheets are electronically routed to authorized approvers. Time sheets require approval (of hours and accounting information such as formulas, etc.) by an authorized timesheet approver in the employee's home business unit.

- Service Company Expenses: Expenditures (i.e., standard invoices, purchase orders, electronic disbursements, miscellaneous invoices, recurring invoices, recurring vouchers, and procurement cards) and journal entries require a preparer to enter accounting coding details (e.g., cost center, cost element and Work Breakdown Structure (WBS)) and a reviewer to approve the information in accordance with the corporate Delegation of Authority Policy. Expenditures are processed electronically and are automatically routed to the employee's supervisor for approval. Costs are posted many times daily, in detail, in the business unit selected. Journal entries are submitted as prepared to the appropriate reviewer and posted as approved.

- Service Company Assets: Service Company assets are procured directly by Service Company or through a capital leasing arrangement with Laurel Oak Properties (LOP). Service Company capitalizes these LOP leases as Non-Utility Plant assets in accordance with generally accepted accounting principles. Generally speaking, Service Company assets (including hardware, servers, laptops, desktops, servers, storage racks, furniture, laboratory and test equipment, security cameras, monitors and leasehold improvements) are acquired through LOP via a capital lease. LOP, on behalf of the Service Company, will acquire the necessary materials and services to build the assets that are needed for the Service Company to meet its business needs. One Water Street (OWS), which owns the Camden headquarters, is providing furniture, fixtures and office-related equipment for the first 7 years of the lease with the Service Company.

- Service Company Overhead: Costs for support personnel (e.g., administrative assistants, mailroom clerks), rents, facility expenses, pension, medical insurance, taxes, general office supplies and other similar expenses are recorded in the ledger of the cost center responsible for incurring the charge. Overhead expenditures are posted using the labor and expense processes noted above, and are recorded, in detail, in the ledger of the cost center responsible for the charge, using an overhead WBS.

Service Company Billing and Clearing

Service Company has developed a billing system that charges directly or allocates costs for services provided to Affiliates. Service Company billing is processed monthly and includes all Service Company costs charged to Affiliates using the WBS element selected for each transaction.

- WBS element: Every Service Company transaction (vouchers, journal entries, payroll batch, etc.) requires a WBS element within the account coding string. Each WBS element is configured in SAP with the following: Affiliate(s) to be charged, percent of charge to be billed to each Affiliate (total must equal 100%), receiving object (e.g., Affiliate's cost center) for O&M costs or an Affiliate's WBS element for capital expenditures (CAPEX). WBS elements are configured in SAP with an end date (month/year) to prevent transactions from using an expired WBS during data input.

- Affiliate Billing Process: Service Company billing is a two-step process that first calculates allocations of transactions for all non-overhead WBS elements. The second step calculates overhead transaction allocations using the ratio of direct labor (Cost Element 5012000) allocations to Affiliates from the first step above multiplied by the pool of overhead expenses by physical location.

- Bill Clearing Process: Service Company billings are cleared through American Water Capital Corp., (an affiliate) monthly via an intercompany journal entry to GL Account 23120000 (Notes Payable – Associated Companies) posted on the last day of the month. Payments are estimated for each Affiliate using the prior month actual billing (current month

estimate) with adjustment for prior month actual to estimate (previous month funding) true-up.

III – Service Company Cost Comparison Approach

Service Company Charges

During the 12 months ended June 30, 2021, the Service Company billed NJAWC a total of approximately $69.8 million, as shown in the table below. These charges were subjected to a market-to-cost-comparison.

	12 Months Ended June 30, 2021
Support Services - O&M	$ 55,515,700
Support Services - Capital	$ 14,234,489
Total Service Company Charges	$ 69,750,189

For purposes of comparing these charges to certain outside benchmarks, Service Company services were placed into three categories:

- Managerial and Professional Services – Includes such services as management, accounting, legal, human resources, engineering and information technology.
- Customer Account Services – Includes customer-related services, such as call center, credit, billing, collection and payment processing.
- Field Resource Coordination Services – Includes tracking and dispatching service orders for field representatives and distribution crews to carry out.

Total 12 months ended June 30, 2021 Service Company dollar and hour charges break down between management and professional services and customer account services as follows:

	12 Months Ended June 30 2021	
	Charges	Hours
Management and Professional Services	$ 58,518,652	286,525
Customer Account Services	$ 10,003,906	101,582
Field Resource Coordination Services	$ 1,227,630	25,370
Total Service Company Charges	$ 69,750,189	413,477

Service Company Cost Comparison Approach

This Study's first question—whether the Service Company A&G charges during the 12 months ended June 30, 2021, were reasonable—was determined by comparing NJAWC's A&G-related Service Company charges per regulated retail customer to the same charges for utility companies that must file the Federal Energy Regulatory Commission (FERC) Form 60 – Annual Report of Service Companies.

The second question—how the Service Company charges during the 12 months ended June 30, 2021, provided value to NJAWC—was evaluated by comparing the cost per hour for managerial and professional services provided by Service Company personnel to hourly billing rates that would be charged by outside providers of equivalent services. Service Company costs per hour were based on actual charges to NJAWC during the 12 months ended June 30, 2021. Outside providers' billing rates came from surveys or other information from professionals who could perform the services now provided by the Service Company.

The third question—whether Service Company's 12 months ended June 30, 2021 customer account services charges were comparable to other utilities—was addressed by comparing NJAWC's customer account services expenses to those of investor-owned electric utilities. This

utility comparison group was selected because the cost of outside providers of customer account services is proprietary and not publicly available. Comparison to electric utilities is appropriate because all utilities, regardless of service type, must perform customer account services activities, including updating customer records for meter reads, printing and mailing bills, and collecting and processing customer payments. Electric utility costs are available from the FERC Form 1; thus, there is appropriate data transparency. The selection of electric utilities from New Jersey and neighboring states provides a sufficiently sized comparison group.

The fourth question—the necessity of Service Company services—was investigated by defining the services provided to NJAWC and determining if these services would be required if NJAWC were not part of the American Water organization.

IV – Question 1 – Reasonableness of Service Company Charges

Methodology

Utility service companies deliver a variety of services. Some may support their regulated utility affiliate's operations-related functions (e.g., transmission, distribution). All utility service companies, however, provide A&G services to their affiliates. This is the case because considerable economies of scale derive from centralizing the management of corporate A&G services such as finance, human resources and information technology. Because A&G-related services are delivered by all utility service companies, this study uses A&G charges per customer as the metric by which to test the reasonableness of affiliate charges.

NJAWC's Service Company A&G Cost per Customer

During the 12 months ended June 30, 2021, NJAWC was charged $72 per customer by the Service Company for A&G-related services. The calculation of this amount, shown in the table below, starts with total Service Company charges and adjusts for capital and non-A&G function (e.g., engineering, operations and water quality) charges. These adjustments are necessary to develop a per-customer cost that can be compared to the cost of the utility service company comparison group.

	12 Months Ended June 30, 2021
Total Service Company charges	$ 69,750,189
Less: Capital charges	$ (14,234,489)
Less: Non-A&G charges	
Engineering	$ (576,811)
Operations	$ (2,312,330)
Water Quality	$ (952,265)
Net A&G Service Company Charges	$ 51,674,295
NJAWC Customer Count	716,061
NJAWC A&G SC Charges per Customer	$ 72

Comparison Group A&G Cost Per Customer

Every centralized service company in a holding company system subject to regulation by the FERC must file a Form 60 in accordance with the Public Utility Holding Company Act of 2005, Section 1270, Section 390 of the Federal Power Act, and 18 Code of Federal Regulations paragraph 366.23. The Form 60 is designed to collect financial information from service companies within a holding company structure.

Charges to utility affiliates for the comparison group service companies were obtained from Schedule XVI – Analysis of Charges for Service Associate and Non-Associate Companies (p. 303 to 306) of each entity's FERC Form 60. Information from Form 60 schedule Account 457 – Analysis of Billing – Associate Companies was also used to isolate and eliminate charges to non-regulated affiliates from the cost pool used to calculate A&G expenses per regulated service customer.

For 2020, a Form 60 was filed by service companies associated with 22 utility holding companies. These service companies support utilities that provide regulated electric and, in some cases, gas service to retail customers.

