National Grid

The Narragansett Electric Company

FY 2016 Electric Infrastructure, Safety and Reliability Plan

Annual Reconciliation

August 1, 2016

Docket No. 4539

Submitted to:
Rhode Island Public Utilities Commission

Submitted by:

nationalgrid

Filing Letter

Raquel J. Webster
Senior Counsel

August 1, 2016

BY HAND DELIVERY AND ELECTRONIC MAIL

Luly E. Massaro, Commission Clerk
Rhode Island Public Utilities Commission
89 Jefferson Boulevard
Warwick, RI 02888

RE: Docket 4539 - Fiscal Year 2016 Electric Infrastructure, Safety, and Reliability Plan Reconciliation Filing

Dear Ms. Massaro:

On behalf of National Grid,[1] relating to the Company's Fiscal Year (FY) 2016 Electric Infrastructure, Safety, and Reliability (ISR) Plan, I have enclosed ten copies of the Company's Electric ISR Reconciliation Filing. Pursuant to the approved ISR Plan and the ISR Provision, RIPUC No. 2188, after the end of the ISR Plan year, which runs from April 1 through March 31, the Company must file annually, by August 1 of each year, the proposed CapEx Reconciling Factors and O&M Reconciling Factor that will become effective for the twelve months beginning October 1. The CapEx Reconciling Factors recover or credit the difference between the reconciliation of actual billed revenue generated from the CapEx Factors and the actual Cumulative Revenue Requirement for the applicable plan year. Similarly, the annual O&M Reconciling Factor recovers or credits the difference between the reconciliation of actual billed revenue from the O&M Factor and actual Inspection and Maintenance (I&M) program expense and actual Vegetation Management (VM) program expense for the ISR Plan year. Additionally, on August 1, the Company must report on the prior fiscal year's ISR Plan activities and include descriptions of deviations from the original plans approved by the Rhode Island Public Utilities Commission (PUC).

This filing provides the actual discretionary and non-discretionary capital investment spending and the actual Vegetation Management (VM) and Inspection and Maintenance (I&M) expenses for the period April 1, 2015 to March 31, 2016. As explained in this filing, the actual capital plant-in-service is compared to the budgeted amounts for these categories, as approved by the PUC in Order No. 21559. The plant-in-service investment and Operation and Maintenance (O&M) expenses for VM and I&M are then used in the calculation of the revenue requirement for the annual reconciliation of investment and expenses for the fiscal year. This revenue requirement is then compared to actual revenue billed, and any difference forms the basis for the proposed

[1] The Narragansett Electric Company d/b/a National Grid (National Grid or Company).

Electric ISR Plan reconciliation factors for effect October 1, 2016. This filing also includes details on the Company's actual discretionary and non-discretionary capital investment spending by category during FY 2016. Finally, this filing includes a summary of the Company's Reliability Performance through December 31,2015.

The pre-filed direct testimonies of James H. Patterson, Amy Tabor, and Adam Crary are enclosed with this filing. Mr. Patterson presents the Company's FY 2016 Electric ISR Plan Reconciliation Filing related to the FY 2016 Electric ISR Plan approved by the PUC in this docket. Ms. Tabor's testimony describes the calculation of the revenue requirement based on the capital plant-in-service and the total annual actual VM and I&M expenses for the fiscal year. Ms. Tabor's testimony also includes a description of the revenue requirement model and attachments that support the final revenue requirement. As explained in Ms. Tabor's testimony, for the FY 2016 Electric ISR reconciliation, the Company has an updated revenue requirement of $18,497,362. Mr. Crary describes the reconciliation of the final actual FY 2016 revenue requirement against revenue billed in support of that revenue requirement, the proposed factors resulting from the reconciliation, and the bill impacts of those proposed factors. The impact of the proposed CapEx Reconciling Factor and the proposed O&M Reconciling Factor on a typical residential customer receiving Standard Offer Service and using 500 kWhs per month is an decrease of $0.44, or approximately 0.5%, from $95.01 to $94.57.

Thank you for your attention to this filing. If you have any questions, please contact me at 781-907-2121.

Very truly yours,

Raquel J. Webster

Enclosures

cc: Docket 4539 Service List
LeoWold, Esq.
Steve Scialabba, Division
James Lanni, Division
Al Contente, Division

Testimony of
James H. Patterson, Jr.

PRE-FILED DIRECT TESTIMONY

OF

JAMES H. PATTERSON, JR.

August 1, 2016

Table of Contents

I. INTRODUCTION AND QUALIFICATIONS

Q. Mr. Patterson, please state your name and business address.

A. My name is James H. Patterson, Jr. My business address is 40 Sylvan Road, Waltham, Massachusetts 02451.

Q. Mr. Patterson, by whom are you employed and in what position?

A. I am employed by National Grid USA Service Company, Inc. (Service Company) as Director, Network Strategy, New England Electric. I am responsible for regulatory filings and regulatory compliance related to electric distribution operation of The Narragansett Electric Company d/b/a National Grid (the Company or National Grid). I am also responsible filings relating to National Grid USA's electric distribution operations in Massachusetts.

Q. Mr. Patterson, please describe your educational background and professional experience.

A. In 1999, I graduated from Worcester Polytechnic Institute in Worcester, Massachusetts, with a Bachelor's Degree in Electrical Engineering. In the same year, I was employed by Massachusetts Electric Company as an Associate Operations Engineer in the Operations Engineering department. I was promoted to Operations Engineer in 2001. In these two roles, I was responsible for the engineering and design of distribution line construction projects. I also participated in system restoration efforts due to equipment failures and severe weather events. In 2002, I joined the Distribution Planning and Engineering department as an Engineer. In 2005, I was promoted to Senior Engineer. In these two roles, I was responsible for identifying asset, capacity, and reliability issues, justifying proposed solutions, and initiating selected projects for Operations and Substation engineering departments. I also reviewed and recommended solutions to serve customers requiring significant demand. In 2005, I was promoted to Supervisor of the Distribution Design department, which was formerly called Operations Engineering. In 2007, I was promoted to Manager of the Distribution Design departments. In these two roles, I was responsible for the quality and throughput of the design of distribution line construction projects, as well as directing staff in system restoration during equipment failures and severe weather events. In 2010, I joined the Operations Program Management department in the National Grid USA Service Company as manager for the New England and New York Distribution Line portfolios. In 2012, my roles and responsibilities were changed to only include Massachusetts and New Hampshire Gas and Distribution Line functions in the Resource Planning department, formerly known as the Program Management department. In 2013, my roles and responsibilities were changed to only include Massachusetts and Rhode Island Distribution Line portfolios. In these three positions, I was responsible for creating, monitoring, and execution of the work plans for the applicable portfolio of construction projects. I was promoted and assumed my current role on October 1, 2014.

Q. Have you previously testified before the Rhode Island Public Utilities Commission (PUC)?

A. Yes. I have testified before the PUC in support of the Electric Infrastructure, Safety and Reliability (ISR) Plan filings for fiscal year (FY) 2016 in Docket No. 4539 and FY 2017 in Docket No. 4592.

II. PURPOSE OF TESTIMONY

Q. What is the purpose of your testimony?

A. The purpose of my testimony is to present the Company's Fiscal Year 2016 (FY 2016) Annual Reconciliation filing related to the FY 2016 Electric ISR Plan approved by the PUC in this docket. This filing provides the actual plant-in-service for discretionary and non-discretionary capital investment and associated cost of removal (COR)[1], the actual vegetation management (VM) operation and maintenance (O&M) expenses, and the actual inspection and maintenance (I&M) O&M expenses for the period April 1, 2015 to March 31, 2016. As described in Ms. Amy Tabor's testimony in this filing, this plant-in-service investment and the O&M expenses for VM and I&M is used to calculate the FY 2016 Electric ISR Plan revenue requirement. As explained in Mr. Adam Crary's testimony in this filing, the revenue requirement is then reconciled against the actual revenue billed during FY 2016. Specific details by category for the FY 2016 Electric

[1] Under the Electric ISR Plan, discretionary capital investment for a fiscal year must be reconciled to the lesser of the actual capital investment placed-in-service and the level of approved spending on a cumulative basis. Non-discretionary capital investment for a fiscal year must be reconciled to the actual capital investment placed-in-service. Docket No. 4218, Report and Order No. 20852 at 6 (December 12, 2011).

ISR Plan plant-in-service additions, associated COR, and actual capital spending are included in Attachment JHP-1, which is attached to this testimony.

III. PLANT-IN-SERVICE

Q. Please provide an overview of the plant-in-service for FY 2016.

A. As shown in Table 1 of Attachment JHP-1, in FY 2016, the Company's plant-in-service investment was $71.5 million. This amount was $6.0 million under the planned amount of $77.5 million. The Non-Discretionary Sub-category had $36.0 million of plant additions placed in service, which was $8.1 million over the planned amount of $27.9 million. This was offset by the Discretionary Sub-category, which had $35.5 million of plant additions placed in service, which was $14.1 million under the planned amount of $49.6 million. As shown in Table 2 of Attachment JHP-1, in FY 2016, the associated cost of removal (COR) was on budget at $8.2 million. These totals resulted in a net Electric ISR Plan investment of $79.6 million, which was $6.0 million under the Company's plant-in-service and COR combined planned amount of $85.7 million. Details on these variances are included in Section I of Attachment JHP-1.

As explained in Ms. Amy Tabor's testimony, the plant-in-service investment and the associated COR are used to calculate the revenue requirement included in the ISR Plan reconciliation for FY 2016. These amounts are reflected in the Electric ISR Plan reconciliation factors. The capital spending amounts are not used in this calculation.

IV. CAPITAL SPENDING

Q. Please summarize the Company's actual capital spending for FY 2016 for the Electric ISR Plan.

A. As shown in Table 3 of Attachment JHP-1, for FY 2016, the Company spent $79.5 million for capital investment under the Electric ISR Plan. This amount was $6.2 million over the annual approved budget of $73.3 million. This over-budget variance was driven primarily by capital spending in the Non-Discretionary Sub-category, which was over-budget by $5.1 million. Within this sub-category, the Customer Request/Public Requirement category was over-budget by $1.8 million. This over-budget variance was due partially to an increase in costs on the New Business Residential and Commercial blankets, an accounting adjustment on the Meter Purchasing blanket, and an increase in project costs on the Nasonville 127W41 New Customer Load project. Also within the Non-Discretionary Sub-category, the Damage/Failure category was over-budget by $3.4 million. This over-budget variance was due partially to the severe microburst storm on August 4, 2015 captured under the Storm Capital Confirming program, along with over-budget spending on the Damage/Failure blanket.

Capital spending on the South Street project, which was managed as a separate Discretionary Sub-category, was $6.2 million, which was $1.7 million over the annual approved budget of $4.5 million. Notably, early in FY 2016, the Company anticipated that capital spending would exceed the annual approved budget of $4.5 million.

Construction for the South Street project began in FY 2016 with site work, and engineering continued on electrical construction, which the Company is anticipating to begin later in FY 2017 and continue through FY 2019. Excluding the South Street project, capital spending on the Discretionary Sub-category was on budget at $41.3 million, which was $0.6 under the annual approved budget of $41.9 million.

The key drivers and variances by category are discussed in detail in Section III of Attachment JHP-1.

V. O&M SPENDING

Q. Please summarize the Company's actual O&M spending for the FY 2016 Electric ISR Plan.

A. As shown in Table 11 of Attachment JHP-1, for FY 2016, the Company's VM O&M spending was on budget at $8.9 million. In addition, as shown in Table 12, the Company's I&M O&M spending for FY 2016 was $1.2 million, which was $2.1 million under the I&M annual approved budget of $3.3 million. Detailed information regarding the VM and I&M variances, along with the work completed, are discussed in Attachment JHP-1 in Sections IV and V, respectively.

VI. RELIABILITY PERFORMANCE

Q. Please summarize the results of the Company's reliability performance for FY 2016.

A. Section VI of Attachment JHP-1 includes the Company's Reliability Performance for calendar year 2015 (CY 2015). As shown in Table 13, the Company met both its System Average Interruption Frequency Index (SAIFI) and System Average Interruption Duration Index (SAIDI) performance metrics in CY 2015, with SAIFI of 0.937 against a target of 1.05, and SAIDI of 64.30 minutes against a target of 71.9 minutes. Overall, the Company's performance has shown an improving downward trend over the past several years with major event days excluded. As shown in Table 14, for CY 2015, the Company had one day that was characterized as a major event day. Reliability performance, including major event days, is shown in Table 15.

Q. Does this conclude your testimony?

A. Yes.

Attachment JHP-1

Attachment JHP-1

FY 2016 Electric Infrastructure, Safety and Reliability Plan Annual Reconciliation Filing

FY 2016 Electric Infrastructure, Safety and Reliability Plan

Annual Reconciliation Filing

EXECUTIVE SUMMARY

In accordance with tariff, RIPUC No. 2044, Sheets 1- 4, the Company[1] submits this annual reconciliation filing for the fiscal year 2016 (FY 2016) Electric Infrastructure, Safety and Reliability (Electric ISR) Plan approved by the Rhode Island Public Utilities Commission (RIPUC) in Docket No. 4539. This filing provides the actual discretionary and non-discretionary capital investment spending and the actual vegetation management (VM) and inspection and maintenance (I&M) operation and maintenance (O&M) expenses for the period April 1, 2015 to March 31, 2016. As explained in this filing, the actual capital plant-in-service is compared to the planned amounts for these categories, as approved by the RIPUC in Order No. 22174. The capital plant-in-service investment and O&M expenses for VM and I&M are then used to calculate the revenue requirement for the annual reconciliation of investment and expenses for the fiscal year. This revenue requirement is then compared to actual revenue billed, and any difference forms the basis for the proposed Electric ISR Plan reconciliation factors for effect October 1, 2016. This filing also includes details on the Company's actual discretionary and non-discretionary capital spending by category in FY 2016. Finally, this filing includes a summary of the Company's reliability performance through December 31, 2015.

For FY 2016, the Company's plant-in-service investment was $71.5 million, which was $6.0 million under the planned amount of $77.5 million. The associated cost of removal (COR) was on budget at $8.2 million. These totals resulted in a net Electric ISR Plan investment of $79.6 million, which was $6.0 million under the Company's combined plant-in-service and COR planned amount of $85.7 million. Section I provides a summary overview of the actual plant placed-in-service by category compared to the annual planned amount approved in Docket No. 4539. A similar summary is provided for COR.

For FY 2016, the Company spent $79.5 million for capital investment under the Electric ISR Plan, which was $6.2 million over the annual approved budget of $73.3 million. Section II provides a summary overview of the actual capital spending by category compared to the annual budget approved in Docket No. 4539. Section III provides detailed explanations of capital spending variances by category to the annual approved budget.

[1] The Narragansett Electric Company d/b/a National Grid (National Grid or the Company).

For FY 2016, the Company's VM O&M spending was on budget at $8.9 million. Section IV provides a summary overview of O&M expenses by VM sub-category along with variance explanations.

For FY 2016, the Company's I&M O&M spending was $1.2 million, which was $2.1 million under the I&M annual approved budget of $3.3 million. Section V provides a summary overview of O&M expenses by I&M sub-category along with variance explanations.

Finally, a summary of the Company's reliability performance through December 31, 2015 is addressed in Section VI.

This filing includes testimony from Ms. Amy Tabor and Mr. Adam Crary. Ms. Tabor's testimony describes the calculation of the revenue requirement based on the capital plant-in-service and the total annual actual VM and I&M O&M expenses for the fiscal year. Ms. Tabor's testimony also includes a description of the revenue requirement model and attachments that support the final revenue requirement. As shown in Ms. Tabor's testimony, for the FY 2016 filing, the Company has an updated revenue requirement of $18,497,362.

Mr. Crary's testimony provides a description of the reconciliation of the final actual FY 2016 revenue requirement against revenue billed in support of that revenue requirement, the proposed factors resulting from the reconciliation, and the bill impacts of those proposed factors. The impact of the proposed CapEx Reconciling Factor and the proposed O&M Reconciling Factor on a typical residential customer receiving Standard Offer Service and using 500 kWhs per month is a decrease of $0.44, or approximately 0.5% from $95.01 to $94.57.