IV – Question 1 – Reasonableness of Service Company Charges

FERC Form 60 shows service company charges to affiliates by FERC account. The table below shows a list of FERC A&G accounts and designates which correspond to services the Service Company provides to NJAWC. Amounts in the designated FERC accounts are included in the calculation of service company A&G expenses per regulated customer.

FERC Account	Included In Cost Calculation
901 - Supervision	X
902 - Meter reading expenses	
903 - Customer records and collection expenses	X
904 - Uncollectible accounts	
905 - Miscellaneous customer accounts expenses	X
907 - Supervision	
908 - Customer assistance expenses	
909 - Informational And Instructional Advertising Expenses	
910 - Miscellaneous Customer Service And Informational Exp	X
911 - Supervision	
912 - Demonstrating and Selling Expenses	
913 - Advertising Expenses	
916 - Miscellaneous Sales Expenses	
920 - Administrative and General Salaries	X
921 - Office Supplies and Expenses	X
923 - Outside Services Employed	X
924 - Property Insurance	X
925 - Injuries and Damages	
926 - Employee Pensions and Benefits	X
928 - Regulatory Commission Expenses	
930.1 - General Advertising Expenses	
930.2 - Miscellaneous General Expenses	X
931 - Rents	X
935 - Maintenance of Structures and Equipment	X

The A&G expenses per regulated utility customer for the 22 utility companies whose service companies filed a Form 60 for 2020 are calculated in Exhibit 1 (page 11).

Exhibit 2 (page 12) shows NJAWC's 12 months ended June 30, 2021 Service Company cost per customer of $72 to be lower than the average of $115 per customer for the comparison group service companies. Seventeen of the 22 comparison group service companies had higher per-customer A&G costs than NJAWC's charges from the Service Company. Based on this result, it is possible to conclude that the Service Company's charges to NJAWC are reasonable.

Exhibit 1

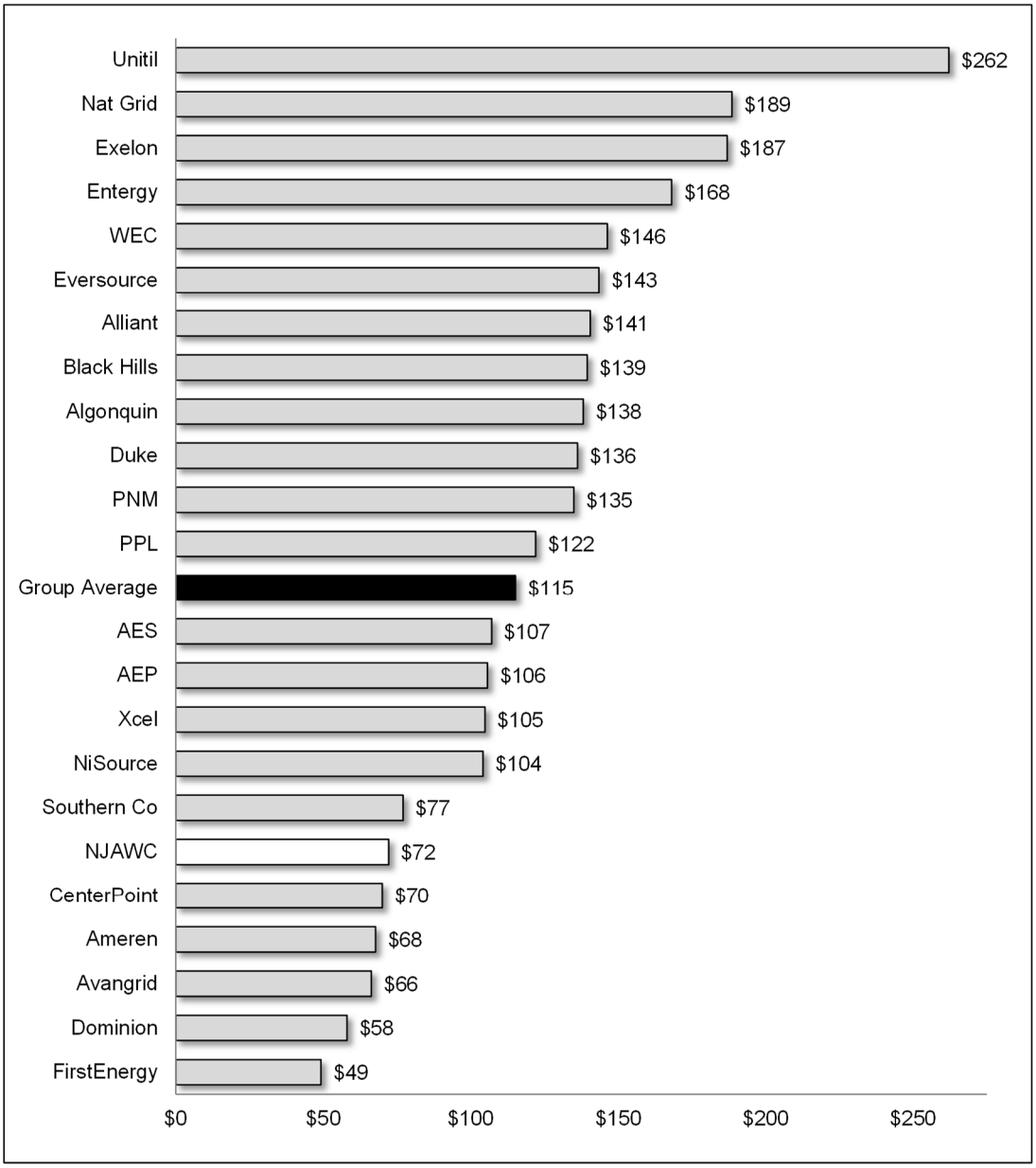
New Jersey American Water Company
Calculation of 2020 Service Company A&G Expenses Per Customer

Utility Company	2020 Regulated Retail Service Company A&G Expenses	Regulated Retail Customers	Cost per Customer
AEP	$581,431,806	5,500,000	$ 106
AES	$84,972,673	793,500	$ 107
Algonquin	$93,507,879	677,000	$ 138
Alliant	$195,356,017	1,390,000	$ 141
Ameren	$223,383,695	3,300,000	$ 68
Avangrid	$218,683,477	3,300,000	$ 66
Black Hills	$178,511,164	1,280,000	$ 139
CenterPoint	$519,740,566	7,427,500	$ 70
Dominion	$404,160,305	6,963,000	$ 58
Duke	$1,299,912,203	9,541,000	$ 136
Entergy	$538,366,404	3,202,000	$ 168
Eversource	$575,146,581	4,009,000	$ 143
Exelon	$1,869,988,049	10,000,000	$ 187
FirstEnergy	$295,447,481	6,000,000	$ 49
Nat Grid	$1,319,903,837	7,000,000	$ 189
NiSource	$371,616,218	3,569,000	$ 104
PNM	$107,797,415	798,700	$ 135
PPL	$329,504,996	2,700,000	$ 122
Southern Co	$665,433,317	8,630,000	$ 77
Unitil	$50,514,408	192,700	$ 262
WEC	$335,637,101	2,294,000	$ 146
Xcel	$597,442,792	5,700,000	$ 105
Total/Average	$10,856,458,384	94,267,400	$ 115

Source: FERC Form 60; Baryenbruch & Company, LLC, analysis

Exhibit 2

New Jersey American Water Company
Comparison of Service Company A&G Charges Per Customer



Source: Company information; 2020 FERC Form 60; Baryenbruch & Company, LLC, analysis

V – Question 2 – Provision of Services Compared to Market

Methodology

The value of services comparison is accomplished by comparing the cost per hour for Service Company managerial and professional services to those of outside service providers to whom these duties could be assigned. Based on the nature of the Service Company services, it was determined that the following outside providers could perform the categories of services indicated below:

- Management Consultants – executive and administrative management, risk management, human resources and communications services
- Attorneys – legal services
- Certified Public Accountants – accounting, financial and rates and revenues services
- IT Professionals – information technology services
- Professional Engineers – engineering, operations and water quality services.

Service Company's hourly rates were calculated for each of the five outside service provider categories, based on the dollars and hours charged to NJAWC during the 12 months ended June 30, 2021. Hourly billing rates for outside service providers were developed using third party surveys or directly from information furnished by outside providers themselves.

It should be noted that by using the Service Company's hours charged to NJAWC during the 12 months ended June 30, 2021, its hourly rates are actually overstated because some Service Company personnel charge a maximum of 8 hours per day even when they work more. Outside service providers generally bill for every hour worked. If all overtime hours of Service Company personnel had been factored into the hourly rate calculation, Service Company hourly rates would have been lower.

The last step in the market comparison was to compare the Service Company's average cost per hour to the average cost per hour for outside providers.

Service Company Hourly Rates

Exhibit 3 (page 15) details the assignment of 12 months ended June 30, 2021 management and professional Service Company charges by outsider provider category. Exhibit 4 (page 16) shows the same assignment for Service Company management and professional hours charged to NJAWC during the 12 months ended June 30, 2021.

Adjustments to these dollar amounts were necessary to calculate Service Company hourly rates that are directly comparable to those of outside providers. Adjustments were made to the following non-labor Service Company charges for the 12 months ended June 30, 2021:

- Contract Services – The 12 months ended June 30, 2021 Service Company charges to NJAWC include expenses associated with the use of outside professional firms to perform certain enterprise-wide services (e.g., legal, financial audit, actuarial services). These professional fees are excluded from the Service Company hourly rate calculation because the related services have effectively been out-sourced already.
- IT Infrastructure Expenses – Included in the 12 months ended June 30, 2021 Service Company charges to NJAWC are leases, maintenance fees and depreciation related to American Water's enterprise computing and network infrastructure and business applications. An outside provider that would take over operation of this infrastructure

V – Question 2 – Provision of Services Compared to Market

would recover these expenses over and above the cost of personnel necessary to operate the data center.

- Travel Expenses – In general, client-related travel expenses incurred by outside service providers are not recovered through their hourly billing rates. Rather, actual out-of-pocket travel expenses are billed to clients in addition to fees for professional services. Thus, it is appropriate to remove these Service Company charges from the hourly rate calculation.
- Other Expenses – These are not related to the provision of services by Service Company personnel and have been excluded.

Exhibit 5 (page 17) shows how contract services, travel expenses, IT infrastructure and other Service Company charges are assigned to the four outside provider categories.

Based on the assignment of expenses and hours shown in Exhibits 3 and 4 and the excludable items shown in Exhibit 5, the Service Company's equivalent costs per hour for the 12 months ended June 30, 2021, are calculated below.

	Attorney	Management Consultant	Certified Public Accountant	IT Professional	Professional Engineer	Total
Total management, professional & technical services charges	$ 1,539,267	$ 19,055,520	$ 10,613,991	$ 22,806,784	$ 4,503,090	$ 58,518,652
Less: Exclusions						
Contract services	$ 49,460	$ 1,301,309	$ 1,294,691	$ 9,675,734	$ 157,744	$ 12,478,938
IT infrastructure expenses	$ -	$ 3,438,637	$ -	$ 2,360,254	$ -	$ 5,798,891
Travel expenses	$ 10,760	$ 219,121	$ 221,659	$ 115,269	$ 360,453	$ 927,262
Other expenses	$ 237,627	$ 303,704	$ 458,266	$ 1,817,483	$ 371,618	$ 3,188,699
Total Exclusions	$ 297,847	$ 5,262,771	$ 1,974,616	$ 13,968,741	$ 889,816	$ 22,393,790
Net Service-Related Charges (A)	$ 1,241,421	$ 13,792,749	$ 8,639,375	$ 8,838,043	$ 3,613,274	$ 36,124,862
Total Hours (B)	4,980	84,994	83,094	79,208	34,248	286,525
Average Hourly Rate (A / B)	**$ 249**	**$ 162**	**$ 104**	**$ 112**	**$ 106**	

New Jersey American Water Company

Exhibit 3

12 Months Ended June 30, 2021 Service Company Charges by Location and Function

Location	Function	12 Months Ended June 30, 2021 Service Company Charges					
		Attorney	Management Consultant	Certified Public Accountant	IT Professional	Professional Engineer	Total
Belleville Lab	Water Quality	$ -	$ -	$ -	$ -	$ 952,265	$ 952,265
Call Centers	Human Resources	$ -	$ 798	$ -	$ -	$ -	$ 798
Corporate	Accounting	$ -	$ -	$ 3,735,620	$ -	$ -	$ 3,735,620
	Administration	$ -	$ 7,974,728	$ -	$ -	$ -	$ 7,974,728
	Audit	$ -	$ -	$ 656,348	$ -	$ -	$ 656,348
	Business Development	$ -	$ 483,993	$ -	$ -	$ -	$ 483,993
	Communications	$ -	$ 1,069,471	$ -	$ -	$ -	$ 1,069,471
	Engineering	$ -	$ -	$ -	$ -	$ 3,550,614	$ 3,550,614
	External Affairs	$ -	$ 149,444	$ -	$ -	$ -	$ 149,444
	Finance	$ -	$ 719,164	$ 3,267,523	$ -	$ -	$ 3,986,687
	Human Resources	$ -	$ 3,500,484	$ -	$ -	$ -	$ 3,500,484
	Information Technology	$ -	$ -	$ -	$ 732,493	$ -	$ 732,493
	Legal	$ 589,968	$ -	$ -	$ -	$ -	$ 589,968
	Operations	$ -	$ 1,214,352	$ -	$ -	$ -	$ 1,214,352
	Supply Chain	$ -	$ -	$ 1,907,655	$ -	$ -	$ 1,907,655
Regional Offices	Administration	$ -	$ 3,013,203	$ -	$ -	$ -	$ 3,013,203
	Business Development	$ -	$ 584,168	$ -	$ -	$ -	$ 584,168
	Engineering	$ -	$ -	$ -	$ -	$ 211	$ 211
	External Affairs	$ -	$ 251,502	$ -	$ -	$ -	$ 251,502
	Finance	$ -	$ -	$ 518,481	$ -	$ -	$ 518,481
	Human Resources	$ -	$ 1,346	$ -	$ -	$ -	$ 1,346
	Legal	$ 949,299	$ -	$ -	$ -	$ -	$ 949,299
	Operations	$ -	$ 193,221	$ -	$ -	$ -	$ 193,221
	Rates & Regulatory	$ -	$ -	$ 528,363	$ -	$ -	$ 528,363
Tech & Innovation	Information Technology	$ -	-$ 100,353	$ -	$ 22,074,291	$ -	$ 21,973,938
Total Dollars Charged		**$ 1,539,267**	**$ 19,055,520**	**$ 10,613,991**	**$ 22,806,784**	**$ 4,503,090**	**$ 58,518,652**

Exhibit 4

New Jersey American Water Company
12 Months Ended June 30, 2021 Service Company Hours by Location and Function

Location	Function	12 Months Ended June 30, 2021 Service Company Hours					
		Attorney	Management Consultant	Certified Public Accountant	IT Professional	Professional Engineer	Total
Belleville Lab	Water Quality	-	-	-	-	7,866	7,866
Call Centers	Human Resources	-	-	-	-	-	-
Corporate	Accounting	-	-	36,599	-	-	36,599
	Administration	-	10,997	-	-	-	10,997
	Audit	-	-	3,032	-	-	3,032
	Business Development	-	1,982	-	-	-	1,982
	Communications	-	5,839	-	-	-	5,839
	Engineering	-	-	-	-	26,382	26,382
	External Affairs	-	480	-	-	-	480
	Finance	-	2,173	16,618	-	-	18,790
	Human Resources	-	27,793	-	-	-	27,793
	Information Technology	-	-	-	6,875	-	6,875
	Legal	1,291	-	-	-	-	1,291
	Operations	-	6,713	-	-	-	6,713
	Supply Chain	-	-	18,804	-	-	18,804
Regional Offices	Administration	-	20,442	-	-	-	20,442
	Business Development	-	5,255	-	-	-	5,255
	Engineering	-	-	-	-	-	-
	External Affairs	-	1,969	-	-	-	1,969
	Finance	-	-	4,734	-	-	4,734
	Human Resources	-	-	-	-	-	-
	Legal	3,689	-	-	-	-	3,689
	Operations	-	1,363	-	-	-	1,363
	Rates & Regulatory	-	-	3,307	-	-	3,307
Tech & Innovation	Information Technology	-	(11)	-	72,333	-	72,322
Total Hours Charged		**4,980**	**84,994**	**83,094**	**79,208**	**34,248**	**286,525**