I. FY 2016 Capital for Plant Investment Placed in Service

In its reconciliation filing, the Company is required to submit the annual capital spending for plant additions that were placed in service during the fiscal year. As shown in Table 1 below, for FY 2016, $71.5 million was placed in service, which was $6.0 million under the annual planned amount of $77.5 million. The Non-Discretionary Sub-category had $36.0 million of plant additions placed in service, which was $8.1 million over the planned amount of $27.9 million. This variance is partially explained by the $5.1 million over-budget variance in the Damage/Failure category in FY 2016.

The Discretionary Sub-category had $35.5 million of plant additions placed in service, which was $14.1 million under the planned amount of $49.6 million. This variance was due primarily to the deferral of the Chase Hill, New Highland Drive, New London, and Kent County substation expansion projects in the System Capacity and Performance category. Also contributing to this variance was the deferral of the Westerly and Hope Flood Restoration projects, the Front Street and Southeast substation metal clad retirement projects, and the Arc Flash program, as well as a lower than anticipated amount of I&M work being placed into service under the Asset Condition category. In addition, capital spending on the South Street project, which was a significant percentage of the Discretionary Sub-category of the FY 2016 annual approved budget, will not result in asset additions until FY 2018 and beyond.

Table 1
FY 2016 Plant Additions by Category

	FY 2016 Total		
	Annual ISR Forecast	**Actual in Service**	**Variance**
Customer Request/Public Requirement	$16,611,000	$19,593,559	$2,982,559
Damage Failure	$11,299 ,000	$16,370,879	$5,071,879
Subtotal Non-Discretionary	*$27,910 ,000*	*$35,964,438*	*$8,054,438*
Asset Condition	$25,354 ,000	$18,532,553	($6,821,447)
Non-Infrastructure	$277 ,000	$110,598	($166,402)
System Capacity & Performance	$23,934 ,000	$16,845,313	($7,088,687)
Subtotal Discretionary	*$49,565 ,000*	*$35,488,464*	*($14,076,536)*
Total Plant Investment in System	**$77,475 ,000**	**$71,452,902**	**($6,022,098)**

* ( ) denotes an underspend for the period

The variances shown in Table 1 reflect the timing of when plant investment is placed into service. In general, once equipment is energized and placed into service to support electric load, capital costs are transferred from FERC Account 107 (Construction Work in Progress or CWIP) to FERC Account 106 (Plant-In-Service), which is when the underlying capital work becomes used and useful in the service of customers. This can differ by the type of plant and facility. For example, electric distribution line equipment is normally placed in service closer to the time it is installed because it is typically energized at that time and begins to support electric load, and therefore, is used and useful in the service of customers. Because electric distribution line equipment is typically energized as it is installed, a relatively significant amount of plant is placed into service as work progresses. By contrast, substation construction typically involves multi-year projects. Therefore, the assets must pass testing, the work must be commissioned, and the assets must be energized before they can be placed in service. Because substation construction is typically completed in one or more phases as part of a multi-year process, the assets will only be placed in service to serve customers once all work in a particular phase is completed.

Table 2 provides the total COR for FY 2016, which was on budget at $8.2 million. The Non-Discretionary Sub-category was $5.4 million, which was $2.0 million over the annual planned amount of $3.4 million. This variance was due primarily to an overall increase in capital spending in the Damage/Failure category. This included an increase in capital spending on the Storm Capital Confirming program due to the severe microburst storm on August 4, 2015, as well as an increase in capital spending on blanket projects within the Damage/Failure category. The Discretionary Sub-category was $2.8 million, which was $2.0 million under the annual planned amount of $4.8 million. This variance was due primarily to the deferral of the I&M program, and the Front Street and Southeast substation metal clad retirement projects within the Asset Condition category. Also contributing to this variance was the deferral of the Chase Hill, New Highland Drive, New London, and Kent County substation expansion projects within the System Capacity and Performance category.

<u>Table 2</u>
FY 2016 Cost of Removal by Category

	FY 2016 Total		
	Annual ISR Forecast	**Actual COR**	**Variance**
Customer Request/Public Requirement	$1,825,000	$1,561,866	($263,134)
Damage/Failure	$1,593,700	$3,869,941	$2,276,241
Subtotal Non-Discretionary	*$3,418,700*	*$5,431,806*	*$2,013,106*
Asset Condition	$3,226,370	$1,916,210	($1,310,160)
Non-Infrastructure	$104,000	$0	($104,000)
System Capacity & Performance	$1,451,180	$844,966	($606,214)
Subtotal Discretionary	*$4,781,550*	*$2,761,176*	*($2,020,374)*
Total Cost of Removal	**$8,200,250**	**$8,192,983**	**($7,267)**

* ( ) denotes an underspend for the period

II. FY 2016 Capital Spending Summary

As set forth in Table 3 below, overall, for FY 2016, the Company spent $79.5 million for capital investment under the Electric ISR Plan, which was $6.2 million over the annual approved budget of $73.3 million. This over-budget variance was driven primarily by capital spending in the Non-Discretionary Sub-category, which was over-budget by $5.1 million. Within this sub-category, the Customer Request/Public Requirement and Damage/Failure categories were over-budget by $1.8 million and $3.4 million respectively.

Capital spending on the South Street project, which was managed as a separate Discretionary Sub-category, was $6.2 million, which was $1.7 million over the annual approved budget of $4.5 million. Notably, early in FY 2016, the Company anticipated that capital spending would exceed the annual approved budget of $4.5 million. Construction for the South Street project began in FY 2016 with site work, and engineering continued on electrical construction, which the Company expects will begin later in FY 2017 and continue through FY 2019. Capital spending on the Discretionary Sub-category, absent the South Street project, was $41.3 million, which was $0.6 under the annual approved budget of $41.9 million. The key drivers and variances by category are discussed in detail in <u>Section III</u> below.

<u>Table 3</u>
FY 2016 Capital Spending by Category

	FY 2016 Total		
	Annual ISR Budget	**Actual**	**Variance**
Customer Request/Public Requirement	$15,647,000	$17,412,295	$1,765,295
Damage/Failure	$11,177,000	$14,531,159	$3,354,159
Subtotal Non-Discretionary	*$26,824,000*	*$31,943,454*	*$5,119,454*
Asset Condition	$19,513,000	$20,951,394	$1,438,394
Non-Infrastructure	$275,000	$457,388	$182,388
System Capacity & Performance	$22,148,000	$19,919,704	($2,228,296)
Subtotal Discretionary (Without South Street)	*$41,936,000*	*$41,328,486*	*($607,514)*
South Street Project	*$4,540,000*	*$6,227,567*	*$1,687,567*
Subtotal Discretionary	*$46,476,000*	*$47,556,053*	*$1,080,053*
Total Capital Investment in System	**$73,300,000**	**$79,499,507**	**$6,199,507**

* ( ) denotes an underspend for the period

III. FY 2016 Capital Spending by Key Driver Category

1. <u>Non- Discretionary Spending</u>

a. ***<u>Customer Request/Public Requirement - $1.8 million over-budget for FY 2016</u>***

Capital spending for FY 2016 in the Customer Request/Public Requirement category (*previously called the Statutory/Regulatory category*) was $17.4 million, which was approximately $1.8 million over the FY 2016 budget of $15.6 million. This variance was driven primarily by the following over-budget projects:

- Capital spending for FY 2016 on the New Business Residential and Commercial blankets was $8.6 million, which was approximately $2.0 million over the combined FY 2016 budget of $6.6 million. Relative to FY 2014 and 2015, the major contributors to this over-budget variance were increased cost of labor benefits, fewer reimbursements collected, and a joint-ownership billing true-up with Verizon. Actual labor and material costs were also slightly higher.

- Capital spending for FY 2016 on the Meter Purchasing blanket was $2.0 million, which was approximately $0.8 million over the FY 2016 budget of $1.2 million. This variance was due primarily to an accounting adjustment in April 2015 that reversed a credit unrelated to the blanket that was incorrectly applied in March 2015. These charges were correctly applied to the capital overheads project located in the Non-Infrastructure category and allocated across the capital portfolio.

- Capital spending for FY 2016 on the Nasonville 127W41 New Customer Load project was $1.6 million, which was approximately $1.0 million over the FY 2016 budget of $0.6 million. This variance was due primarily to the FY 2016 budget being set before the final project grade estimate was available. The increase in project cost was due to ROW access that had not been previously planned or estimated for. This included swamp matting (which allow construction crews to operate equipment and machinery in wetlands and unstable terrains), specialty off-road construction equipment, and an increased labor cost to perform off-road construction. Overall, the project was completed in FY 2016 and was under the final project grade estimate for the project.

Among the major projects in this category, offsetting these over-spending projects were the following under-budget projects:

- Capital spending for FY 2016 on the Transformer Purchase blanket was $1.4 million, which was approximately $1.5 million under the FY 2016 budget of $2.9 million. Inventory purchases in FY 2015 supplemented FY 2016 demand and, consequently, the blanket was under-budget for the fiscal year.

- Capital spending for FY 2016 on specific projects in the Public Requirements sub-category, particularly those related to Rhode Island Department of Transportation (RIDOT) projects, was under-budget by $2.8 million. The Company has collected reimbursements for prior-year RIDOT projects, as well as for other public requirements projects that will be constructed in FY 2017. Also, several projects budgeted in FY 2016 were delayed by RIDOT.

- Capital spending for FY 2016 on the Street Light blanket was negligible at $0.1 million. As the Company continues to decrease its street light assets, capital spending on this blanket will continue to decrease over time.

- Capital spending for FY 2016 on specific projects in the Distributed Generation sub-category was ($0.9) million, which was $1.6 million under the FY 2016 budget of $0.6 million. This was due primarily to contributions in aid of construction (CIAC) on specific projects that will be constructed in FY 2017.

Detailed budget and actual spending by budget classification for the Customer Request/Public Requirement category is shown in Table 4 below.

Table 4
FY 2016 Capital Spending
Customer Request/Public Requirement Category

		FY 2016 Total		
Category	**Budget Classification**	**Annual ISR Budget**	**Actual**	**Variance**
Customer Request/Public Requirement	Third-party Attachments	$154,000	$289,988	$135,988
	Distributed Generation	$645,000	($933,182)	($1,578,182)
	Land and Land Rights	$167,000	$143,254	($23,746)
	Meters – Distribution	$1,775,000	$2,935,052	$1,160,052
	New Business – Commercial	$4,213,000	$7,568,136	$3,355,136
	New Business – Residential	$3,500,000	$5,085,436	$1,585,436
	Outdoor Lighting – Capital	$711,000	$128,717	($582,283)
	Public Requirement	$1,602,000	$642,180	($959,820)
	Regulatory Requirement	$0	$127,691	$127,691
	Transformers & Related Equipment	$2,880,000	$1,425,023	($1,454,977)
	Customer Request/Public Requirement Sub-Total	**$15,647,000**	**$17,412,295**	**$1,765,295**

* ( ) denotes an underspend for the period

b. ***Damage/Failure - $3.4 million over-budget for FY 2016***

Capital spending for FY 2016 in the Damage/Failure category was $14.5 million, which was approximately $3.4 million over the FY 2016 budget of $11.2 million. This variance was driven primarily by the following over-budget projects:

- Capital spending for FY 2016 on the Storm Capital Confirming program was $3.2 million, which was approximately $2.2 million over the FY 2016 budget of $1.0 million. This variance was due primarily to the severe microburst storm on August 4, 2015.

- Capital spending for FY 2016 on the Damage/Failure blanket was $10.3 million, which was approximately $1.8 million over the FY 2016 budget of $8.5 million. This over-budget variance was due primarily to the reasons below:

  - Capital spending on the Damage/Failure blanket for monthly confirming work orders (CWOs) was $6.9 million. These CWOs are used by local Operations to address immediate needs for capital construction to return the system or a customer's service to normal operating condition. This work is often done in response to customer outages or public emergencies. In addition, this work is generally in the area of overhead construction and can either be minor (i.e. residential service replacement) or major (i.e. pole replacements).

- Capital spending on the Damage/Failure blanket for work at the Franklin Square substation was $0.9 million. This was for an emergency replacement of failed underground transformer cables, and the replacement of the substation's fire escape.

- A majority of the remaining $2.5 million of capital spending on the Damage/Failure blanket was for work done in response to substation equipment failures, underground cable failures, street light outages, damaged/leaking pad-mounted transformer replacements, and overhead pole and equipment replacements.

Detailed budget and actual spending by budget classification for the Damage/Failure category is shown in Table 5 below.

Table 5
FY 2016 Capital Spending
Damage/Failure Category

		FY 2016 Total		
Category	**Budget Classification**	**Annual ISR Budget**	**Actual**	**Variance**
Damage/Failure	Damage/Failure	$10,177,000	$11,097,470	$920,470
	Major Storms - Distribution	$1,000,000	$3,204,024	$2,204,024
	Substation	$0	$229,665	$229,665
	Damage/Failure Sub-Total	**$11,177,000**	**$14,531,159**	**$3,354,159**

* ( ) denotes an underspend for the period

2. Discretionary Spending

At the onset of FY 2016, the Company recognized that carry-over work from FY 2015, the South Street project, and several other multi-year discretionary projects budgeted in FY 2016 would result in capital spending that greatly exceeded the approved FY 2016 Electric ISR discretionary budget of $46.5 million. Therefore, using an approach that considered asset risk, project maturity, and resource availability, the Company investigated options to delay projects and scale-down programs. Project schedules, particularly within the System Capacity & Performance category, were either entirely delayed into future fiscal years or stretched to reduce FY 2016 capital spending (refer to Table 10 for additional detail). Monthly performance was closely monitored and, as needed, additional portfolio calibrations were made throughout the fiscal year. As a result of these portfolio management decisions, several large multi-year projects were under-budget in FY 2016. In addition, the Company began managing the South Street project as an individual portfolio and began managing the remaining discretionary portfolio to that subtotal budget (please see Table 3 for additional details). This portfolio management is in line with a recommendation from the Division that was made during the FY 2017 Electric ISR planning process.

a. <u>Asset Condition - $3.1 million over-budget for FY 2016</u>

Capital spending for FY 2016 in the Asset Condition category was $27.2 million, which was approximately $3.1 million over the FY 2016 budget of $24.1 million. This variance was driven primarily by the following over-budget projects:

- Capital spending for FY 2016 on the South Street Indoor Substation Replacement project was $6.2 million, which was approximately $1.7 million over the FY 2016 budget of $4.5 million. The payments for engineering and design activities that were made throughout FY 2016, which were based on a schedule for the contract that was awarded to the vendor in early FY 2016, required funding that would exceed the FY 2016 budget. This budget was developed prior to obtaining this information and awarding the contract. The Company chose to advance work pursuant the contract schedule and, therefore, exceed the budget for FY 2016.

- Capital spending for FY 2016 on the Underground Cable Replacement portfolio was $1.8 million, which was approximately $1.1 million over the FY 2016 budget of $0.7 million. The Feeder 1111 project was $0.4 million over-budget based on the final design estimate that was completed in May 2015. The Company also completed $0.3 million of secondary cable replacement work in FY 2016 and advanced engineering and material procurement for three projects budgeted for construction in FY 2017.

- Capital spending for FY 2016 on the Relay Replacement Strategy was $1.2 million, which was approximately $0.6 million over the FY 2016 budget of $0.6 million. This variance was due primarily to higher than anticipated labor costs to complete construction at the Valley 102 substation. This variance was due primarily to the FY 2016 budget being set before the final project grade estimate was available.

- Capital spending for FY 2016 on the Breakers and Reclosers program was $1.8 million, which was approximately $0.8 million over the FY 2016 budget of $1.0 million. This variance was due primarily to outage restrictions at the Lippitt Hill substation that prevented construction work from being performed during normal business hours. This caused both a construction duration increase as well as an increase in labor costs due to off-hours overtime work.

- Capital spending for FY 2016 on the Pontiac Substation Flood Restoration project was $1.4 million, which was approximately $0.3 million over the FY 2016 budget of $1.1 million. This increase in project costs was due to the complexity of outage work and weather delays. The project scope was modified to relocate the control house grade-level cable tray penetration location.

Among the major projects in this category, offsetting these over-budget projects were the following under-budget projects:

- Capital spending for FY 2016 on the Arc Flash program was $0.1 million, which was approximately $0.5 million under the FY 2016 budget of $0.6 million. This variance was due to Company standards issues with the underground primary switches that were being installed. As a result, the program was deferred until those issues could be resolved.

- Capital spending for FY 2016 on the Injection Replacement Underground Residential Development (IRURD) portfolio of projects was $2.0 million, which was approximately $0.5 million under the FY 2016 budget of $2.5 million. The Company advanced the Wethersfield Commons project in lieu of the Wionkheige Drive Replacement project, which will instead commence in FY 2017. However, construction on the Wethersfield Commons project did not start until the third quarter of FY 2016, due to final design and scheduling delays, all of which resulted in lower than anticipated capital spending for the fiscal year.

- In FY 2016, certain projects/programs in the Asset Condition category were either scaled-down or completely deferred into future fiscal years to achieve an overall capital spend for the discretionary portfolio that was approximate to the FY 2016 Electric ISR budget. The table below details these projects:

	FY 2016 Total ($000)		
Project	**Annual ISR Budget**	**Actual**	**Variance**
I&M Program	$6.7	$4.8	($1.9)
Westerly and Hope Flood Restoration Projects	$1.3	$0.2	($1.1)
Front Street and Southeast Substation Metal Clad Retirement Projects	$0.5	$0.1	($0.4)
Lafayette and West Cranston Substation Transformer Replacement Projects	$0.8	$0.3	($0.5)

Detailed budget and actual spending by budget classification for the Asset Condition category is shown in Table 6 below.

<u>Table 6</u>
FY 2016 Capital Spending
Asset Condition Category

		FY 2016 Total		
Category	**Budget Classification**	**Annual ISR Budget**	**Actual**	**Variance**
Asset Condition	Asset Replacement	$12,208,000	$16,031,174	$3,823,174
	Asset Replacement – South Street	$4,540,000	$6,227,567	$1,687,567
	Asset Replacement - I&M	$6,705,000	$4,810,890	($1,894,110)
	Reliability	$0	$23,671	$23,671
	Safety	$600,000	$85,659	($514,341)
	Asset Condition Sub-Total	**$24,053,000**	**$27,178,961**	**$3,125,961**

* ( ) denotes an underspend for the period

b. *<u>Non-Infrastructure - $0.2 million over-budget for FY 2016</u>*

Capital spending for FY 2016 in the Non-Infrastructure category was $0.5 million, which was approximately $0.2 million over the FY 2016 budget of $0.3 million. There was no individual project with a significant budget variance in FY 2016.

Detailed budget and actual spending by budget classification for the Non-Infrastructure category is shown in Table 7 below.

Table 7
FY 2016 Capital Spending
Non-Infrastructure Category

		FY 2016 Total		
Category	**Budget Classification**	**Annual ISR Budget**	**Actual**	**Variance**
Non-Infrastructure	Corporate/Administrative/General	$0	($123,869)	($123,869)
	General Equipment - Distribution	$100,000	$331,067	$231,067
	Telecommunications	$175,000	$187,264	$12,264
	Other	$0	$62,927	$62,927
	Non-Infrastructure Sub-Total	**$275,000**	**$457,388**	**$182,388**

* ( ) denotes an underspend for the period

c. ***System Capacity & Performance - $2.2 million over-budget for FY 2016***

Capital spending for FY 2016 in the System Capacity & Performance category was $19.9 million, which was approximately $2.2 million under the FY 2016 budget of $22.1 million. This variance was driven primarily by the following under-budget projects:

- Capital spending for FY 2016 on the Chase Hill, New Highland Drive, New London, and Kent County substation expansion projects was $4.7 million, which was approximately $9.4 million under the FY 2016 budget of $14.1 million. These projects were deferred to achieve an overall capital spend for the discretionary portfolio that was approximate to the FY 2016 Electric ISR budget. Although some engineering, procurement, and construction activities were completed in FY 2016, significant portions of work were delayed into future fiscal years.

Among the major projects in this category, offsetting these under-budget projects were the following over-budget projects:

- Capital spending for FY 2016 on the Quonset Substation Expansion project was $1.6 million, which was approximately $1.2 million over the FY 2016 budget of $0.5 million. The Company accelerated this project in FY 2016 to address asset and contingency risks at the existing substation.

- Capital spending for FY 2016 on the Aquidneck Island projects (Gate 2, Newport, and Jepson substations) was $3.0 million, which was approximately $0.9 million over the FY 2016 budget of $2.1 million. Although the FY 2016 budget for the Gate 2 Substation project was only fifty thousand dollars to perform limited engineering and design in FY 2016, the total capital spending was $1.4 million. This project was accelerated to address immediate load relief needs for summer 2016. Other projects in the Aquidneck Island portfolio were delayed to partially offset the increase in capital spending for the Gate 2 Substation project.

- Capital spending for FY 2016 on the Kilvert Street New Feeder, Clarke Street Feeder Upgrade, and the Johnston Substation Expansion projects was $3.9 million, which was approximately $2.5 million over the combined FY 2016 budget of $1.4 million. In FY 2015, these projects were partially delayed by the Company into FY 2016 to achieve capital spending that was approximate to the FY 2015 Electric ISR discretionary budget.

- Capital spending for FY 2016 on the Volt/Var project was $2.2 million, which was approximately $0.7 million over the FY 2016 budget of $1.5 million. During the pilot implementation and construction phases, the complexities of commissioning the equipment and the communications network were greater than expected. This resulted in an increase in overall capital spending on the project.

- Capital spending for FY 2016 on the emergent, unbudgeted Clarkson 13F10 Feeder Position project was $0.5 million. This distribution line project provided urgent load relief to other Clarkson #13 distribution feeders by utilizing an existing substation feeder position.

Detailed budget and actual spending by budget classification for the System Capacity & Performance category is shown in Table 8 below.

Table 8
FY 2016 Capital Spending
System Capacity & Performance Category

		FY 2016 Total		
Category	**Budget Classification**	**Annual ISR Budget**	**Actual**	**Variance**
System Capacity & Performance	Load Relief	$19,318,000	$16,491,214	($2,826,786)
	Corporate/Admin/General	$0	($4,237)	($4,237)
	Reliability	$2,642,000	$3,112,193	$470,193
	Substation	$188,000	$320,535	$132,535
	System Capacity & Performance Sub-Total	**$22,148,000**	**$19,919,704**	**($2,228,296)**

* ( ) denotes an underspend for the period

Finally, as noted above in Section II, capital spending through the fourth quarter of FY 2016 in the Discretionary Sub-category was $47.6 million, which was approximately $1.1 million under the FY 2016 annual budget of $46.5 million. The Company exceeded the FY 2016 budget for the South Street project in order to achieve engineering and procurement milestones needed to deliver key future in-service dates in FY 2018 and FY 2019. The Company strived to manage both over and under-budget spending on the remaining discretionary projects to achieve an overall discretionary portfolio that was approximate to the $42.0 million discretionary budget that excluded the South Street project. Notably, even though the South Street project was over-budget, assets are not anticipated to be in-service until FY 2018 and, therefore, do not impact the FY 2016 rate base.

In Docket No. 4473, the RIPUC ordered the Company to include in the FY 2016 Electric ISR Plan filing a proposal to identify and report in quarterly and annual reconciliation filings the projects that exceeded or were under the fiscal year-to-date and fiscal year-end budgets by ten percent (10%).[2] For the identified projects, the Company would note whether variances were due to the project being accelerated or delayed, or whether the variances were due to an increase or decrease in total project cost. The Company agreed to provide in the quarterly reports, explanations for the portfolio of large projects[3] with variances exceeding $0.1 million. These projects represented approximately $29.3 million of the FY 2016 annual budget. Information regarding these projects is included in Table 9 below.

---

[2] Docket No. 4473 Order No. 21559 at p. 25.
[3] Large projects are defined as exceeding $1.0 million in total project cost.

Table 9
FY 2016 Project Variance Report

Project Description	Project Funding Number(s)	FY 2016 Total Annual ISR Budget	FY 2016 Total Actual	FY 2016 Total Variance	Variance Cause
Nasonville 127W41 New Customer Load	C049981	$553,000	$1,583,893	$1,030,893	Project costs increased
Aquidneck Island Projects (Gate 2, Newport, Jepson)	CD00649, C024159, C015158, C028628, C054054, CD00656	$2,050,000	$2,954,319	$904,319	Gate 2 project was accelerated.
Chase Hill Substation	C024175, C024176	$4,900,000	$3,276,976	($1,623,024)	Project partially delayed into FY 2017 and FY 2018.
Johnston Substation Expansion	C033535	$0	$415,429	$415,429	The costs for this project increased in FY 2015 and carried over into FY 2016.
Kilvert Street #87 Upgrades	C036516, C036522	$1,100,000	$2,016,197	$916,197	Project delayed from FY 2015 into FY 2016.
Clarke Street Upgrades	C046831, C046832	$250,000	$1,449,623	$1,199,623	Project delayed from FY 2015 into FY 2016.
Quonset Substation Expansion	C053646, C053647	$480,000	$1,640,372	$1,160,372	Project accelerated.
New Highland Drive Substation	CD00972, CD00978	$1,200,000	($468,870)	($1,668,870)	Substation is complete and costs decreased in FY 2016. The final d-line project was delayed into FY 2018.
Kent County 2nd Transformer	CD01101, CD01104	$1,200,000	$315,875	($884,125)	Project delayed into FY 2017.
South Street Substation Replacement	C051212, C051213	$4,540,000	$6,227,567	$1,687,567	Project accelerated. Overall project costs increased when preliminary engineering for contract award was completed in early FY 2016.
Volt/Var Pilot Program	C046352, C052708, C053111	$1,464,000	$2,212,462	$748,462	Increased costs.
New London Avenue Substation	C032002, C028920, C028921	$6,800,000	$1,559,756	($5,240,244)	Project partially delayed into FY 2017 and FY 2018.
Westerly Flood Restoration	C055215, C036527	$650,000	$243	($649,757)	Project delayed to FY 2018.
Hope Substation Flood Restoration	C046697	$612,000	$159,897	($452,103)	Project partially delayed into FY 2017 and FY 2018.

Metal Clad Substation Retirements (Hyde Ave., Daggett Ave., Southeast, and Front St.)	C050778, C049910, C051274, C051200, C053658, C053657, C051273, C050006, C050017	$1,800,000	$2,094,141	$294,141	Scope and costs increased on Daggett Ave. and Hyde Ave. Front St. and Southeast were delayed until FY 2017 to partially offset this increase.
Pontiac Substation Flood Restoration	CD01243, CD01242	$1,090,000	$1,411,467	$321,467	Project costs increased.
BITS Wakefield Sub Upgrades	C046386	$595,000	$214,156	($380,844)	Project was partially delayed into FY 2017.
		$29,344,000	**$27,121,672**	**($2,222,328)**	

* ( ) denotes an underspend for the period

3. FY 2016 Work Plan Accomplishments

Table 10 below provides actual work plan accomplishments against the goals of the FY 2016 work plan.

Table 10
FY 2016 Work Plan Accomplishments

Program Type	FY 2016 Goals	FY 2016 Accomplishments	Comments
Distribution Transformer Upgrades	250	250	100% Complete
I&M Program	N/A	6,380 structures	15 Feeders 100% Complete [3]
Substation Battery Replacement Program	3	1	100% Complete as of 4/19/2016 [4]
Substation Breaker Replacement Program	12	3	67% Complete as of 4/15/2016 [5]

IV. FY 2016 Vegetation Management

As shown below in Table 11, overall, the total VM spending for FY 2016 was on budget at $8.9 million. The Company completed 100% of its annual distribution mileage cycle pruning goal of 1,232 miles. This represented an associated spending of 100% of the FY 2016 budget for the cycle pruning program.

The Company remains in confidential discussions with Verizon Communications (Verizon) in efforts to resolve the vegetation management-related issues.

[3] For FY 2016, the I&M program budget was reduced and, therefore, fewer structures were completed compared to previous years.

[4] Due to a material procurement issue, the two batteries missed were completed on 4/9/16 and 4/19/16.

[5] Of the nine breakers missed, five were completed by 4/15/16, one is expected to be completed on 6/2/16, and the last three have been scheduled for completion in Fall of 2016 due to outage considerations.

Table 11
FY 2016 Vegetation Management O&M Spending

	FY 2016 Total			
	Annual ISR Budget	**Actual Spend**	**Variance**	**% Spent**
Cycle Pruning (Base)	$5,414,000	$5,435,000	$21,000	100%
Hazard Tree	$1,000,000	$937,000	($63,000)	94%
Sub-T (on & off road)	$220,000	$209,000	($11,000)	95%
Police/Flagman Details	$750,000	$772,000	$22,000	103%
Core Crew (all other activities)	$1,500,000	$1,540,000	$40,000	103%
Total VM O&M Spending	**$8,884,000**	**$8,893,000**	**$9,000**	**100%**

* ( ) denotes an underspend for the period

	FY 2016 Total		
	Goal	**Complete**	**% Complete**
Distribution Mileage Trimming	1,232	1,232	**100%**

V. FY 2016 Inspection and Maintenance

In FY 2016, the Company completed 100% of its annual structure inspection goal of 49,670. For FY 2016, the Company's I&M O&M spending was $1.2 million, which was $2.1 million under the I&M annual approved budget of $3.3 million. This year-end under-budget variance was driven primarily by the Opex Related to Capex subcategory. As noted earlier in Section III of this report, the capital components of the I&M program were scaled-down due to portfolio management decisions, resulting in lower Opex Related to Capex. The Repairs and Inspections Related Costs subcategory included the FY 2016 mobile elevated voltage testing and repairs, which the PUC approved in Docket No. 4237. Table 12 below provides the FY 2016 spending for all components within the I&M category.

Table 12
FY 2016 Inspection and Maintenance O&M Spending

	FY 2016 Total			
	Annual ISR Budget	Actual	Variance	% Spent
Opex Related to Capex	$1,885,000	$577,289	($1,307,711)	31%
Repair & Inspections Related Costs	$1,423,000	$606,547	($816,453)	43%
System Planning & Protection Coordination Study	$25,000	$12,920	($12,080)	52%
Total I&M O&M Spending	**$3,333,000**	**$1,196,755**	**($2,136,245)**	**36%**

* ( ) denotes an underspend for the period

	FY 2016 Total		
	Goal	Complete	% Complete
RI Distribution Overhead Structures Inspected	49,670	49,670	**100%**

In FY 2011, the Company began performing inspections on its overhead distribution system. In FY 2012, the Company began performing repairs based on those inspections. The Company categorizes the deficiencies found as Level I, II, or III, and repairs Level I deficiencies either immediately or within approximately one week of inspection. The Company bundles Level II and III work for planned replacement. Through FY 2016, the Company has completed repairs on approximately 31% of the deficiencies found. Total deficiencies found and repairs made as of March 31, 2016 are shown in the tables below. Additional detail on FY 2016 Level 1 repairs is also included in these tables.