Exhibit 5

New Jersey American Water Company
12 Months Ended June 30, 2021 Service Company Charges Excludable from the Hourly Rate Calculation

Charges By Function	Exclusions From Hourly Rate Calculation: Contract Services	Enterprise IT Expenses	Travel Expenses	Other Expenses	Total
Accounting	$ 443,136	$ -	$ 66,630	$ (241,250)	$ 268,516
Administration	$ 678,066	$ 3,438,638	$ 102,104	$ 209,298	$ 4,428,105
Audit	$ 280,902		$ 5,982	$ 1,551	$ 288,435
Business Development	$ 4,073	$ (1)	$ 38,110	$ 18,022	$ 60,205
Communications	$ 171,392		$ 16,342	$ 45,119	$ 232,854
Engineering	$ 210,307	$ -	$ 57,027	$ 176,396	$ 443,730
External Affairs	$ 106		$ 9,262	$ 1,470	$ 10,838
Finance	$ 533,882		$ 99,130	$ 548,647	$ 1,181,659
Human Resources	$ 447,671		$ 53,302	$ 29,796	$ 530,770
Information Technology	$ 9,675,734	$ 2,360,254	$ 115,269	$ 1,817,483	$ 13,968,741
Legal	$ 49,460		$ 10,760	$ 237,627	$ 297,847
Operations	$ 47,483	$ -	$ 22,215	$ 30,900	$ 100,598
Rates & Regulatory			$ 14,370	$ 197	$ 14,567
Supply Chain	$ 36,771		$ 35,546	$ 149,122	$ 221,439
Water Quality	$ (100,045)	$ -	$ 281,211	$ 164,322	$ 345,488
Total	**$ 12,478,938**	**$ 5,798,891**	**$ 927,262**	**$ 3,188,699**	**$ 22,393,790**

Recap By Outside Provider	Exclusions From Hourly Rate Calculation: Contract Services	Enterprise IT Expenses	Travel Expenses	Other Expenses	Total
Attorney	$ 49,460	$ -	$ 10,760	$ 237,627	$ 297,847
Management Consultant	$ 1,301,309	$ 3,438,637	$ 219,121	$ 303,704	$ 5,262,771
Certified Public Accountant	$ 1,294,691	$ -	$ 221,659	$ 458,266	$ 1,974,616
IT Professional	$ 9,675,734	$ 2,360,254	$ 115,269	$ 1,817,483	$ 13,968,741
Professional Engineer	$ 157,744	$ -	$ 360,453	$ 371,618	$ 889,816
Total	**$ 12,478,938**	**$ 5,798,891**	**$ 927,262**	**$ 3,188,699**	**$ 22,393,790**

Outside Service Provider Hourly Rates

The next step in the market comparison was to obtain the average billing rates for outside service providers. The source of this information and the determination of the average rates are described in the paragraphs that follow.

It should be noted that professionals working for three of the five outside provider categories may be licensed to practice by state regulatory bodies. However, not every professional working for these firms is licensed. For instance, among US certified public accounting firms, only more experienced staff are predominantly CPAs (see table below). Some Service Company employees also have professional licenses. Thus, it is valid to compare the Service Company's hourly rates to those of the outside professional service providers included in this study.

Position	US Average
Partners/Owners	98%
Directors (11+ years experience)	87%
Managers (6-10 years experience)	79%
Sr Associates (4-5 years experience)	50%
Associates (1-3 years experience)	22%
New Professionals	10%

Source: AICPA's National PCPS/TSCPA Management of an Accounting Practice Survey (2010)

Attorneys

An estimate of New Jersey attorney rates was developed from National Law Journal's Survey of Law Firm Economics Report. As shown in Exhibit 6 (page 20), data from this survey has been adjusted for cost-of-living differences between each law firm's location and Camden, New Jersey. The National Law Review billing survey hourly rates data is for 2019. The survey's calculated average rate was escalated to December 31, 2020—the midpoint of the 12 months ended June 30, 2021.

Management Consultants

The cost per hour for management consultants was developed from a survey performed by Rodenhauser & Company LLC, a research company that monitors the consulting industry. The survey includes rates that were in effect during 2020 for firms throughout the United States. Consultants typically do not limit their practice to any one region and must travel to a client's location. Thus, the U.S. national average is appropriate for comparison.

The first step in the calculation, presented in Exhibit 7 (page 21), was to determine an average rate by consultant position level. From these rates, a single weighted average hourly rate was calculated based upon the percent of time that is typically applied to a consulting assignment by each consultant position level. This survey covered hourly rates in effect during 2020.

V – Question 2 – Provision of Services Compared to Market

Certified Public Accountants

The average hourly rate for New Jersey CPAs was developed from a 2018 survey performed by the American Institute of Certified Public Accountants (AICPA). The New Jersey version of this survey was used to develop hourly rates for member firms in New Jersey.

As shown in Exhibit 8 (page 22), a weighted average hourly rate was developed based on a set of accountant positions and a percent of time that is typically applied to an accounting assignment. This survey includes rate information in effect during 2017. (Note: the survey was originally scheduled to be performed during 2020 but was deferred due to the impact of COVID.) The calculated average rate was escalated to December 31, 2020—the midpoint of the 12 months ended June 30, 2021.

Information Technology Professionals

The 2020 average hourly rate for information technology consultants and contractors was developed from two sources: The Service Company for IT contractor rates and a survey performed by Rodenhauser & Company, LLC, for IT consultants. As shown in Exhibit 9 (page 23), that data was compiled and a weighted average was calculated based on a percent of time that is typically applied to an IT consulting assignment, based on Baryenbruch & Company, LLC's, experience.

Professional Engineers

The Company provided hourly rate information for outside engineering firms that provided NJAWC with their rate schedules. As presented in Exhibit 10 (page 24), an average rate was developed for each engineering position level. Then, using the Service Company's percentage mix by engineering position, a weighted average cost per hour was calculated.

Exhibit 6

New Jersey American Water Company
Estimated Billing Rates for New Jersey Attorneys

Average Hourly Billing Rates as of January 1, 2020

Region	Avg Billing Rates (Note A) Partner	Avg Billing Rates (Note A) Associate	Weighted Avg Rate Calculation 0.25 Partner	Weighted Avg Rate Calculation 0.75 Associate	(X) Weighted Average	Cost of Living (COL) Adjustment COL Indices (Note B) Region	Camden, NJ	(Y) COL Adjustment	(X x Y) Adjusted Rate
Northeast	$ 478	$ 303	$ 119	$ 227	$ 346	121.1	121.2	100.1%	$ 347
Midwest	$ 378	$ 250	$ 94	$ 188	$ 282	94.0	121.2	129.0%	$ 364
South	$ 470	$ 325	$ 118	$ 244	$ 361	94.1	121.2	128.8%	$ 465
West	$ 325	$ 250	$ 81	$ 188	$ 269	108.4	121.2	111.8%	$ 301
								Overall Average Hourly Billing Rate	$ 369
								Escalation to Midpoint of 12 Months Ended June 30, 2021 (December 31, 2020)	
								CPI at December 31, 2019	257.0
								CPI at December 31, 2020	260.5
								Inflation/Escalation (Note C)	1.4%
								Average Hourly Billing Rate For Attorneys At December 31, 2020	$ 374

Note A: 2020 Survey of Law Firm Economics Report, National Law Journal
Note B: Cost of Living Index, Source Council for Community and Economic Research
Note C: U.S. Bureau of Labor Statistics (http://data.bls.gov/cgi-bin/surveymost)

Exhibit 7

New Jersey American Water Company
Billing Rates of U.S. Management Consultants

Survey billing rates in effect in 2020 (Note A)

A. Calculation of Average Hourly Billing Rate by Consultant Position

	Average Hourly Rates (Note A)				
	Analyst Consultant	Associate	Sr. Assoc/ Manager	Principal	Partner
Average	$ 227	$ 273	$ 334	$ 515	$ 641