Summary of Deficiencies and Repair Activities RI Distribution				
Year Inspection Performed	Priority Level/Repair Expected	Deficiencies Found (Total)	Repaired as of 03/31/16	Not Repaired as of 03/31/16
FY 2011	I	18	18	0
	II	13,146	12,600	546
	III	28	0	28
FY 2012	I	17	17	0
	II	15,848	15,256	592
	III	626	491	135
FY 2013	I	15	15	0
	II	26,882	10,200	16,682
	III	9,056	2,158	6,898

FY 2014	I	11	11	0
	II	23,196	2,175	21,021
	III	8,776	1,153	7,623
FY 2015	I	5	5	0
	II	21,549	1	21,548
	III	4,391	0	4,391
FY 2016	I	2	2	0
	II	11,596	0	11,596
	III	6,498	0	6,498
Total Since Program Inception	**I, II, III**	**141,660**	**44,102**	**97,558**

FY 2016 – I&M Level 1 Deficiencies Repaired						
Year Inspection Performed	**Deficiencies Found**	**Structure Number**	**Location**	**Description of Work Performed**	**Inspection Date**	**Repaired Date**
FY 2016	1	32-8	South Rd, South Kingston RI	Secondary riser needs plastic pipe or u-shield about 2' long 3" in diameter.	4/15/2015	4/21/2015
	1	4-1	Fabien St, Woonsocket RI	Cutout tap burned.	11/24/2015	11/25/2015

As shown in the table below titled "Manual Elevated Voltage Testing", results of the Company's manual elevated voltage testing for FY 2016 indicated one instance of elevated voltage greater than 1 volt. On June 22, 2015, a padmounted transformer at 455 North Main Road in Jamestown Rhode Island recorded a voltage reading of 12 volts. The unit was guarded and made safe until repairs were made. On November 14, 2015, the unit was retested and a safe voltage reading of 0.72 volts was recorded.

Manual Elevated Voltage Testing				
	Total System Units Requiring Testing	**FY 2016 Units Completed thru 03/31/16**	**Units with Voltage Found (>1.0v)**	**Percent of Units Tested with Voltage (>1.0v)**
Distribution Facilities	262,359	45,067	0	0.000%
Underground Facilities	13,870	2,540	1	0.039%
Street Lights	5,884	1,150	0	0.000%

*The Rhode Island Street Light Elevated Voltage Testing Program moved from a five-year to a three-year program. The Company achieved a 100% completion rate in FY 2014. The new three-year cycle began again in FY 2015.

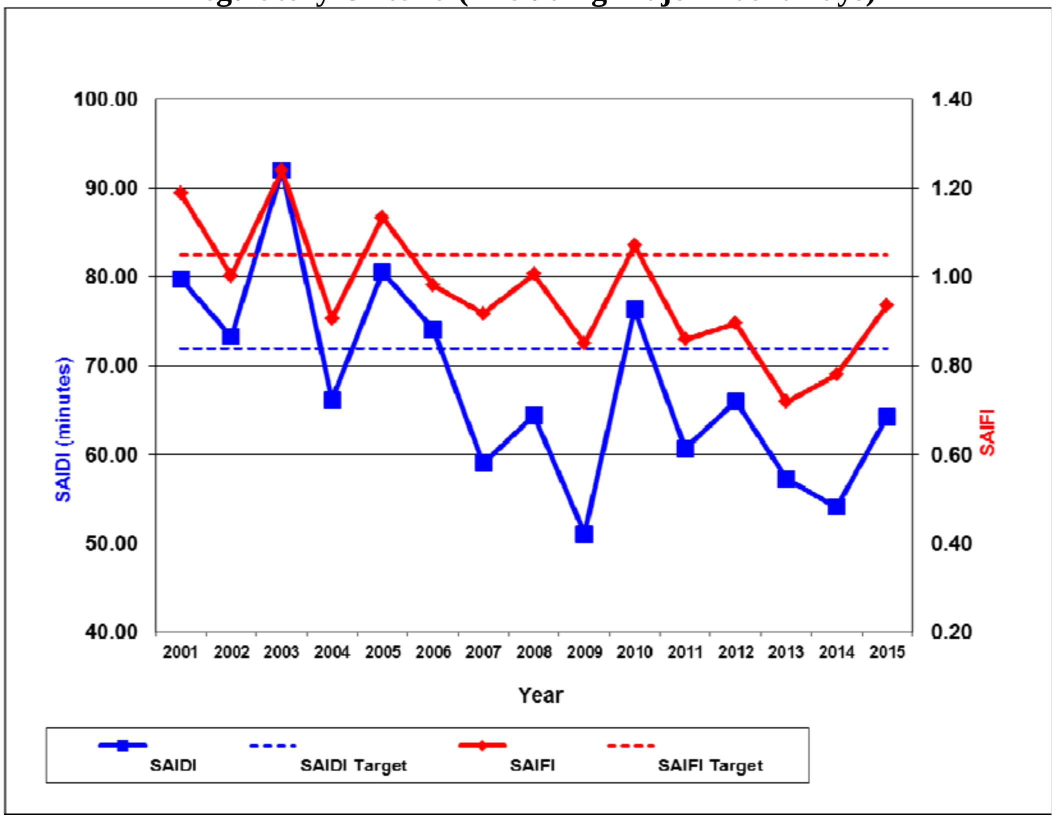
As detailed in the Company's Annual Contact Voltage Report filed with the PUC on April 6, 2016 in Docket No. 4237, mobile elevated voltage testing was completed in FY 2016. The FY 2016 mobile elevated voltage testing and its associated manual testing revealed twenty six (26) instances of elevated voltage readings of one volt or more, all of which were Company assets. Of the twenty-six (26) mobile events that were recorded during the mobile survey having 1 volt or greater, twelve (12) were found and documented as having elevated voltage at or above 4.5 volts, and fourteen (14) were found and documented as having elevated voltage below 4.5 volts. In each of these events, the Company took immediate remedial action by disconnecting the asset, placing protective barriers, and/or repairing the asset. All of the Company's assets that registered greater than one volt were permanently repaired between November 2, 2015 and March 16, 2016.

VI. Reliability Performance

The Company met both its System Average Interruption Frequency Index (SAIFI) and System Average Interruption Duration Index (SAIDI) performance metrics in CY 2015, with SAIFI of 0.937 against a target of 1.05, and SAIDI of 64.30 minutes, against a target of 71.9 minutes. The Company's annual service quality targets are measured excluding major event days.[6] A comparison of reliability performance in CY 2015 relative to that of previous years is shown in Table 13 below. The Company's performance has shown an improving downward trend over the past several years with major event days excluded.

[6] A Major Event Day (MED) is defined as a day on which the daily system SAIDI exceeds a MED threshold value (5.48 minutes for CY 2015). For purposes of calculating daily system SAIDI, any interruption that spans multiple calendar days is accrued to the day on which the interruption began. Statistically, days having a daily system SAIDI greater than the MED are days on which the energy delivery system experiences stress beyond that normally expected, such as during severe weather.

Table 13
RI Reliability Performance CY 2001 – CY 2015
Regulatory Criteria (Excluding Major Event Days)



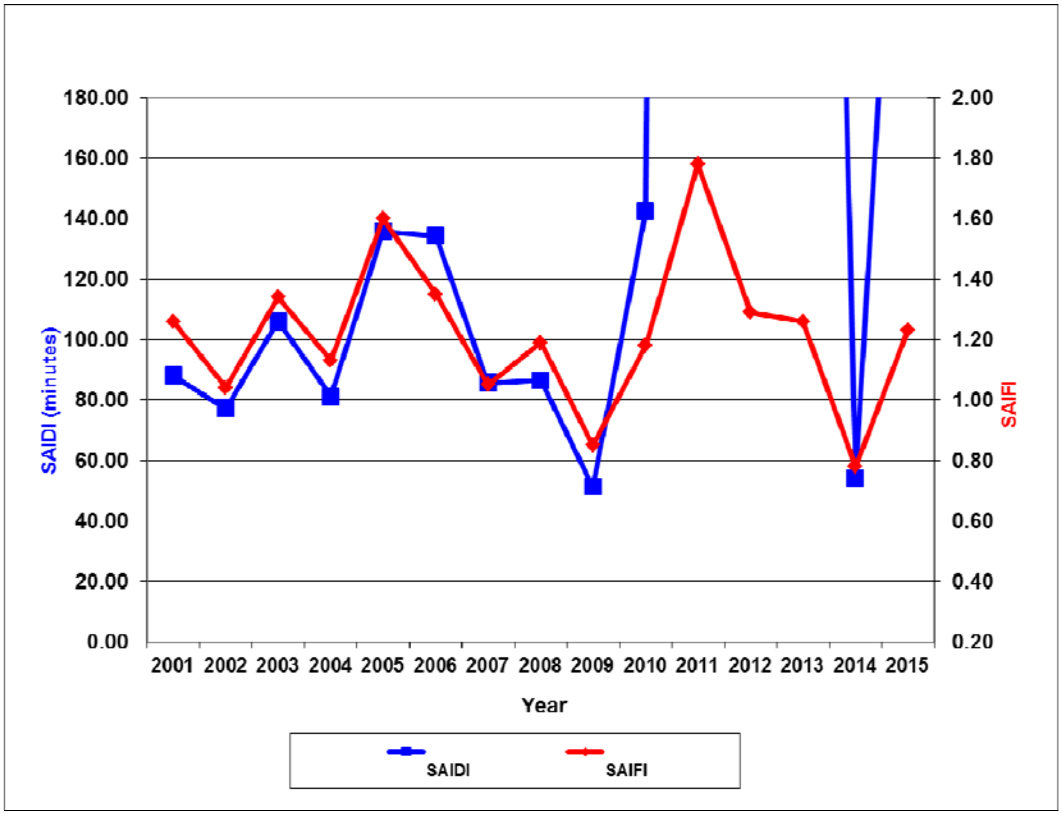
CY 2015 had one day that was characterized as a major event day. Table 14 below provides additional details including the event, dates, the total number of customers interrupted, and the daily SAIDI performance metric.

Table 14
CY 2015 Major Event Days

Event	Dates Excluded	Total Customers Interrupted	Daily SAIDI
Windstorm	08/04/2015	142,171	271.33

Reliability performance, including major event days, is shown in Table 15 below for CY 2001 through CY 2015. SAIDI for 2011, including major event days, exceeds the scale of the chart, at 1,947 minutes (32.5 hours). This was driven by Tropical Storm Irene. CY 2011 through CY 2013 indicates the greatest differences between performance with and without major event days. In CY 2011, the Company experienced ten major events days from five separate events. Tropical Storm Irene and the October Snowstorm accounted for seven of those major event days. In CY 2012, the Company experienced four major event days from two separate events. Hurricane Sandy accounted for three of those major event days. In CY 2013, the Company experienced three major events days from two separate events. The February 8th Nor'easter accounted for two of those major event days. In CY 2014, the Company did not experience any major event days, and in CY 2015, as shown above in Table 14, the Company experienced only one major event day.

Table 15
RI Reliability Performance CY 2001 – CY 2015
Regulatory Criteria (Including Major Event Days)



Tesimony of
Amy S. Tabor

DIRECT TESTIMONY

OF

AMY S. TABOR

August 1, 2016

Table of Contents

I. <u>INTRODUCTION</u>

Q. Please state your full name and business address.

A. My name is Amy S. Tabor, and my business address is 40 Sylvan Road, Waltham, Massachusetts 02451.

Q. Please state your position.

A. I am a Senior Analyst of New England Revenue Requirements in the Regulation and Pricing department of National Grid USA Service Company, Inc. (Service Company). Service Company provides engineering, financial, administrative, and other technical support to subsidiary companies of National Grid USA (National Grid). My current duties include revenue requirements responsibilities for National Grid's electric and gas distribution activities in New England, including the electric operations of The Narragansett Electric Company d/b/a National Grid (Narragansett or the Company).

Q. Please describe your education and professional experience.

A. In 2000, I received a Bachelor of Science degree in Business Management from Salem State University. I worked at Oliver Wyman Company from 2000 to 2007 as an AP Coordinator, AP Supervisor, and Senior Accountant. From 2007 to 2013 I worked for Randstad as a Senior Accountant. In April of 2013, I joined National Grid as a Senior Analyst - the position I hold today.

Q. Have you previously testified before the Rhode Island Public Utilities Commission (PUC)?

A. Yes. I have testified before the PUC in Docket No. 4539 regarding the FY 2016 Electric Infrastructure, Safety and Reliability Plan and in Docket No. 4592 regarding the FY 2017 Electric Infrastructure, Safety, and Reliability Plan.

Q. What is the purpose of your testimony?

A. In this docket, the PUC approved a new Electric Infrastructure, Safety and Reliability (ISR) factor, which went into effect on April 1, 2015. That factor was based on a projected fiscal year (FY) 2016 ISR revenue requirement of $21,201,792 for the estimated operation and maintenance (O&M) work associated with the Company's vegetation management (VM) and inspection and maintenance (I&M) programs for the Company's FY ended March 31, 2016, and on the estimated ISR plant additions during the Company's FY ended March 31, 2016, 2015, 2014, 2013, and 2012, and which were incremental to the levels reflected in rate base in the Company's last base rate case (Docket No. 4323). The purpose of my testimony is to present an updated FY 2016 ISR revenue requirement associated with actual FY 2016 O&M programs, the FY 2016, 2015, FY 2014, FY 2013, and FY 2012 incremental plant additions, and actual tax deductibility percentages and tax net operating loss (NOL) for FY 2015 capital additions. Actual tax deductibility percentages for FY 2016 plant additions will not be known until the Company files its FY 2016 income tax return in December 2016. Consequently, the actual tax deductibility percentages for FY 2016 plant additions will be reflected in the Company's FY 2017 Electric ISR Reconciliation filing next year and will generate a true up adjustment in that filing. The updated FY 2016 revenue requirement also includes an adjustment associated with the ISR property tax recovery formula that was approved in Docket No. 4323. The ISR property tax recovery adjustment became effective for periods subsequent to the rate year in Docket No. 4323, which ended on January 31, 2014. Consequently, the ISR recovery adjustment covers only the months of February and March of 2014 and the 12 months ended March 31, 2016. My testimony will also address the income tax NOL issue raised in the FY 2016 Electric ISR Proposal under Docket No 4539 and the resulting increase in the FY 2016 revenue requirement related to vintage FY 2015 investment, as well the catch-up adjustment related to the increase in FY 2012 through FY 2014 revenue requirements on vintage FY 2012 through FY 2014 investment, which the Company began recovering over a period of three years starting on November 1, 2015. As shown on Attachment AST-1, Page 1 at Line 14, the updated FY 2016 ISR revenue requirement collectible through the Company's ISR factor for the FY 2016 period, including the one-time catch up adjustment related to the NOL impact on prior fiscal years' revenue requirements, totals $18,497,362. This is a decrease of $2,704,431 from the projected FY 2016 Electric ISR revenue requirement of $21,201,792 previously approved by the PUC. Approximately $2.1 million of this decrease is due to an under-spend of actual Inspection and Maintenance Expense versus the forecasted amount included in the plan. The remainder is due to the net impact of additional tax deductions that were not in the plan and a lower property tax amount, offset by $2.2 million of NOL related to prior years and the FY 2016 estimated NOL. The tax NOL adjustment is the result of tax deductions reflected on National Grid's income tax returns that exceed the amount of taxable income the Company generated during FY 2012 through FY 2015, along with an estimate of the FY 2016 tax NOL that the Company expects to generate when National Grid files its FY 2016 income tax return during December 2016. Guidance in recent years from the Internal Revenue Service and recent economic tax incentives made available through federal income tax legislation (namely, bonus tax depreciation) has provided National Grid with more tax deductions than taxable income with which to offset the deductions. National Grid's tax NOLs are unrealized tax deductions that can be used in the future to offset taxable income. Approximately $.5 million of the $2.2 million tax NOL adjustment is a true up for one-third of the understated Electric ISR Reconciliation filings in FY 2012 to FY 2014, pursuant to the Commission's Order in Docket 4473. The remaining $.6 and $1.1 million respectively, are the revenue effects of the NOLs related vintage FY 2015 investment . Beginning with this filing, the Company has included an estimate of NOL on FY 2016 investment in its calculation of the FY 2016 ISR revenue requirement. Prior ISR reconciliations only reflected NOLs based on actual tax return filings; however, National Grid's income tax returns for each fiscal year are not filed until mid-December following the end of the fiscal year, which is after the August 1 PUC filing date for each fiscal year's ISR reconciliation filing. However, the Company's Tax Department calculated an estimated tax NOL when the Company closed its books for FY 2016, which has formed the basis for the tax NOL estimate in this reconciliation. The Company will true up this estimated tax NOL to the NOL that is ultimately reflected in National Grid's FY 2016 income tax returns in its FY 2017 Electric ISR Reconciliation filing. The estimated FY 2016 NOL accounts for $0.5 million in additional revenue requirement, which was not contemplated in the FY 2016 Plan Proposal.

Q. Are there any schedules attached to your testimony?

A. Yes, I am sponsoring the following Attachment with my testimony:

- Attachment AST-1: Electric Infrastructure, Safety, and Reliability Plan Revenue Requirement Reconciliation

II. ISR PLAN FY 2016 REVENUE REQUIREMENT

Q. Did the Company calculate the updated FY 2016 ISR revenue requirement in the same fashion as calculated in the previous ISR Factor submissions and the August 2015 ISR factor reconciliation?

A. Yes, with two exceptions. First, as described earlier, this reconciliation reflects an estimate of the Company's FY 2016 tax NOL, where previous ISR reconciliation filings have not. Secondly, the Company submitted a filing with the Internal Revenue Service (IRS) to apply for a change in accounting method regarding the treatment of gains or losses on partial retirements for federal income tax purposes. This change is described further in my testimony. Other than these changes, the updated FY 2016 ISR revenue requirement calculation is nearly identical to the ISR revenue requirement used to develop the approved ISR factors that were effective April 1, 2015, and which I described in previous testimony in this proceeding. However, the updated calculation incorporates updated ISR investment amounts and known tax deductibility percentages. I will rely on my testimony included in the Company's FY 2016 Plan Proposal for a detailed description of the revenue requirement calculation, and will limit this testimony to summarizing the revenue requirement, a description of the tax NOL impact, and the update for the known tax deductibility percentages.

Q. What are NOLs?

A. Tax NOLs are generated when the Company has tax deductions on its income tax returns that exceed its taxable income. This does not mean that the Company is suffering losses in its financial statements; instead, the Company's tax NOLs are the result of the significant tax deductions that have been generated in recent years by the bonus depreciation deductions described above, as well as capital repairs tax deductions. In addition to first-year bonus tax depreciation discussed previously, the United States tax code allows the Company to classify certain costs as repairs expense for which the Company takes as an immediate deduction on its income tax return; however, these costs are recorded as plant investment on the Company's books. These significant bonus depreciation and capital repairs tax deductions have exceeded the amount of taxable income reported in tax returns filed for FY 2009 to FY 2015, with the exception FY

2011. NOLs are recorded as non-cash assets on the Company's balance sheet and represent a benefit that the Company and customers will receive when the Company is able to realize actual cash savings when it applies these NOLs against taxable income in the future.

Accumulated NOLs represent an offset to the company's accumulated deferred income taxes, which are included as a credit, or reduction in the calculation of rate base. Consequently, including accumulated NOLs in the revenue requirement calculations reduces the amount of accumulated deferred taxes in the derivation of ISR rate base. As described previously, deferred taxes are an offset, or reduction, to ISR rate base and are intended to represent the amount of cash benefit generated and associated with ISR investment related tax deductions that the Company has reflected in its income tax returns.

Q. Has the Company included NOL in its vintage FY 2016 rate base calculation?

A. Yes, the Company has included an estimate of FY 2016 NOL in its vintage FY 2016 rate base calculation. This is a change compared to prior years' Electric ISR reconciliation filings. Including an estimate of FY 2016 NOL would mirror the timing of other tax assumptions included in the calculation of tax depreciation, particularly assumptions around the bonus depreciation and the capital repairs deductions. The tax depreciation calculation on vintage FY 2016 investment is an estimate until the Company files its FY 2016 tax return in December 2016. If the Company's actual FY 2016 NOL differs based on its FY 2016 tax position as filed with the IRS, that adjustment will be reflected as a prior period adjustment to the FY 2016 revenue requirement in the FY 2017 Electric ISR reconciliation filing. Conversely, if the Company is able to utilize any of its currently accumulated NOLs, that benefit will be flowed through to customers in its FY 2017 Electric ISR Reconciliation filing.

Q. Are there any other changes to the FY 2015 revenue requirement that are being trued up in the FY 2016 Electric ISR Reconciliation?

A. Yes. The Company filed its FY 2015 Electric ISR Reconciliation on August 1, 2015. However, at that time, the Company had not filed its FY 2015 income tax return until later that year in the month of December. Consequently, the Company used an estimated capital repairs tax deduction. Also in December 2015, the U.S. House and Senate signed the Protecting Americans from Tax Hikes (PATH) Act into law, which extended accelerated bonus depreciation for tax purposes at a rate of 50 percent through calendar year 2017, but then phases down to 40 percent for 2018 and 30 percent for 2019. Consequently, the Company has revised its FY 2015 revenue requirement to reflect an actual capital repairs deduction rate of 23.10 percent, as shown on page 5, Line 2 on Attachment AST-1, and a 50 percent bonus depreciation deduction as shown on Line 11 of Page 5 of that Attachment. Finally, the IRS clarified its tangible property regulations, and as a result the Company submitted a §481(a) election with the IRS to apply for a change in accounting method regarding the treatment of gains or losses on asset retirements which are characterized as partial retirements for tax purposes. This election was submitted to the PUC, as required under IRS rules, on December 17, 2015. The late partial disposition election was made to protect the Company's deduction of cost of removal (COR). Otherwise, the Company would have been required to make a §481(a) adjustment to reverse all historical COR deductions, resulting in a substantial reduction in deferred tax liabilities. Because the Company made the election, COR remains 100 percent deductible.

The vintage FY 2015 tax depreciation calculation in this filing now includes two additional tax deductions related to the change in accounting issue: (1) for the cumulative FY 2009 through FY 2014 net tax deduction related to the change in accounting under §481(a), and (2) the FY 2015 net tax deduction for losses on partial retirements. The true up to the FY 2015 revenue requirement on FY 2015 incremental capital investment resulting from the update to the capital repairs and bonus deductions plus the impact of the §481(a) filing and tax loss on FY 2015 partial retirements is a reduction of $423,974. This reduction plus a $586,030 increase in the FY 2015 revenue requirement on vintage FY 2015 investment related to FY 2015 NOL, totals a net $162,056 increase to the FY 2015 revenue requirement as calculated on Page 6 of Attachment AST-1 and is carried forward to Line 10 of Page 1.

Q. Please summarize the updated FY 2016 ISR revenue requirement.

A. As shown on Page 1, of Attachment AST-1, the Company's FY 2016 Electric ISR Program revenue requirement includes two elements: (1) O&M expense associated with the Company's VM activities and system inspection, feeder hardening, and potted porcelain cutouts, as encompassed by the Company's I&M Program, and (2) the Company's capital investment in electric utility infrastructure. The description of these elements and the related amounts are supported by the direct testimony and supporting attachments of Mr. James Patterson. Line 4 reflects the actual FY 2016 revenue requirement related to O&M expenses of $9,926,006.

As shown on Page 1, at Line 13 of Attachment AST-1, the revenue requirement associated with the Company's actual FY 2016 capital investment totals $8,571,356. As previously noted, the total FY 2016 revenue requirement includes the full year revenue requirement on vintage FY 2016, 2015, FY 2014, FY 2013, and FY 2012 incremental ISR plant additions above or below the level of plant additions reflected in base distribution rates. In addition, the FY 2016 revenue requirement reflects a true-up for changes to previously estimated tax depreciation expense to align with tax depreciation rates used on the Company's FY 2015 tax return, which was filed in December 2015. The total actual FY 2016 ISR Plan revenue requirement for both O&M expenses and capital investment of $18,497,362 is shown on Line 14.

Q. Please describe how the attachment to your testimony is structured.

A. Page 1 of Attachment AST-1 summarizes the individual components of the updated FY 2016 ISR revenue requirement. Lines 1 through 4 address the O&M components. Lines 5 through 9 represent the full year FY 2016 ISR revenue requirements for the incremental FY 2012, FY 2013, FY 2014, FY 2015 and FY 2016 ISR investments, or those investments not included in the Company's base rates, and as supported with detailed calculations on Pages 2, 4, 7, 9 and 11. Line 10 reflects the reconciliation of the approved FY 2015 ISR revenue requirement for vintage FY 2015 plant additions with the actual vintage FY 2015 revenue requirement on those investments.

As previously discussed, this reconciliation is necessary because the actual level of tax deductibility on FY 2015 investments was not known when the Company filed the FY 2015 and FY 2016 ISR Factor proposals and the average rate base correction. A detailed calculation of the updated FY 2015 revenue requirement is presented on page 4 of Attachment AST-1. Line 11 represents the results of the FY 2016 property tax recovery adjustment, which is supported by a detailed calculation on page 15 and is described below. Finally, Line 12 represents one-third of the FY 2012, FY 2013, and FY 2014 revenue requirement impact of NOLs, of which FY 2016 is the second in a three-year recovery period.

Q. Has the Company provided support for the actual level of FY 2016 ISR-eligible plant investments?

A. Yes. The description of the FY 2016 Electric ISR program and the amount of the incremental plant additions eligible for inclusion in the ISR Mechanism are supported by the direct testimony and supporting attachment of Company Witness, Mr. James Patterson. The ultimate revenue requirement on the ISR eligible plant additions equals the return on the investment (i.e. average rate base at the weighted average cost of capital), plus depreciation expense and property taxes associated with the investment. Incremental ISR eligible plant additions for this purpose is intended to represent the net change in rate base for electric infrastructure investments, since the establishment of the Company's ISR mechanism effective April 1, 2011, and is defined as capital additions plus cost of removal, less annual depreciation expense included in the Company's rates, net of depreciation expense attributable to general plant. As discussed in the testimony of Mr. Patterson, the actual ISR eligible plant additions for FY 2016 totals $71.5 million associated with the Company's FY 2016 ISR Plan (electric infrastructure investment net of general plant).

Q. Please explain the distinction between non-discretionary and discretionary capital spending as they relate to the revenue requirement calculation.

A. For purposes of calculating the capital-related revenue requirement, investments in electric infrastructure have been divided into two categories: (1) non-discretionary capital investments, which principally represent the Company's commitment to meet statutory and/or regulatory obligations; and (2) discretionary capital investments, which represent all other electric infrastructure-related capital investment falling outside of the specifically defined non-discretionary categories. The amount of discretionary investment the Company is allowed to include in the revenue requirement calculation is subject to certain limitations as shown on Page 14 of Attachment AST-1. The amount of discretionary capital investment the Company uses in the revenue requirement must be no greater than the cumulative amount of discretionary project spend as approved by the PUC in this proceeding. This means that the discretionary investment is limited to the lesser of actual cumulative discretionary capital additions or spending, or cumulative discretionary spending approved by the PUC in this docket. For purposes of the FY 2016 revenue requirement, the lesser of these items was actual discretionary capital additions of $35,488,464, as shown on Attachment AST-1, Page 14.

Q. What is the updated revenue requirement associated with actual plant additions?

A. The updated FY 2016 revenue requirement associated with the Company's actual FY 2012 through FY 2016 ISR eligible plant investments total $8,571,356. This amount includes the updated FY 2016 revenue requirement on FY 2012, FY 2013, FY 2014, FY 2015 and FY 2016 investments, reconciliation of the approved FY 2015 and FY 2016 ISR revenue requirement for vintage FY 2016 investments with the actual vintage FY

2015 and FY 2016 revenue requirement on those investments, and the inclusion of the ISR property tax recovery formula adjustment.

III. CONCLUSION

Q. Does this conclude your testimony?

A. Yes, it does.

Attachment AST-1

Attachment AST-1 Electric Infrastructure, Safety, and Reliability Plan Revenue Requirement Calculation

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Summary

Line No.			Fiscal Year 2016
	Operation and Maintenance (O&M) Expenses:		
1	Current Year Vegetation Management (VM)	Attachment JHP-1, Page 18, Table 11	$8,893,000
2	Current Year Inspection & Maintenance (I&M)	Attachment JHP-1, Page 19, Table 12	$1,196,755
3	Electric Contact Voltage expenses included in R.I.P.U.C. Docket No. 4323 - FY 2016		($163,749)
4	**Total O&M Expense Component of Revenue Requirement**	Sum of Lines 1 through 3	**$9,926,006**
	Capital Investment:		
1	FY 2016 Revenue Requirement on FY 2016 Actual Incremental Capital Investment	Page 2 of 19, Line 31(a)	$2,048,986
5	FY 2016 Revenue Requirement on FY 2015 Actual Incremental Capital Investment	Page 4 of 19, Line 31(b)	$4,569,615
6	FY 2016 Revenue Requirement on FY 2014 Actual Incremental Capital Investment	Page 7 of 19 Line 32(c)	$852,205
7	FY 2016 Revenue Requirement on FY 2013 Actual Incremental Capital Investment	Page 9 of 19, Line 31(d)	($1,075,239)
8	FY 2016 Revenue Requirement on FY 2012 Actual Incremental Capital Investment	Page 11 of 19, Line 29(e)	$351,745
9	Subtotal	Sum of Lines 5 through 8	$6,747,312
10	True Up for Bonus Depreciation and Capital Repairs Deduction, and NOL of FY2015 Revenue Requirement Reconciliation R.I.P.U.C. Docket No. 4473	Page 6 of 19 Line 3	$162,056
11	FY 2016 Property Tax Recovery Adjustment	Page 15 of 19 Line 62(k)	$1,191,712
12	True Up for Net Operating Losses generated in FY 2012, FY 2013 and FY 2014 - Year 2 of 3 year recovery	Page 18 of 19, Line 10(e)	$470,275
13	**Total Capital Investment Component of Revenue Requirement**	Sum of Lines 9 through 12	**$8,571,356**
14	**Total Fiscal Year Revenue Requirement**	Line 4 + Line 13	**$18,497,362**
15	FY 2016 Plan Revenue Requiement as filed on March 16, 2015		$21,201,793
16	Decrease in FY 2016 Revenue Requirement		($2,704,431)

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Revenue Requirement on FY 2016 Actual Incremental Capital Investment

Line No.				Fiscal Year 2016 (a)
	Capital Investment Allowance			
1	*Non-Discretionary Capital*	Attachment JHP-1, Page 3, Table 1		$35,964,438
	Discretionary Capital			
2	Lesser of Actual Cumulative Non-Discretionary Capital Additions or Spending, or Approved Spending	Page 14 of 19, Line 12		$35,488,464
3	Total Allowed Capital Included in Rate Base	Line 1 + Line 2		$71,452,902
	Depreciable Net Capital Included in Rate Base			
4	Total Allowed Capital Included in Rate Base in Current Year	Line 3		$71,452,902
5	Retirements		1/	$28,489,814
6	Net Depreciable Capital Included in Rate Base	Line 4 - Line 5		$42,963,088
	Change in Net Capital Included in Rate Base			
7	Capital Included in Rate Base	Line 3		$71,452,902
8	Depreciation Expense	Per Settlement Agreement Docket No. 4323, excluding General Plant		43,031,774
9	Incremental Capital Amount	Line 7 - Line 8		$28,421,128
10	Cost of Removal	Attachment JHP-1, Page 4, Table 2	2/	$8,192,983
11	**Total Net Plant in Service**	**Line 9 + Line 10**		**$36,614,111**
	Deferred Tax Calculation:			
12	Composite Book Depreciation Rate	As approved per R.I.P.U.C. Docket No. 4323		3.40%
13	Vintage Year Tax Depreciation:			
14	2016 Spend	Page 3 of 19, Line 21		$54,560,087
15	Cumulative Tax Depreciation	Current Year Line 14		$54,560,087
16	Book Depreciation	Line 6 * Line 12 * 50%		$730,373
17	Cumulative Book Depreciation	Current Year Line 16		$730,373
18	Cumulative Book / Tax Timer	Line 15 - Line 17		$53,829,714
19	Effective Tax Rate			35.00%
20	Deferred Tax Reserve	Line 18 * Line 19		$18,840,400
21	Less: FY 2016 Federal NOL	Page 17 of 19, Line10(j)		($10,200,749)
22	Net Deferred Tax Reserve	Line 20 + Line 21		$8,639,651
	Rate Base Calculation:			
23	Cumulative Incremental Capital Included in Rate Base	Line 11		$36,614,111
24	Accumulated Depreciation	-Line 17		($730,373)
25	Deferred Tax Reserve	-Line 22		($8,639,651)
26	Year End Rate Base	Sum of Lines 23 through 25		$27,244,087
	Revenue Requirement Calculation:			
27	Average Rate Base	Current Year Line 26 ÷ 2		$13,622,044
28	Pre-Tax ROR		3/	9.68%
29	Return and Taxes	Line 27 * Line 28		$1,318,614
30	Book Depreciation	Line 16		$730,373
31	**Annual Revenue Requirement**	**Line 29 + Line 30**		**$2,048,986**