B. Calculation of Overall Average Hourly Billing Rate Based on a Typical Distribution of Time on an Engagement

	Entry-Level Consultant	Associate Consultant	Senior Consultant	Junior Partner	Senior Partner	
Average Hourly Billing Rate (from above)	$ 227	$ 273	$ 334	$ 515	$ 641	
Percent of Consulting Assignment	30%	30%	25%	10%	5%	Weighted Average
	$ 68	$ 82	$ 84	$ 52	$ 32	$ 317

Average Hourly Billing Rate for Management Consultants During 2020 $ 317

Note A: Source is Rodenhauser & Company LLC; Baryenbruch & Company, LLC, analysis

Exhibit 8

New Jersey American Water Company
Billing Rates of New Jersey Certified Public Accountants

A. Calculation of Average Hourly Billing Rate by Public Accounting Position
Survey billing rates were those in effect in 2017 (Note A)

	Average Hourly Billing Rate (Note A)				
	Staff Accountant	Senior Accountant	Manager	Partner	
Average Hourly Billing Rate by CPA Firm Position	$ 117	$ 152	$ 203	$ 259	
Percent of Accounting Assignment	30%	30%	20%	20%	Weighted Average
	$ 35	$ 45	$ 41	$ 52	$ 173

Escalation to Midpoint of 12 Months Ended June 30, 2021 (December 31, 2020)

CPI at December 31, 2017	246.5
CPI at December 31, 2020	260.5
Inflation/Escalation (Note B)	5.7%
Average Hourly Billing Rate For New Jersey CPAs At December 31, 2020	$ 183

Note A: Source is AICPA's 2018 National PCPS/TSCPA Management of an Accounting Practice Survey (New Jersey edition)
Note B: Source is U.S. Bureau of Labor Statistics (https://data.bls.gov/cgi-bin/surveymost)

Exhibit 9

New Jersey American Water Company
Billing Rates of Technology and Innovation Professionals

A. Calculation of Average Hourly Billing Rate by Information Technology Position
Survey billing rates were those in effect in 2020 (Note A)

	Average Hourly Billing Rate (Note A)					
	Contractor Positions		Consultant Positions			
	Contractor	Senior Contractor	Associate	Manager	Partner	
Average Hourly Billing Rate by IT Position Category	$ 87	$ 114	$ 252	$ 353	$ 478	
Percent of IT Assignment	25%	25%	25%	15%	10%	Weighted Average
	$ 22	$ 29	$ 63	$ 53	$ 48	$ 214

Average Hourly Billing Rate For IT Professionals During 2020 $ 214

Note A: Source is American Water Works Service Company, Rodenhauser & Company and Baryenbruch & Company, LLC

Exhibit 10

New Jersey American Water Company
Billing Rates of New Jersey Engineers

A. Calculation of Average 2020 Hourly Rate by Engineer Position (Note A)

	Average Hourly Billing Rates			
	Technician	Engineer Design Engineer	Project Manager	Officer
Name of Firm	Senior Technician	Project Engineer	Sr. Mgr. Engineer	Principal Engineer
Firm #1	$99	$111	$184	$236
Firm #2	$150	$126	$249	$390
Firm #3	$148	$172	$262	$346
Firm #4	$96	$131	$200	$265
Firm #5	$78	$94	$167	$210
Firm #6	$176	$238	$309	$325
Firm #7	$87	$126	$210	$257
Firm #8	$87	$121	$174	$203
Firm #9	$115	$166	$190	$243
Firm #10	$123	$133	$169	$215
Firm #11	$101	$108	$161	$201
Firm #12	$128	$158	$244	$315
Firm #13	$125	$126	$183	$210
Firm #14	$113	$108	$161	$201
Firm #15	$90	$112	$179	$217
Firm #16	$110	$111	$175	$220
Firm #17	$60	$120	na	na
Firm #18	$98	na	$155	$185
Firm #19	$129	$127	$195	$275
Firm #20	$108	$124	$204	$230
Firm #21	$90	na	$170	$300
Firm #22	$98	$130	$170	$240
Firm #23	$117	$115	$171	$200
Firm #24	$158	$175	$251	$310

B. Calculation of Overall Average Engineering Hourly Billing Rate

	Technician	Engineer Design Engineer	Project Manager	Officer	
	Senior Technician	Project Engineer	Sr. Mgr. Engineer	Principal Engineer	
Average Hourly Billing Rate (From Above)	$112	$133	$197	$252	
Typical Percent of Time on an Engineering Assignment	13%	31%	46%	10%	Weighted Average
	$15	$41	$90	$26	$172

Note A: Source is American Water Works Service Company information.

V – Question 2 – Provision of Services Compared to Market

Service Company versus Outside Provider Cost Comparison

As shown in the table below, Service Company costs per hour are considerably lower than those of outside providers.

	12 Months Ended June 30, 2021		
Service Provider	Service Company	Outside Provider	Difference-- Service Co. Greater(Less) Than Outside
Attorney	$ 249	$ 374	$ (125)
Management Consultant	$ 162	$ 317	$ (155)
Certified Public Accountant	$ 104	$ 183	$ (79)
IT Professional	$ 112	$ 214	$ (102)
Professional Engineer	$ 106	$ 172	$ (66)

Based on these cost-per-hour differentials and the number of managerial and professional services hours billed to NJAWC during the 12 months ended June 30, 2021, outside service providers would have cost $30,700,580 more than the Service Company (see table below). Thus, on average, outside providers' hourly rates are 85% higher than those of the Service Company ($30,700,580 / $36,124,862).

	12 Months Ended June 30, 2021		
Service Provider	Hourly Rate Difference-- Service Co. Greater(Less) Than Outside	Service Company Hours Charged	Dollar Difference
Attorney	$ (125)	4,980	$ (622,500)
Management Consultant	$ (155)	84,994	$ (13,174,070)
Certified Public Accountant	$ (79)	83,094	$ (6,564,426)
IT Professional	$ (102)	79,208	$ (8,079,216)
Professional Engineer	$ (66)	34,248	$ (2,260,368)
Service Company Less Than Outside Providers			$ (30,700,580)

It should be noted that the cost differential associated with using outside providers is even greater than that calculated above because exempt Service Company personnel do not charge more than 8 hours per day even when they work more. Outside providers generally charge clients for all hours worked. Thus, NJAWC would have been charged by outside providers for overtime worked by Service Company personnel who are not paid for that time.

If NJAWC were to use outside service providers rather than the Service Company for managerial and professional services, it would incur other additional expenses besides those associated with higher hourly rates. Managing outside firms who would perform approximately 286,500 hours of work (approximately 159 full-time equivalents at 1,800 "billable" hours per FTE per year) would add a significant workload to the existing NJAWC management team. Thus, it would be necessary for NJAWC to add at least five positions to supervise the outside firms and ensure they deliver quality and timely services. The individuals who would fill this position would need a good understanding of each profession being managed. These persons must also have management experience and the authority necessary to provide credibility with the outside firms. As calculated in the table below, the new positions would add $902,000 per year to NJAWC's personnel expenses.

V – Question 2 – Provision of Services Compared to Market

Cost of Adding 5 Professional Positions To NJAWC's Staff

	Total
New Position Salary	$ 110,000
Benefits (at 49%)	$ 53,900
Office Expenses (15%)	$ 16,500
Total Cost per Position	$ 180,400
Number of Positions Required	5
Total Cost of Added NJAWC Staff	$ 902,000

Thus, the total effect on NJAWC customers of contracting all services now provided by Service Company would be an increase in their costs of $31,602,580 ($30,700,580 + $902,000). Based on the results of this comparison, the Service Company charged NJAWC significantly lower costs than the Company would have been charged had it sourced such services from the competitive market during the 12 months ended June 30, 2021.