1/ Actual Retirements

2/ Actual Cost of Removal

3/ Weighted Average Cost of Capital as approved in R.I.P.U.C. Docket No. 4323

	Ratio	Rate	Rate	Taxes	Return
Long Term Debt	49.95%	4.96%	2.48%		2.48%
Short Term Debt	0.76%	0.79%	0.01%		0.01%
Preferred Stock	0.15%	4.50%	0.01%		0.01%
Common Equity	49.14%	9.50%	4.67%	2.51%	7.18%
	100.00%		7.17%	2.51%	9.68%

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Calculation of Tax Depreciation and Repairs Deduction on FY2016 Incremental Capital Investments

Line No.				Fiscal Year 2016 (a)
	Capital Repairs Deduction			
1	Plant Additions	Page 2 of 19, Line 3		$71,452,902
2	Capital Repairs Deduction Rate	Per Tax Department	1/	22.70%
3	Capital Repairs Deduction	Line 1 * Line 2		$16,219,809
	Bonus Depreciation			
4	Plant Additions	Line 1		$71,452,902
5	Less Capital Repairs Deduction	Line 3		$16,219,809
6	Plant Additions Net of Capital Repairs Deduction	Line 4 - Line 5		$55,233,093
7	Percent of Plant Eligible for Bonus Depreciation	Per Tax Department		99.00%
8	Plant Eligible for Bonus Depreciation	Line 6 * Line 7		$54,680,762
9	Bonus Depreciation Rate (April 2015 - December 2015)	1 * 75% * 50%		37.50%
10	Bonus Depreciation Rate (January 2016 - March 2016)	1 * 25% * 50%		12.50%
11	Total Bonus Depreciation Rate	Line 9 + Line 10		50.00%
12	Bonus Depreciation	Line 8 * Line 11		$27,340,381
	Remaining Tax Depreciation			
13	Plant Additions	Line 1		$71,452,902
14	Less Capital Repairs Deduction	Line 3		$16,219,809
15	Less Bonus Depreciation	Line 12		$27,340,381
16	Remaining Plant Additions Subject to 20 YR MACRS Tax Depreciation	Line 13 - Line 14 - Line 15		$27,892,712
17	20 YR MACRS Tax Depreciation Rates			3.750%
18	Remaining Tax Depreciation	Line 16 * Line 17		$1,045,977
19	FY16 Loss incurred due to retirements	Per Tax Department		$1,760,937
20	Cost of Removal	Page 2 of 19, Line 10		$8,192,983
21	Total Tax Depreciation and Repairs Deduction	Sum of Lines 3, 12, 18, 19, and 20		$54,560,087

1/ Capital Repairs percentage is based on a three year average 2012, 2013, and 2014 of electric property qualifying for the repairs deduction as a percentage of total annual plant additions

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Revenue Requirement on FY 2015 Actual Incremental Capital Investment

Line No.				Fiscal Year 2015 (a)	Fiscal Year 2016 (b)
	Capital Investment Allowance				
1	*Non-Discretionary Capital*			$22,246,664	$0
	Discretionary Capital				
2	Lesser of Actual Cumulative Non-Discretionary Capital Additions or Spending, or Approved Spending			$54,410,377	$0
3	Total Allowed Capital Included in Rate Base	Line 1 + Line 2		$76,657,041	$0
	Depreciable Net Capital Included in Rate Base				
4	Total Allowed Capital Included in Rate Base in Current Year	Line 3		$76,657,041	
5	Retirements		1/	$15,666,095	
6	Net Depreciable Capital Included in Rate Base	Line 4 - Line 5		$60,990,946	$60,990,946
	Change in Net Capital Included in Rate Base				
7	Capital Included in Rate Base	Line 3		$76,657,041	$0
8	Depreciation Expense	Per Settlement Agreement Docket No. 4323, excluding General Plant		43,031,774	$0
9	Incremental Capital Amount	Line 7 - Line 8		$33,625,267	$33,625,267
10	Cost of Removal	Docket No. 4473 FY15 Reconciliation, Att. JHP-1, Page 4, Table 2	2/	$6,988,398	$6,988,398
11	**Total Net Plant in Service**	**Line 9 + Line 10**		**$40,613,665**	**$40,613,665**
	Deferred Tax Calculation:				
12	Composite Book Depreciation Rate	As approved per R.I.P.U.C. Docket No. 4323		3.40%	3.40%
13	Vintage Year Tax Depreciation:				
14	2015 Spend	Page 5 of 19, Line 22		$72,047,974	$2,129,689
15	Cumulative Tax Depreciation	Col (a) = Current Yr Line 14, then Prior Yr Line 15 + Current Yr Line 14		$72,047,974	$74,177,663
16	Book Depreciation	Line 6 * Line 12 * 50%		$1,036,846	$2,073,692
17	Cumulative Book Depreciation	Col (a) = Current Yr Line 16, then Prior Yr Line 17 + Current Yr Line 16		$1,036,846	$3,110,538
18	Cumulative Book / Tax Timer	Line 15 - Line 17		$71,011,128	$71,067,125
19	Effective Tax Rate			35.00%	35.00%
20	Deferred Tax Reserve	Line 18 * Line 19		$24,853,895	$24,873,494
21	Less: FY 2015 Federal NOL	Page 17 of 19, Line 10(i)		($12,108,052)	($12,108,052)
22	Net Deferred Tax Reserve	Line 20 + Line 21		$12,745,843	$12,765,442
	Rate Base Calculation:				
23	Cumulative Incremental Capital Included in Rate Base	Line 11		$40,613,665	$40,613,665
24	Accumulated Depreciation	-Line 17		($1,036,846)	($3,110,538)
25	Deferred Tax Reserve	-Line 22		($12,745,843)	($12,765,442)
26	Year End Rate Base	Sum of Lines 23 through 25		$26,830,976	$24,737,685
	Revenue Requirement Calculation:				
27	Average Rate Base	Col (a) = Current Yr Line 26 /2, then (Prior Yr + Current Yr Line 26)/2		$13,415,488	$25,784,331
28	Pre-Tax ROR		3/	9.68%	9.68%
29	Return and Taxes	Line 27 * Line 28		$1,298,619	$2,495,923
30	Book Depreciation	Line 16		$1,036,846	$2,073,692
31	**Annual Revenue Requirement**	**Line 29 + Line 30**		**$2,335,465**	**$4,569,615**

1/ Actual Retirements

2/ Actual Cost of Removal

3/ Weighted Average Cost of Capital as approved in R.I.P.U.C. Docket No. 4323

	Ratio	Rate	Rate	Taxes	Return
Long Term Debt	49.95%	4.96%	2.48%		2.48%
Short Term Debt	0.76%	0.79%	0.01%		0.01%
Preferred Stock	0.15%	4.50%	0.01%		0.01%
Common Equity	49.14%	9.50%	4.67%	2.51%	7.18%
	100.00%		7.17%	2.51%	9.68%

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Calculation of Tax Depreciation and Repairs Deduction on FY2015 Incremental Capital Investments

Line No.				Fiscal Year 2015 (a)	Fiscal Year 2016 (b)
	Capital Repairs Deduction				
1	Plant Additions	Page 4 of 19, Line 3		$76,657,041	
2	Capital Repairs Deduction Rate	Per Tax Department	1/	23.10%	
3	Capital Repairs Deduction	Line 1 * Line 2		$17,707,776	
	Bonus Depreciation				
4	Plant Additions	Line 1		$76,657,041	
5	Less Capital Repairs Deduction	Line 3		$17,707,776	
6	Plant Additions Net of Capital Repairs Deduction	Line 4 - Line 5		$58,949,265	
7	Percent of Plant Eligible for Bonus Depreciation	Per Tax Department		99.91%	
8	Plant Eligible for Bonus Depreciation	Line 6 * Line 7		$58,896,211	
9	Bonus Depreciation Rate (April 2014 - December 2014)	1 * 75% * 50%		37.50%	
10	Bonus Depreciation Rate (January 2015 - March 2015)	1 * 25% * 50%		12.50%	
11	Total Bonus Depreciation Rate	Line 9 + Line 10		50.00%	
12	Bonus Depreciation	Line 8 * Line 11		$29,448,106	
	Remaining Tax Depreciation				
13	Plant Additions	Line 1		$76,657,041	
14	Less Capital Repairs Deduction	Line 3		$17,707,776	
15	Less Bonus Depreciation	Line 12		$29,448,106	
16	Remaining Plant Additions Subject to 20 YR MACRS Tax Depreciation	Line 13 - Line 14 - Line 15		$29,501,159	$29,501,159
17	20 YR MACRS Tax Depreciation Rates			3.750%	7.219%
18	Remaining Tax Depreciation	Line 16 * Line 17		$1,106,293	$2,129,689
19	481(a) adjustment for partial retirements	Per Tax Department		$14,395,754	
20	FY15 Loss incurred due to retirements	Per Tax Department		$2,401,647	
21	Cost of Removal	Page 4 of 19, Line 10		$6,988,398	
22	Total Tax Depreciation and Repairs Deduction	Sum of Lines 3, 12, 18,19, 20, and 21		$72,047,974	$2,129,689

1/ Capital Repairs percentage is based on the actual results of the FY 2015 tax return.

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation

True-up for Capital Repairs and Bonus Depreciation Deduction on FY 2015 Capital Investments

Line No.			
	Update Capital Repairs Rate and Bonus Depreciation and Correct Weighted Average Rate Base in FY 2015 Revenue Requirement on FY 2015 Capital Investment		
1	FY 2015 Revenue Requirement using estimated capital repairs deduction rate of 21.05% and estimated bonus depreciation rate of 37.50% and no NOL .	Docket No. 4473 FY15 Reconciliation, Attachment AST-2, Page 2 of 16, Line 31	$2,173,410
2	FY 2015 Revenue Requirement using weighted average rate base, actual capital repairs deduction rate of 23.1%, actual bonus depreciation rate of 50.00%, 481(a) adjusment of $14,395,754, tax loss on retirements of $2,401,647 and NOL of $12,108,052	Page 4 of 19, Line 31(a)	$2,335,465
3	Change in revenue requirement	Line 2 - Line 1	$162,056

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Revenue Requirement on FY 2014 Actual Incremental Capital Investment

Line No.				Fiscal Year 2014 (a)	Fiscal Year 2015 (b)	Fiscal Year 2016 (c)
	Capital Investment Allowance					
1	*Non-Discretionary Capital*			$6,923,860		
	Discretionary Capital					
2	Lesser of Actual Cumulative Non-Discretionary Capital Additions or Spending, or Approved Spending			$6,400,406		
3	Total Allowed Capital Included in Rate Base	Line 1 + Line 2		$13,324,266	-	-
	Depreciable Net Capital Included in Rate Base					
4	Total Allowed Capital Included in Rate Base in Current Year	Line 3		$13,324,266	-	-
5	Retirements	Page 13 of 19, Line 9(c)	1/	($4,165,367)		
6	Net Depreciable Capital Included in Rate Base	Line 4 - Line 5		$17,489,633	17,489,633	17,489,633
	Change in Net Capital Included in Rate Base					
7	Capital Included in Rate Base	Line 3		$13,324,266	-	-
8	Depreciation Expense	Per Settlement Agreement Docket No. 4323, excluding General Plant	2/	7,173,397	$0	$0
9	Incremental Capital Amount	Line 7 - Line 8		$6,150,869	$6,150,869	$6,150,869
10	Total Cost of Removal	Page 13 of 19, Line 6(c)		($887,841)	(887,841)	(887,841)
11	**Total Net Plant in Service**	**Line 9 + Line 10**		**$5,263,028**	**$ 5,263,028**	**$ 5,263,028**
	Deferred Tax Calculation:					
12	Composite Book Depreciation Rate	As approved per R.I.P.U.C. Docket No. 4323		3.40%	3.40%	3.40%
13	Vintage Year Tax Depreciation:					
14	2014 Spend	Page 8 of 19, Line 20		$8,191,776	318,360	294,457
15	Cumulative Tax Depreciation	Current Year Line 14		$8,191,776	8,510,136	8,804,593
16	Book Depreciation	Line 6 * Line 12 * 50%		$297,324	594,648	594,648
17	Cumulative Book Depreciation	Current Year Line 16		$297,324	891,971	1,486,619
18	Cumulative Book / Tax Timer	Line 15 - Line 17		$7,894,452	$ 7,618,165	$ 7,317,974
19	Effective Tax Rate			35.00%	35.00%	35.00%
20	Deferred Tax Reserve	Line 18 * Line 19		$2,763,058	$ 2,666,358	$ 2,561,291
21	Less: FY 2014 Federal NOL	Page 17 of 19, Line 10(h)		($1,200,808)	($1,200,808)	($1,200,808)
22	Net Deferred Tax Reserve	Line 20 + Line 21		$1,562,250	$1,465,550	$1,360,483
	Rate Base Calculation:					
23	Cumulative Incremental Capital Included in Rate Base	Line 11		$5,263,028	$ 5,263,028	$ 5,263,028
24	Accumulated Depreciation	-Line 17		($297,324)	(891,971)	(1,486,619)
25	Deferred Tax Reserve	-Line 22		($1,562,250)	($1,465,550)	($1,360,483)
26	Year End Rate Base	Sum of Lines 23 through 25		$3,403,454	$ 2,905,507	$ 2,415,926
	Revenue Requirement Calculation:					
27	Average Rate Base	Col (a) = Line 26 * Page 19 of 19, Line 16, Col (b) = (Prior Year Line 26 + Current Year Line 26)/2		$ 790,571	$ 3,154,481	$ 2,660,717
28	Pre-Tax ROR		3/	9.68%	9.68%	9.68%
29	Return and Taxes	Line 27 * Line 28		76,527	305,354	257,557
30	Book Depreciation	Line 16		297,324	594,648	594,648
31	Property Taxes					
32	**Annual Revenue Requirement**	**Sum of Lines 29 through 31**		**$ 373,851**	**$ 900,001**	**$ 852,205**

1/ Actual Retirements

2/ Depreciation Expense has been prorated for 2 months (February - March 2014)

3/ Weighted Average Cost of Capital as approved in R.I.P.U.C. Docket No. 4323

	Ratio	Rate	Rate	Taxes	Return
Long Term Debt	49.95%	4.96%	2.48%		2.48%
Short Term Debt	0.76%	0.79%	0.01%		0.01%
Preferred Stock	0.15%	4.50%	0.01%		0.01%
Common Equity	49.14%	9.50%	4.67%	2.51%	7.18%
	100.00%		7.17%	2.51%	9.68%

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Calculation of Tax Depreciation and Repairs Deduction on FY2014 Incremental Capital Investments

Line No.				Fiscal Year 2014 (a)	Fiscal Year 2015 (b)	Fiscal Year 2016 (c)
	Capital Repairs Deduction					
1	Plant Additions	Page 7 of 19, Line 3		$13,324,266		
2	Capital Repairs Deduction Rate	Per Tax Department	1/	34.46%		
3	Capital Repairs Deduction	Line 1 * Line 2		$4,591,542		
	Bonus Depreciation					
4	Plant Additions	Line 1		$13,324,266		
5	Less Capital Repairs Deduction	Line 3		$4,591,542		
6	Plant Additions Net of Capital Repairs Deduction	Line 4 - Line 5		$8,732,724		
7	Percent of Plant Eligible for Bonus Depreciation	Per Tax Department		99.00%		
8	Plant Eligible for Bonus Depreciation	Line 6 * Line 7		$8,645,397		
9	Bonus Depreciation Rate (April 2013 - December 2013)	1 * 75% * 50%		37.50%		
10	Bonus Depreciation Rate (January 2014 - March 2014)	1 * 25% * 50%		12.50%		
11	Total Bonus Depreciation Rate	Line 9 + Line 10		50.00%		
12	Bonus Depreciation	Line 8 * Line 11		$4,322,699		
	Remaining Tax Depreciation					
13	Plant Additions	Line 1		$13,324,266		
14	Less Capital Repairs Deduction	Line 3		$4,591,542		
15	Less Bonus Depreciation	Line 12		$4,322,699		
16	Remaining Plant Additions Subject to 20 YR MACRS Tax Depreciation	Line 13 - Line 14 - Line 15		$4,410,025	4,410,025	4,410,025
17	20 YR MACRS Tax Depreciation Rates			3.750%	7.219%	6.677%
18	Remaining Tax Depreciation	Line 16 * Line 17		$165,376	$ 318,360	$ 294,457
19	Cost of Removal	Page 7 of 19, Line 10		($887,841)		
20	Total Tax Depreciation and Repairs Deduction	Sum of Lines 3, 12, 18 and 19		$8,191,776	$ 318,360	$ 294,457

1/ Capital Repairs percentage is based on the FY 2014 tax return.