VI - Question 3 - Reasonableness of Customer Account Services Costs

Background

Customer account services involve the processes that occur from the time meter-read data is recorded in the customer information system through the printing and mailing of bills, concluding with the collection and processing of customer payments. Customer account services are accomplished by the following utility functions:

- Customer Call Center Operations – customer calls/contact, credit, order taking/disposition, bill collection efforts and outage calls
- Customer Call Center Maintenance – support of phone banks, voice recognition units, call center software applications and telecommunications
- Customer billing – bill printing, stuffing and mailing
- Remittance processing – processing customer payments received in the mail
- Bill payment centers – processing customer payments at locations where customers can pay their bills in person

Comparable electric utility cost information comes from the FERC Form 1 that each utility subject to FERC regulation must file. FERC's chart of accounts is defined in Chapter 18, Part 101 of the Code of Federal Regulations. FERC accounts that contain expenses related to customer account services are Account 903 Customer Accounts Expense – Records and Collection Expense and Account 905 Customer Accounts Expense – Miscellaneous Customer Accounts Expense. Exhibit 11 (page 28) provides FERC's definition of the type of expenses that should be recorded in these accounts.

In addition to the charges in these FERC accounts, labor-related overhead charged to the following FERC accounts must be added to the labor components of Accounts 903 and 905:

- Account 926 Employee Pension and Benefits
- Account 408 Taxes Other Than Income (employer's portion of FICA)

Comparison Group

Electric utilities included in the comparison group are shown in the table below. These are companies whose FERC Form 1 reports show amounts for accounts 903 and 905.

Customer Accounts Expenses Comparison Group

New York	Central Hudson Gas & Electric Corporation	Pennsylvania	Duquesne Light Company
	Consolidated Edison Company		Metropolitan Edison Company
	New York State Electric & Gas Corporation		PECO Energy Company
	Niagara Mohawk Power Corporation		Pennsylvania Electric Company
	Orange and Rockland Utilities, Inc		Pennsylvania Power Company
	Rochester Gas and Electric Corporation		PPL Electric Utilities Corporation
New Jersey	Atlantic City Electric Company		West Penn Power Company
	Jersey Central Power & Light Company	Delaware	Delmarva Power & Light Company
	Public Service Electric and Gas Company		
	Rockland Electric Company		

New Jersey American Water Company Exhibit 11
FERC Account Descriptions

903 – Customer Records and Collection Expenses

This account shall include the cost of labor, materials used and expenses incurred in work on customer applications, contracts, orders, credit investigations, billing and accounting, collections and complaints.

Labor

1. Receiving, preparing, recording and handling routine orders for service, disconnections, transfers or meter tests initiated by the customer, excluding the cost of carrying out such orders, which is chargeable to the account appropriate for the work called for by such orders.
2. Investigations of customers' credit and keeping of records pertaining thereto, including records of uncollectible accounts written off.
3. Receiving, refunding or applying customer deposits and maintaining customer deposit, line extension, and other miscellaneous records.
4. Checking consumption shown by meter readers' reports where incidental to preparation of billing data.
5. Preparing address plates and addressing bills and delinquent notices.
6. Preparing billing data.
7. Operating billing and bookkeeping machines.
8. Verifying billing records with contracts or rate schedules.
9. Preparing bills for delivery, and mailing or delivering bills.
10. Collecting revenues, including collection from prepayment meters unless incidental to meter reading operations.
11. Balancing collections, preparing collections for deposit, and preparing cash reports.
12. Posting collections and other credits or charges to customer accounts and extending unpaid balances.
13. Balancing customer accounts and controls.
14. Preparing, mailing, or delivering delinquent notices and preparing reports of delinquent accounts.
15. Final meter reading of delinquent accounts when done by collectors incidental to regular activities.
16. Disconnecting and reconnecting services because of nonpayment of bills.
17. Receiving, recording, and handling of inquiries, complaints, and requests for investigations from customers, including preparation of necessary orders, but excluding the cost of carrying out such orders, which is chargeable to the account appropriate for the work called for by such orders.
18. Statistical and tabulating work on customer accounts and revenues, but not including special analyses for sales department, rate department, or other general purposes, unless incidental to regular customer accounting routines.
19. Preparing and periodically rewriting meter reading sheets.
20. Determining consumption and computing estimated or average consumption when performed by employees other than those engaged in reading meters.

Materials and expenses

21. Address plates and supplies.
22. Cash overages and shortages.
23. Commissions or fees to others for collecting.
24. Payments to credit organizations for investigations and reports.
25. Postage.
26. Transportation expenses, including transportation of customer bills and meter books under centralized billing procedure.
27. Transportation, meals, and incidental expenses.
28. Bank charges, exchange, and other fees for cashing and depositing customers' checks.
29. Forms for recording orders for services, removals, etc.
30. Rent of mechanical equipment.

905 – Miscellaneous Customer Accounts Expenses

This account shall include the cost of labor, materials used and expenses incurred not provided for in other accounts.

Labor

1. General clerical and stenographic work.
2. Miscellaneous labor.

Materials and expenses

3. Communication service.
4. Miscellaneous office supplies and expenses and stationery and printing other than those specifically provided for in accounts 902 and 903.

VI - Question 3 - Reasonableness of Customer Account Services Costs

NJAWC's Cost per Customer

As calculated below, NJAWC's customer account services expense per customer was $18.03 for the 12 months ended June 30, 2021. The cost pool used to calculate this average includes charges for Service Company services (e.g., call center, billing, payment processing) and postage and forms expenses, which are incurred directly by NJAWC. It is necessary to adjust the Service Company's charges because electric utilities experience an average of 1.25 calls per customer compared to American Water's 0.74 calls per customer during the 12 months ended June 30, 2021. Thus, the Service Company's expenses had to be increased, for comparison purposes, to reflect its costs if it had had 1.25 calls per customer.

New Jersey American Water Company, Inc.	Cost Component	Year Ended June 30, 2021 Service Co Charges	Adjustment Fewer Calls For Water Cos. (A)	Adjusted	
Service Company	Call processing, order processing, credit, bill collection, forms, postage	$ 9,925,223	$ 1,606,939	$ 11,532,162	
	Customer payment processing			$ 509,120	(B)
NJAWC	Customer Advocacy			$ 865,723	
			Cost Pool Total	$ 12,907,005	
			Total Customers	716,061	
	Year Ended June 30, 2021 Cost per New Jersey American Customer			**$ 18.03**	

Note A: Adjustment for American Water's fewer calls per customer
This adjustment is necessary because water utilities experience fewer calls per customer than do electric utilities

Call handling expenses		$ 2,365,990
Electric utility industry's avg calls/customer	1.25	
American Water's avg calls/customer	0.74	
Percent different	68%	68%
Total Adjustment		$ 1,606,939

Note B: Estimated customer payment processing expenses

Number of customer bills	8,485,340
Bank charge per item	$ 0.0600
Total estimated annual expense	$ 509,120

Electric Utility Group Cost per Customer

Exhibit 12 (page 30) shows the calculation of customer account expense per customer for 2020 for the electric utility comparison group. All of the underlying data was taken from the utilities' FERC Form 1.

Exhibit 12

New Jersey American Water Company
Comparison Group 2020 Customer Account Expense Per Customer

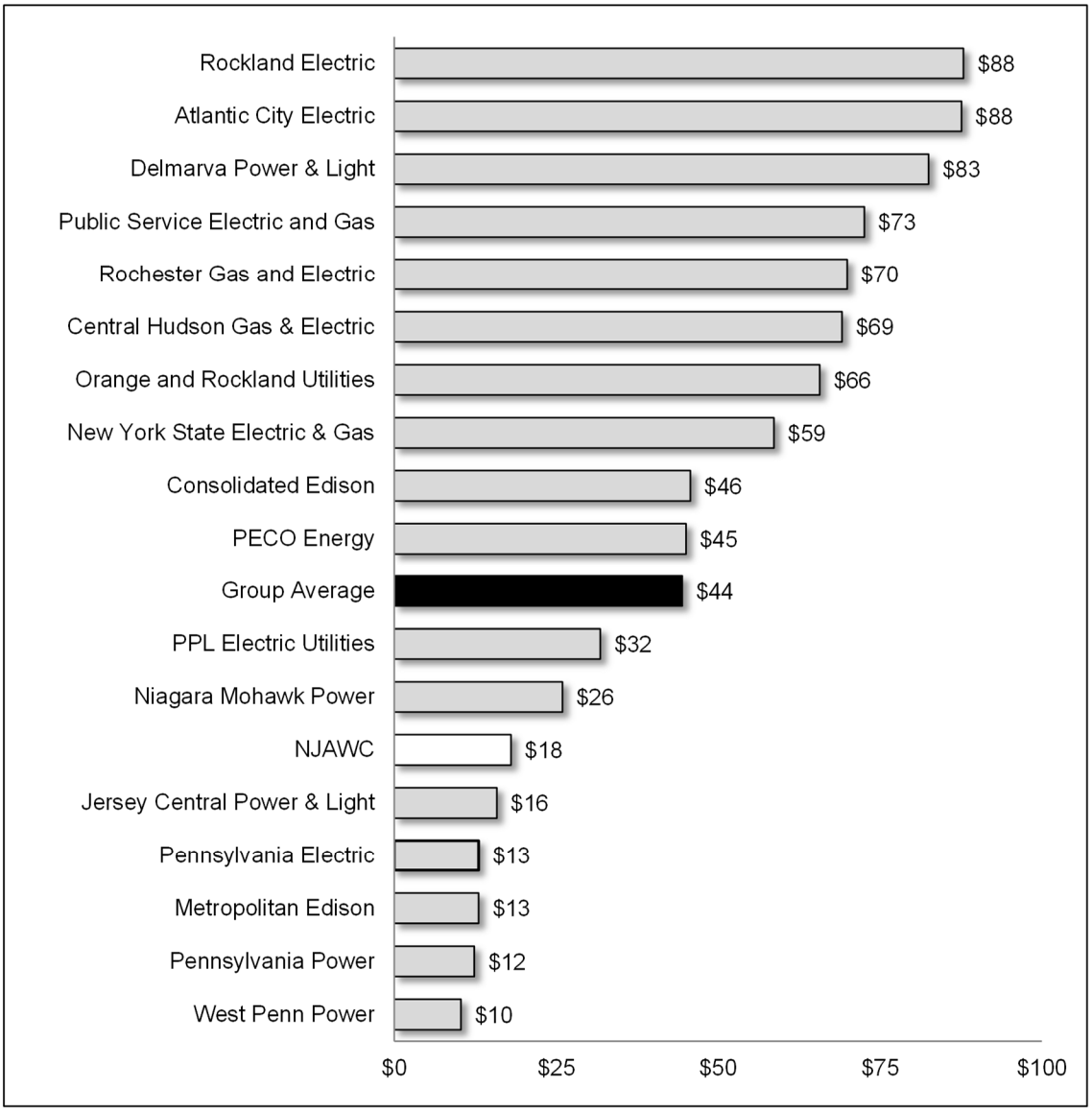
Comparison Group	Customer Accounts Services Cost Pool				Total Customers	Customer Account Services Expenses per Customer
		Employee Benefits				
	Account 903 and 905	Employee Pension and Benefits	Payroll Taxes	Total Cost Pool		
Atlantic City Electric Company	$ 48,933,026	$ 179,883	$ 104,686	$ 49,217,594	562,054	$ 87.57
Central Hudson Gas & Electric Corporation	$ 16,158,542	$ 276,255	$ 502,903	$ 16,937,700	244,943	$ 69.15
Consolidated Edison Company	$ 144,479,411	$ 9,501,046	$ 6,872,702	$ 160,853,159	3,517,291	$ 45.73
Delmarva Power & Light Company	$ 43,914,962	$ 103,820	$ 101,068	$ 44,119,850	534,749	$ 82.51
Jersey Central Power & Light Company	$ 15,450,652	$ 2,083,330	$ 598,487	$ 18,132,469	1,145,080	$ 15.84
Metropolitan Edison Company	$ 7,207,514	$ 235,563	$ 79,896	$ 7,522,973	577,500	$ 13.03
New York State Electric & Gas Corporation	$ 49,712,838	$ 2,027,754	$ 1,451,544	$ 53,192,136	907,336	$ 58.62
Niagara Mohawk Power Corporation	$ 34,345,450	$ 1,371,807	$ 1,190,498	$ 36,907,755	1,421,431	$ 25.97
Orange and Rockland Utilities, Inc	$ 13,496,713	$ 1,463,570	$ 582,276	$ 15,542,559	236,634	$ 65.68
PECO Energy Company	$ 70,883,132	$ 1,930,280	$ 2,463,572	$ 75,276,984	1,671,433	$ 45.04
Pennsylvania Electric Company	$ 7,398,437	$ 178,363	$ 85,565	$ 7,662,364	587,567	$ 13.04
Pennsylvania Power Company	$ 2,068,689	$ (15,774)	$ 26,225	$ 2,079,139	168,117	$ 12.37
PPL Electric Utilities Corporation	$ 42,367,848	$ 2,536,441	$ 1,472,728	$ 46,377,017	1,457,376	$ 31.82
Public Service Electric and Gas Company	$ 147,539,469	$ (3,572,346)	$ 3,670,184	$ 147,637,306	2,033,919	$ 72.59
Rochester Gas and Electric Corporation	$ 26,327,491	$ 363,581	$ 286,559	$ 26,977,631	385,873	$ 69.91
Rockland Electric Company	$ 5,451,171	$ 879,031	$ 178,531	$ 6,508,733	74,052	$ 87.89
West Penn Power Company	$ 7,433,384	$ 33,069	$ 57,608	$ 7,524,061	730,526	$ 10.30
Total/Average	$ 683,168,729	$ 19,575,673	$ 19,725,029	$ 722,469,432	16,255,881	$ 44.44

Source: FERC Form 1; Baryenbruch & Company, LLC, analysis

VI - Question 3 - Reasonableness of Customer Account Services Costs

Summary of Results

As shown in the table below, NJAWC's cost per customer is below the 2020 average cost of the utility comparison group. It can be concluded that NJAWC's 12 months ended June 30, 2021 total customer account expenses are comparable to those of other utilities.



Source: Company information; FERC Form 1; Baryenbruch & Company, LLC, analysis

VII - Question 4 – Need for Service Company Services

Analysis of Services

The final aspect of this Study is an assessment of whether the services provided to NJAWC by the Service Company would be necessary if NJAWC were not part of the American Water organization. The first step in this evaluation was to determine specifically what the Service Company does for NJAWC. Based on discussions with Service Company personnel, the matrix in Exhibit 13 (pages 33-35) was created showing which entity—NJAWC or a Service Company location—is responsible for each of the functions NJAWC requires to ultimately provide service to its customers. This matrix was reviewed to determine: (1) if there was redundancy or overlap in the services being provided by the Service Company and (2) if Service Company services are typical of those needed by a water and wastewater utility.

Upon review of Exhibit 13, the following conclusions can be drawn:

- The services that the Service Company provides are necessary and would be required even if NJAWC were not part of the American Water organization.

- There is no redundancy or overlap in the services provided by the Service Company to NJAWC. For all of the services listed in Exhibit 13, there was only one entity that was primarily responsible for the service.

Exhibit 13
Page 1 of 3

New Jersey American Water Company
Designation of Responsibility for Water Utility Functions

P - Primarily Responsible S - Provides Support	Performed By:					
		American Water Service Company			
Company Function	NJAWC	Customer Call Center	Service Company	IT Service Centers	Central Lab
Engineering and Construction Management					
CPS Preparation	P		S		
Five-Year System Planning	P		S		
Engineering Standards & Policies Development			P		
Project Design					
Major Projects (e.g., new treatment plant)	P		S		
Special Projects	P		S		
Minor Projects (e.g., pipelines)	P				
Construction Project Management					
Major Projects	P		S		
Special Projects	P				
Minor Projects	P				
Hydraulics Review	P				
Developers Extensions	P				
Tank Painting	P				
Water Quality and Purification					
Water Quality Standards Development	P (1)		P (1)		S
Research Studies	S		P		S
Water Quality Program Implementation	P		S		S
Water Treatment Operations & Maintenance	P		S		
Compliance Sampling	P				S
Testing/Other Sampling	P				S
Transmission and Distribution					
Preventive Maintenance Program Development	P		S		
System Maintenance	P		S		
Leak Detection	P		S		
Customer Service					
Community Relations	P				
Customer Contact	P (2)	P (2)			
Call Processing		P			
Service Order Processing	P	S			
Customer Credit		P			
Meter Reading	P			S	
Customer Bill Preparation		P		S	
Bill Collection	S	P		S	
Customer Payment Processing	S		P	S	
Meter Standards Development	S			P	
Meter Testing, Maintenance & Replacement	P				