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Revenue Requirement on FY 2013 Actual Incremental Capital Investment

Line No.				Fiscal Year 2013 (a)	Fiscal Year 2014 (b)	Fiscal Year 2015 (c)	Fiscal Year 2016 (d)
			1/				
	Capital Additions Allowance						
	Non-Discretionary Capital						
1	Non-Discretionary Additions			($5,184,396)	$0	$0	$0
	Discretionary Capital						
2	Lesser of Actual Discretionary Capital Additions or Spending or Approved Spending			($1,850,463)	$0	$0	$0
3	Total Allowed Capital Included in Rate Base in Current Year	Line 1 + Line 2		($7,034,859)	$0	$0	$0
	Depreciable Net Capital Included in Rate Base						
4	Total Allowed Capital Included in Rate Base in Current Year	Line 3		($7,034,859)	$0	$0	$0
5	Retirements			$5,838,935	$0	$0	$0
6	Net Depreciable Capital Included in Rate Base	Column (a) = Line 4 - Line 5; Columns (b), (c), & (d) = Prior Year Line 6		($12,873,794)	($12,873,794)	($12,873,794)	($12,873,794)
	Change in Net Capital Included in Rate Base						
7	Capital Included in Rate Base	Line 3		($7,034,859)	$0	$0	$0
8	Depreciation Expense	As approved per R.I.P.U.C. Docket No. 4065, excluding general plant		$0	$0	$0	$1
9	Incremental Capital Amount	Column (a) = Line 7 - Line 8; Columns (b), (c) & (d) = Prior Year Line 9		($7,034,859)	($7,034,859)	($7,034,859)	($7,034,859)
10	Total Cost of Removal			($1,895,059)	($1,895,059)	($1,895,059)	($1,895,059)
11	**Total Net Plant in Service**	**Line 9 + Line 10**		**($8,929,918)**	**($8,929,918)**	**($8,929,918)**	**($8,929,918)**
	Deferred Tax Calculation:						
12	Composite Book Depreciation Rate	As approved per R.I.P.U.C. Docket No. 4065		3.40%	3.40%	3.40%	3.40%
13	Tax Depreciation	Page 10 Line 20		($5,970,630)	($221,954)	($205,290)	($189,917)
14	Cumulative Tax Depreciation	Prior Year Line 13 + Current Year Line 14		($5,970,630)	($6,192,584)	($6,397,874)	($6,587,791)
15	Book Depreciation	Column (a) = Line 6 * Line 12 * 50%; Columns (b), (c) & (d) = Line 6 * Line 12		($218,854)	($437,709)	($437,709)	($437,709)
16	Cumulative Book Depreciation	Prior Year Line 16 + Current Year Line 15		($218,854)	($656,563)	($1,094,272)	($1,531,981)
17	Cumulative Book / Tax Timer	Line 14 - Line 16		($5,751,776)	($5,536,021)	($5,303,602)	($5,055,810)
18	Effective Tax Rate			35.00%	35.00%	35.00%	35.00%
19	Deferred Tax Reserve	Line 17 * Line 18		($2,013,121)	($1,937,607)	($1,856,261)	($1,769,533)
20	Less: FY 2013 Federal NOL	Page 17 of 19, Line 10(g)		($2,342,381)	($2,342,381)	($2,342,381)	($2,342,381)
21	Net Deferred Tax Reserve	Line 19 + Line 20		($4,355,503)	($4,279,989)	($4,198,642)	($4,111,915)
	Rate Base Calculation:						
22	Cumulative Incremental Capital Included in Rate Base	Line 11		($8,929,918)	($8,929,918)	($8,929,918)	($8,929,918)
23	Accumulated Depreciation	- Line 16		$218,854	$656,563	$1,094,272	$1,531,981
24	Deferred Tax Reserve	- Line 21		$4,355,503	$4,279,989	$4,198,642	$4,111,915
25	Year End Rate Base	Sum of Lines 20 through 22		($4,355,561)	($3,993,366)	($3,637,003)	($3,286,022)
	Revenue Requirement Calculation:						
26	Average Rate Base	(Prior Year Line 25 + Current Year Line 25) ÷2		($2,177,780)	($4,174,463)	($3,815,185)	($3,461,513)
27	Pre-Tax ROR		2/			9.68%	9.68%
28	Return and Taxes	Line 24 * Line 25				($369,310)	($335,074)
29	Book Depreciation	Line 15				($437,709)	($437,709)
30	Property Taxes		3/			($326,798)	($302,456)
31	**Annual Revenue Requirement**	**Sum of Lines 28 through 30**		**N/A**	**N/A**	**($1,133,816)**	**($1,075,239)**

1/ Column (a) - FY 2013 Electric ISR Reconciliation Filing R.I.P.U.C. Docket No. 4307

Weighted Average Cost of Capital as approved in R.I.P.U.C. Docket No. 4323

		Ratio	Rate	Rate	Taxes	Return
	Long Term Debt	49.95%	4.96%	2.48%		2.48%
2/	Short Term Debt	0.76%	0.79%	0.01%		0.01%
	Preferred Stock	0.15%	4.50%	0.01%		0.01%
	Common Equity	49.14%	9.50%	4.67%	2.51%	7.18%
		100.00%		7.17%	2.51%	9.68%

3/ FY 2016 effective property tax rate of 3.86% per Page 15 of 19, Line 34(h)

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Calculation of Tax Depreciation and Repairs Deduction on FY2013 Incremental Capital Investments

			Fiscal Year 2013 (a)	Fiscal Year 2014 (b)	Fiscal Year 2015 (c)	Fiscal Year 2016 (d)
	Capital Repairs Deduction					
1	Plant Additions	Page 9 Line 3	($7,034,859)			
2	Capital Repairs Deduction Rate	1/	12.59%			
3	Capital Repairs Deduction	Line 2 * Line 3	($885,689)			
	Bonus Depreciation					
4	Plant Additions	Line 1	($7,034,859)			
5	Less Capital Repairs Deduction	Line 3	($885,689)			
6	Plant Additions Net of Capital Repairs Deduction	Line 4 - Line 5	($6,149,170)			
7	Percent of Plant Eligible for Bonus Depreciation		100.00%			
8	Plant Eligible for Bonus Depreciation	Line 6 * Line 7	($6,149,170)			
9	Bonus Depreciation Rate (April 2012 - December 2012)	1 * 75% * 50%	37.50%			
10	Bonus Depreciation Rate (January 2013 - March 2013)	1 * 25% * 50%	12.50%			
11	Total Bonus Depreciation Rate	Line 9 + Line 10	50.00%			
12	Bonus Depreciation	Line 8 * Line 11	($3,074,585)			
	Remaining Tax Depreciation					
13	Plant Additions	Line 1	($7,034,859)			
14	Less Capital Repairs Deduction	Line 3	($885,689)			
15	Less Bonus Depreciation	Line 12	($3,074,585)			
16	Remaining Plant Additions Subject to 20 YR MACRS Tax Depreciation	Line 13 - Line 14 - Line 15	($3,074,585)	($3,074,585)	($3,074,585)	($3,074,585)
17	20 YR MACRS Tax Depreciation Rates		3.750%	7.219%	6.677%	6.177%
18	Remaining Tax Depreciation	Line 16 * Line 17	($115,297)	($221,954)	($205,290)	($189,917)
19	Cost of Removal	Page 9 Line 10	($1,895,059)			
20	Total Tax Depreciation and Repairs Deduction	Sum of Lines 3, 12, 18, 19	($5,970,630)	($221,954)	($205,290)	($189,917)

1/ Capital Repairs percentage is based on the FY 2013 tax reurn.

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Revenue Requirement on FY 2012 Actual Incremental Capital Investment

Line No.				Fiscal Year 2012 (a)	Fiscal Year 2013 (b)	Fiscal Year 2014 (c)	Fiscal Year 2015 (d)	Fiscal Year 2016 (e)
	Capital Additions Allowance		1/					
	Non-Discretionary Capital							
1	Non-Discretionary			($4,019,686)	$0	$0	$0	$0
	Discretionary Capital							
2	Lesser of Actual Discretionary Capital Additions or Spending or Approved Spending			$4,163,942	$0	$0	$0	$0
3	Total Allowed Capital Included in Rate Base	Line 1 + Line 2		$144,256	$0	$0	$0	$0
	Depreciable Net Capital Included in Rate Base							
4	Total Allowed Capital Included in Rate Base in Current Year	Line 3		$144,256	$0	$0	$0	$0
5	Retirements			$19,938	$0	$0	$0	$0
6	Net Depreciable Capital Included in Rate Base	Column (a) = Line 4 - Line 5; Columns (b), (c), (d) & (e) = Prior Year Line 6		$124,318	$124,318	$124,318	$124,318	$124,318
	Change in Net Capital Included in Rate Base							
7	Incremental Capital Amount	Column (a) = Line 4, Columns (b), (c), (d) & (e) = Prior Year Line 7		$144,256	$144,256	$144,256	$144,256	$144,256
8	Cost of Removal			($771,131)	($771,131)	($771,131)	($771,131)	($771,131)
9	**Total Net Plant in Service**	**Line 7 + Line 8**		**($626,875)**	**($626,875)**	**($626,875)**	**($626,875)**	**($626,875)**
	Deferred Tax Calculation:							
10	Composite Book Depreciation Rate	As approved per R.I.P.U.C. Docket No. 4065		3.40%	3.40% $0	3.40%	3.40%	3.40%
11	Tax Depreciation	Page 12 Line 20		($654,965)	$2,107	$1,949	$1,803	$1,667
12	Cumulative Tax Depreciation	Prior Year Line 12 + Current Year Line 11		($654,965)	($652,858)	($650,909)	($649,107)	($647,439)
13	Book Depreciation	Column (a) = -Line 6 * Line 10 * 50%; Columns (b), (c), (d) & (e)= Line 6 * Line 10		($2,113)	($4,227)	($4,227)	($4,227)	($4,227)
14	Cumulative Book Depreciation	Prior Year Line 14 + Current Year Line 13		($2,113)	($6,340)	($10,567)	($14,794)	($19,021)
15	Cumulative Book / Tax Timer	Line 12 - Line 14		($652,852)	($646,518)	($640,342)	($634,313)	($628,419)
16	Effective Tax Rate			35.00%	35.00%	35.00%	35.00%	35.00%
17	Deferred Tax Reserve	Line 15 * Line 16		($228,498)	($226,281)	($224,120)	($222,009)	($219,947)
18	Less: FY 2013 Federal NOL	Page 17 of 19, Line 10(f)		($4,310,461)	($4,310,461)	($4,310,461)	($4,310,461)	($4,310,461)
19	Net Deferred Tax Reserve	Line 17 + Line 18		($4,538,959)	($4,536,742)	($4,534,581)	($4,532,470)	($4,530,407)
	Rate Base Calculation:							
20	Cumulative Incremental Capital Included in Rate Base	Line 9		($626,875)	($626,875)	($626,875)	($626,875)	($626,875)
21	Accumulated Depreciation	-Line 14		$2,113	$6,340	$10,567	$14,794	$19,021
22	Deferred Tax Reserve	- Line 19		$4,538,959	$4,536,742	$4,534,581	$4,532,470	$4,530,407
23	Year End Rate Base	Sum of Lines 18 through 20		$3,914,197	$3,916,207	$3,918,273	$3,920,389	$3,922,553
	Revenue Requirement Calculation:							
24	Average Rate Base	(Prior Year Line 23 + Current Year Line 23) ÷2					$3,919,331	$3,921,471
25	Pre-Tax ROR		2/				9.68%	9.68%
26	Return and Taxes	Line 24 * Line 25					$379,391	$379,598
27	Book Depreciation	Line 13					($4,227)	($4,227)
28	Property Taxes		3/				($24,344)	($23,626)
29	**Annual Revenue Requiremen**	**Sum of Lines 26 through 28**		**N/A**	**N/A**	**N/A**	**$350,820**	**$351,745**

1/ Column (a) - FY 2012 Electric ISR Reconciliation Filing R.I.P.U.C. Docket No. 4218.
2/ Weighted Average Cost of Capital per Settlement Agreement R.I.P.U.C. Docket No. 4323

	Ratio	Rate	Rate	Taxes	Return
Long Term Debt	49.95%	4.96%	2.48%		2.48%
Short Term Debt	0.76%	0.79%	0.01%		0.01%
Preferred Stock	0.15%	4.50%	0.01%		0.01%
Common Equity	49.14%	9.50%	4.67%	2.51%	7.18%
	100.00%		7.17%	2.51%	9.68%

3/ FY 2016 effective property tax rate of 3.86% per Page 15 of 19, Line 34(h)

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Calculation of Tax Depreciation and Repairs Deduction on FY2012 Incremental Capital Investments

Line No.				Fiscal Year 2012 (a)	Fiscal Year 2013 (b)	Fiscal Year 2014 (c)	Fiscal Year 2015 (d)	Fiscal Year 2016 (d)
	Capital Repairs Deduction							
1	Plant Additions	Page 11 Line 3		$144,256				
2	Capital Repairs Deduction Rate	Per Tax Department	1/	21.05%				
3	Capital Repairs Deduction	Line 2 * Line 3		$30,366				
	Bonus Depreciation							
4	Plant Additions	Line 1		$144,256				
5	Less Capital Repairs Deduction	Line 3		$30,366				
6	Plant Additions Net of Capital Repairs Deduction	Line 4 - Line 5		$113,890				
7	Percent of Plant Eligible for Bonus Depreciation	Per Tax Department	2/	85.00%				
8	Plant Eligible for Bonus Depreciation	Line 6 * Line 7		$96,807				
9	Bonus Depreciation Rate (April 2011 - December 2011)	1 * 75% * 100%		75.00%				
10	Bonus Depreciation Rate (January 2012 - March 2012)	1 * 25% * 50%		12.50%				
11	Total Bonus Depreciation Rate	Line 9 + Line 10		87.50%				
12	Bonus Depreciation	Line 8 * Line 11		$84,706				
	Remaining Tax Depreciation							
13	Plant Additions	Line 1		$144,256				
14	Less Capital Repairs Deduction	Line 3		$30,366				
15	Less Bonus Depreciation	Line 12		$84,706				
16	Remaining Plant Additions Subject to 20 YR MACRS Tax Depreciation	Line 13 - Line 14 - Line 15		$29,184	$29,184	$29,184	$29,184	$29,184
17	20 YR MACRS Tax Depreciation Rates			3.750%	7.219%	6.677%	6.177%	5.713%
18	Remaining Tax Depreciation	Line 16 * Line 17		$1,094	$2,107	$1,949	$1,803	$1,667
19	Cost of Removal	Page 11 Line 8		($771,131)				
20	Total Tax Depreciation and Repairs Deduction	Sum of Lines 3, 12, 18, 19		($654,965)	$2,107	$1,949	$1,803	$1,667

1/ Per Docket 4307 FY 2013 Electric ISR Reconciliation Filing at Attachment WRR-1, Page 8, Line 2

2/ Since not all property additions qualify for bonus depreciation and because a project must be started after the beginning of the bonus period, January 1, 2008, an estimate of 85% is used rather than 100%.