Note 1: NJAWC responsible for State regulations, Central Services responsible for Federal regulations
Note 2: NJAWC provides in-person customer contact while Service Company call centers provide customer phone contact

Exhibit 13
Page 2 of 3

New Jersey American Water Company
Designation of Responsibility for Water Utility Functions

P - Primarily Responsible S - Provides Support	Performed By:					
		American Water Service Company				
Water Company Function	NJAWC	Customer Call Center	Other Service Company	IT Service Centers	Central Lab
Financial Management						
Financial Planning	P		S		
Financings--Equity			P		
Financings--Long Term Debt & Preferred (Note A)			P		
Short Term Lines of Credit Arrangements(Note A)			P		
Investor Relations			P		
Insurance Program Administration			P		
Loss Control/Safety Program Administration			P		
Pension Fund Asset Management			P		
Cash Management/Disbursements			P		
Internal Auditing			P		
Budgeting and Variance Reporting					
Corporate Guidelines & Instructions			P		
Budget Preparation	P				
Revenue and O&M	P		S		
Depreciation and Interest Expense			P		
Budget Preparation--Service Company Charges		S	P	S	S
Capital Budget Preparation—Projects	P		S		
Capital Budget Preparation—Non-Project Work	P		S		
Prepare Monthly Budget Variance Report	P		S		
(Budget/Plan Analysis)	P				
Prepare Capital Project Budget Status Report	P		S		
Year-End Projections	P		S		
Accounting and Taxes					
Accounts Payable Accounting			P		
Payroll Accounting			P		
Work Order Accounting	S		P		
Fixed Asset Accounting			P		
Journal Entry Preparations--Billing Corrections			P		
Journal Entry Preparation--All Others	S		P		
Financial Statement Preparation			P		
State Commission Reporting	S		P		
Income Taxes--State			P		
Income Taxes--Federal			P		
Property Taxes			P		
Gross Receipts (Town) Taxes			P		

Note A: Lines of credit are the responsibility of American Water Capital Corporation (AWCC). AWCC is also responsible for Corporate financings which may be distributed to the regulated subsidiaries. NJAWC has the abilility to issue LTD.

Exhibit 13
Page 3 of 3

New Jersey American Water Company
Designation of Responsibility for Water Utility Functions

P - Primarily Responsible S - Provides Support	Performed By:				
		American Water Service Company			
Water Company Function	NJAWC	Customer Call Center	Other Service Company	IT Service Centers	Central Lab
Rates					
Rate Studies & Tariff Change Administration	P		S		
Rate Case Planning and Preparation	P		S		
Rate Case Administration	P		S		
Commission Inquiry Response	P		S		
Legal	S		P		
Purchasing and Materials Management – National (pipe, chemicals, meters, etc.)					
Specification Development	S		P		
Bid Solicitation	S		P		
Contract Administration	S		P		
Purchasing and Materials Management – State (state supplier service agreements)					
Specification Development	P		S		
Bid Solicitation	P				
Contract Administration	P				
Ordering	P				
Inventory Management	P				
Human Resources Management					
Benefit Program Development			P		
Benefits Program Administration			P		
Management Compensation Administration			P		
Wage & Salary Program Design			P		
Wage & Salary Administration	S		P		
Labor Negotiations--Wages	S		P		
Labor Negotiations--Benefits	S		P		
Labor Negotiations-- Work Rules	S		P		
Training Program Development	S		P		
Training--Course Delivery	S		P		
Affirmative Action/EEO--Plan Development	S		P		
Affirmative Action/EEO--Implementation	P		S		
Technology & Innovation Services					
IT Operations				P	
Applications Support				P	
Network Administration				P	
Local IT Support	S			P	
Help Desk				P	

VII - Question 4 – Need for Service Company Services

Governance Practices Associated with Service Company Charges

There are several ways by which NJAWC and the Service Company exercise control over Service Company services and charges. The most important of these are described below.

1. Chief Operating Officer Oversight – The Chief Operating Officer (COO) is on the Executive Leadership Team (ELT) of American Water. This position is responsible for the overall performance of each operating company in American Water. As part of the ELT, the COO has equal say with other ELT members in major business decisions of American Water and has the ability to monitor Service Company performance quality and spending. The COO also addresses local concerns with each operating company president.
2. Operating Company Board Oversight – The NJAWC board of directors includes members of members of the NJAWC management team and external business and community leaders. This diverse board ensures that NJAWC's needs are a factor in the delivery of Service Company services. The NJAWC board meets at a minimum of four times each year and at every meeting financial and operational reports and issues are discussed at length.
3. Service Company Budget Review/Approval – The ELT serves as the Board of Directors for the Service Company and must formally approve the budget for Service Company charges for the next year. These budgeted charges are consolidated with the operating company's own spending into an overall budget that must be approved by the operating company's board of directors. NJAWC's president also acts as ex officio and attends the Service Company board meetings.
4. Major Project Review and Approval – Before major Service Company non-capital projects are undertaken, they must be reviewed and approved by American Water's ELT, which includes the COO. The COO, with significant input from direct reports, has the ability to impact all new initiatives and projects before they are authorized. Major non-capital projects and initiatives for the Service Company are approved through the Business Planning process. A 3-year technology roadmap of initiatives is developed from American Water's vision, strategy, operational objectives and key business programs. The alignment of these initiatives with enterprise goals is approved by the ELT and key business leaders from various operational and functional areas of American Water. The roadmap is updated annually to produce a rolling 3-year roadmap and investment plan.
5. Service Company Bill Scrutiny – NJAWC Finance personnel review the monthly Service Company operating expenses for accuracy and reasonableness. NJAWC Financial Manager discusses the monthly bill with Shared Services Center personnel, and any mistakes or over-charges are credited on a subsequent billing. The NJAWC Finance Manager prepares an actual-to-budget comparison of management fees each month for use in identifying unusual variances. A Service Company actual-to-budget comparison is included in the monthly Financial Review Package (FRP). Unusual variances are researched, explanations are provided and any necessary corrections are made.
6. Service Company Budget Variance Reporting – Each month, a summary variance analysis is prepared that explains differences between budgeted and actual Service Company spending. In addition, a more detailed monthly variance report, called the "Statement of Expenses and Billed Charges," is produced by Service Company location and shows actual spending for the month.
7. Operating Company Budget Variance Reporting – The "Budget/Plan Analysis," produced monthly by each operating company, has line items for Management Fees and Shared Service Expense (i.e., IT, Call Center, etc.). In this way, Service Company budget versus

actual charges as charged to the operating company can be monitored and reviewed for the month and year-to-date as compared to prior year, plan and reforecast.

8. Capital Program Management (CPM) – CPM is one of American Water's primary business planning processes. It covers capital and asset planning and is used throughout American Water. CPM provides a full range of governance practices, including a formal protocol for assessing system needs, prioritizing expenditures, managing the capital program, approving project spending, delivering projects and measuring outputs. CPM ensures that:

   - Capital expenditure plans are aligned with the strategic intent of the business
   - The impact of capital expenditures and savings are fully reflected in operating expense plans
   - The effects of these plans are understood and affordable, and
   - Effective controls are in place over budgets (through business plans) and individual capital projects (through appropriate authorization thresholds, management and reporting processes).

   The CPM process was designed to optimize the effectiveness of asset investment. The process is managed at two levels for all American Water companies, including all NJAWC Operating Units. Monthly meetings of the CPM are held to review capital spending compared to plan, review new project requests and review updates or modifications to existing projects. The President of NJAWC and others (e.g. NJAWC operations managers and Senior Manager, Finance) participate, as necessary, and provide the data used in the monthly review schedules.

9. Accounting and Financial Reporting – The Service Company follows the same accounting and financial reporting processes as American Water's regulated utilities. During the month, accounting transactions are recorded. At month-end, the Service Company Finance team reviews all transactions. Variance analyses are performed based on month-to-month actual as well as actual to budget to ensure accuracy. Once completed, the service company bill is run and the actuals are "pushed down" and allocated to the states based on predetermined formulas. A conference call is scheduled before the operating companies close their books each month to discuss Service Company performance. This is based at a functional level with explanation reported for any expense variances that meet or exceed certain thresholds. At this time, the operating companies may question expenses and spending for better understanding of results.