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2012 - 2014 Incremental Capital Investment Summary

Line No.			Actual Fiscal Year 2012 (a)	Actual Fiscal Year 2013 (b)	Fiscal Year 2014 (c)
	Capital Investment				
1	ISR - Eligible Capital Investment	Col (a) =FY 2012 ISR Reconciliation Filing Docket No. 4218, Att. WRR-1, Page 3 of 4, Line 20(b); Col (b) = FY 2013 ISR Reconciliation Filing Docket No. 4307, Att WRR-1, Page 7 of 12, Line 31 (b); Col (c) = Page 9 of 14, Line 22(b)	$48,946,456	$44,331,141	$56,129,551
2	ISR - Eligible Capital Additions included in Rate Base per R.I.P.U.C. Docket No. 4323	Schedule MDL-3-ELEC Page 53, Docket No. 4323: Col (a)= Line Note 1(a); Col (b)= Line Note 2(b); Col (c)= Line Note 3(e)	$48,802,200	$51,366,341	$42,805,284
3	Incremental ISR Capital Investment	Line 1 - Line 2	$144,256	($7,035,200)	$13,324,267
	Cost of Removal				
4	ISR - Eligible Cost of Removal	Col (a) =FY 2012 ISR Reconciliation Filing Docket No. 4218; Col (b)= FY 2013 Reconciliation Filing Docket No. 4307; Col (c) = Attachement JLG-1, Page 6 of 24, Table 2	$5,807,869	5,179,941	$5,007,992
5	ISR - Eligible Cost of Removal in Rate Base per R.I.P.U.C. Docket No. 4323	Workpaper MDL-19-ELEC Page 2, Docket No. 4323: Col (a)= Line Note 1(a); Col (b)= Line Note 2(b); Line Note 3(e)	$6,579,000	$7,075,000	$5,895,833
6	Incremental Cost of Removal	Line 4 - Line 5	($771,131)	($1,895,059)	($887,841)
	Retirements				
7	ISR - Eligible Retirements/Actual	Col (a)= FY 2012 ISR Reconciliation Filing Docket No. 4218; Col (b) = FY 2013 ISR Reconciliation Filing Docket No. 4307; Col (c) = Per Company Books	$7,740,446	$14,255,714	$3,299,874
8	ISR - Eligible Retirements/Estimated	Col (a)= FY 2012 ISR Proposal Filing Docket No. 4218; Col (b)= FY 2013 ISR Proposal Filing Docket No. 4307; Col (c) = Line 2 (c) * 17.44% Retirement rate per Docket 4323 (Workpaper MDL-19-ELEC Page 3)	$7,720,508	$8,416,779	$7,465,242
9	Incremental Retirements	Line 7 - Line 8	$19,938	$5,838,935	($4,165,367)

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
FY 2016 Capital Investment

Line No.	Discretionary Capital		Actuals (a)
1	Cumulative FY 2015 Discretionary Capital **ADDITIONS**	Docket No. 4473 FY15 Reconciliation Att. AST-1 Page 12, Line 4	$123,541,880
2	FY 2016 Discretionary Capital **ADDITIONS**	Attachment JHP-1, Page 3, Table 1	$35,488,464
3	Cumulative Actual Discretionary Capital Additions	Line 1 + Line 2	$159,030,344
4	Cumulative FY 2015 Discretionary Capital **SPENDING**	Docket No. 4473 FY15 Reconciliation Att. AST-1 Page 12, Line 7	$144,500,411
5	FY 2016 Discretionary Capital **SPENDING**	Attachment JHP-1, Page 5, Table 3	$47,556,053
6	Cumulative Actual Discretionary Capital Spending	Line 4 + Line 5	$192,056,464
			As Approved in Docket No. 4539
7	Cumulative FY 2015 Approved Discretionary Capital **SPENDING**	Docket No. 4473 FY15 Reconciliation Att. AST-1 Page 12, Line 10	$127,736,150
8	FY 2016 Approved Discretionary Capital **SPENDING**	Docket No. 4539 FY16 Proposal, Section 2, Page 45, Chart 11	$46,476,000
9	Cumulative Actual Approved Discretionary Capital Spending	Line 7 + Line 8	$174,212,150
			Total Allowed
10	Cumulative Allowed Discretionary Capital Included in Rate Base	Lesser of Line 3, Line 6, or Line 9	$159,030,344
11	Prior Year Cumulative Allowed Disretionary Capital Included in Rate Base	Docket No. 4473 FY15 Reconciliation Filing Att. AST-1, Page 12, Line 11	$123,541,880
12	**Total Allowed Discretionary Capital Included in Rate Base Current Year**	Line 10 - Line 11	**$35,488,464**

The Narragansett Electric Company
d/b/a National Grid
FY 2016 ISR Property Tax Recovery Adjustment
(000s)

Line		(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)
		RY End	ISR Additions	Non-ISR Add's	Total Add's	Bk Depr (1)	Retirements	COR	End of FY 2014
1	Plant In Service	$1,358,470	$9,335	$1,885	$11,220		$550		$1,370,240
2									
3	Accumulated Depr	$611,570				$7,498	$550	($835)	$618,783
4									
5	Net Plant	$746,900							$751,457
6									
7	Property Tax Expense	$29,743							$27,502
8									
9	Effective Prop tax Rate	3.98%							3.66%
10									
11									
12	**Effective tax Rate Calculation**	End of FY 2014	ISR Additions	Non-ISR Add's	Total Add's	Bk Depr (1)	Retirements	COR	End of FY 2015
13									
14	Plant In Service	$1,370,240	$76,657	$5,801	$82,458		($15,666)		$1,437,032
15									
16	Accumulated Depr	$618,783				$46,522	($15,666)	($6,988)	$642,650
17									
18	Net Plant	$751,457							$794,382
19									
20	Property Tax Expense	$27,502							$32,549
21									
22	Effective Prop tax Rate	3.66%							4.10%
23									
24	**Effective tax Rate Calculation**	End of FY 2015	ISR Additions	Non-ISR Add's	Total Add's	Bk Depr (1)	Retirements	COR	End of FY 2016
25									
26	Plant In Service	$1,437,032	$71,453	$17,773	$89,226		($28,490)		$1,497,768
27									
28	Accumulated Depr	$642,650				$48,690	($28,490)	($8,193)	$654,657
29									
30	Net Plant	$794,382							$843,111
31									
32	Property Tax Expense	$32,549							$31,580
33									
34	Effective Prop tax Rate	4.10%							3.75%
35									

Line		(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)
36		(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)	(k)
37	**Property Tax Recovery Calculation**											
38		Cumulative Increm. ISR Prop. Tax for FY14				Cumulative Increm. ISR Prop. Tax for FY15				Cumulative Increm. ISR Prop. Tax for FY16		
39			2 mos									
40	ISR Additions		$9,335				$76,657				$71,453	
41	Book Depreciation: base allowance on ISR eligible plant		($7,173)				($43,032)				($43,032)	
42	Book Depreciation: current year ISR additions		($324)				($1,037)				($730)	
43	COR		$835				$6,988				$8,193	
44												
45	Net Plant Additions		$2,672				$39,577				$35,884	
46												
47	RY Effective Tax Rate		3.98%				3.98%				3.98%	
48	ISR Property Tax Recovery on FY 2014 vintage investment			$106				$105				$91
49	ISR Property Tax Recovery on FY 2015 vintage investment							$1,576				$1,535
50	ISR Property Tax Recovery on FY 2016 vintage investment											$1,429
51												
52												
53	ISR Year Effective Tax Rate	3.66%				4.10%				3.75%		
54	RY Effective Tax Rate	3.98%	-0.32%			3.98%	0.12%			3.98%	-0.24%	
55	RY Effective Tax Rate 2 mos for FY 2014		-0.05%									
56	RY Net Plant times 2 mo rate	$746,900	-0.05%	($401)		$746,900 * 0.12%		$861		$746,900 * -0.24%		($1,767)
57	FY 2014 Net Adds times ISR Year Effective Tax rate	$2,672	-0.32%	($9)		$2,632 * 0.12%		$3		$2,296 * -0.24%		($5)
58	FY 2015 Net Adds times ISR Year Effective Tax rate					$39,577 * 0.12%		$46		$38,540 * -0.24%		($91)
59	FY 2016 Net Adds times ISR Year Effective Tax rate									$35,884 * -0.24%		($85)
60	Total Property Tax due to rate differential			($410)				$910				($1,863)
61												
62	Total ISR Property Tax Recovery			($304)				$2,590				$1,192

The Narragansett Electric Company
d/b/a National Grid
FY 2016 ISR Property Tax Recovery Adjustment (cont)

Line Notes	
1(a)-9(a)	Per Rate Year cost of service
1(b)-(d),(f)	Per FY 2014 Electric ISR Reconciliation Filing R.I.P.U.C. Docket No. 4382
3(a)	Per Rate Year cost of service
3(e)	Base Rate depreciation expense allowance $44,986 * 2/12+ Line 1(b) * Composite Depreciation rate 3.40% * 50% * 2/12
3(f),(g)	Per FY 2014 Electric ISR Reconciliation R.I.P.U.C. Docket No. 4382
3(h)	Line 3 cols (a) +(e)+(f)+(g)
5(h)	Line 1(h) - Line 3(h)
7(h)	FY 2014 property tax expense per Company books
9(h)	Line 7(h) / Line 5(h)
14(b)	Page 4, Line 3
14(c)	FY 2015 forecasted in service amount
14(f)	Page 4, Line 5
16(e)	Rate Year depn allowance of $44,986 + (Line 1(d)+1(f)* composite depreciation rate of 3.40%) + (Line 14(d)+14(f)* composite depreciation rate of 3.40% * 50%)
16(g)	Page 4, Line 10
18(h)	Line 14(h) - Line 16(h)
20(h)	FY 2015 forecasted property tax expense
22(h)	Line 20(h) / Line 18(h)
40(a) - 60(c)	per FY 2014 Electric ISR Reconciliation R.I.P.U.C. Docket No. 4382

Line Notes	
40(f)	Line 14(b)
41(f)	Per Page 4 of 19, Line 8
42(f)	Per Page 4 of 19, Line 16
43(f)	- Line 16(g)
44(f)	Sum of lines 40 through 43
47(f)	Line 9(a)
48(g)	Line 47(f) * Line 55(e)
49(g)	Line 45(f) * Line 47(f)
51(e)	Line 22(h)
52(e)	Line 9(a)
52(f)	Line 52(e) - Line 53(e)
54(e)	Line 5(a)
55(e)	Line 40(b) -((Line 40(b) +Line 1(f)) *3.4%*50%*2/12) + Line 41(b)+Line 43(b)-((Line 40(b)+Line 1(f)*3.4%)
56(e)	Line 45(f)
54(f)-56(f)	Line 52(f)
54(g)	Line 54(e) * Line 54(f)
55(g)	Line 55(e) * Line 55(f)
56(g)	Line 56(e) * Line 56(f)
57(g)	Sum of Lines 54(g) through 56(g)
59(g)	Line 48(g) + Line 49(g) + Line 57(g)

Line Notes	
40(j)	Line 26(b)
41(j)	Per Page 2 of 19, Line 8
42(j)	Per Page 2 of 19, Line 16
43(j)	- Line 28(g)
45(j)	Sum of lines 40 through 43
47(j)	Line 9(a)
48(k)	Line 47(j) * Line 55(f)
49(k)	Line 45(f) * Line 47(f)
51(i)	Line 34(h)
52(i)	Line 9(a)
52(j)	Line 51(e) - Line 52(e)
54(i)	Line 5(a)
55(i)	Line 40(b) -((Line 40(b) +Line 1(f)) *3.4%*50%*2/12) + Line 41(b)+Line 43(b)-((Line 40(b)+Line 1(f)*3.4%)
56(i)	Line 45(f) - ((Line 45(f) - Line 26(f))*3.4%*50%)
54(j)-56(j)	Line 52(j)
54(k)	Line 54(i) * Line 54(j)
55(k)	Line 55(i) * Line 55(j)
56(k)	Line 56(i) * Line 56(j)
57(k)	Sum of Lines 54(g) through 56(g)
59(k)	Line 48(k) + Line 49(k) + Line 57(k)

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
Deferred Income Tax ("DIT") Provisions and Net Operating Losses ("NOL")

		(a)	(b)	(c)	(d)	(e)	(f)	(g)	(h)	(i)	(j)
							CY 2011	CY 2012	Jan-2013	Feb 13 - Jan 14	
1	Total Base Rate Plant DIT Provision						$15,856,458	$ 5,546,827	$ 521,151	$ (1,967,911)	
		FY 2012	FY 2013	FY 2014	FY 2015	FY 2016	FY 2012	FY 2013	FY 2014	FY 2015	FY 2016
2	Total Base Rate Plant DIT Provision						$13,279,050	$ 4,353,286	$ (1,639,926)	$ -	$ -
3	Incremental FY 12	$ (228,498)	$ (226,281)	$ (224,120)	$ (222,009)	$ (219,947)	$ (228,498)	$ 2,217	$ 2,161	$ 2,110	$ 2,063
4	Incremental FY 13		$ (2,013,121)	$ (1,937,607)	$ (1,856,261)	$ (1,769,533)		$ (2,013,121)	$ 75,514	$ 81,347	$ 86,727
5	Incremental FY 14			$ 2,763,058	$ 2,770,421	$ 2,769,418			$ 2,763,058	$ 7,363	$ (1,003)
6	FY 2015				$24,853,895	$24,873,494				$24,853,895	$ 19,599
7	FY 2016					$18,840,400					$18,840,400
8	TOTAL Plant DIT Provision	$ (228,498)	$ (2,239,403)	$ 601,331	$25,546,046	$44,493,832	$13,050,552	$ 2,342,381	$ 1,200,808	$24,944,714	$18,947,786
9	NOL						$ 4,310,461	$11,442,811	$19,452,677	$12,108,052	$10,200,749
10	Lesser of NOL or DIT Provision						$ 4,310,461	$ 2,342,381	$ 1,200,808	$12,108,052	$10,200,749

1(f) Per Dkt 4323 Compliance filing Attachment 1, Page 64 of 71, Line 19(e) less Line 19(a)
1(g)-1(i) Per Dkt 4323 Compliance filing Attachment 1, Page 70 of 71, Lines 32, 42, and 48
3(a)-7(e) ADIT per vintage year ISR revenue requirement calculations
3(f) -7(j) Year over year change in ADIT shown in Cols (a) through (e)
8 Sum of lines 3 through 7

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
True-Up for FY 2012 through FY 2016 Net Operating Losses ("NOL")

		(a)	(b)	(c)	(d)	(e)
		Revenue Requirement Year				
		FY 2012	FY 2013	FY 2014	FY 2015	FY 2016
1	Return on Rate Base	9.30%	9.84%	9.68%	9.68%	9.68%
		Vintage Capital Investment Year				
		FY 2012	FY 2013	FY 2014	FY 2015	FY 2016
2	Lesser of NOL or DIT Provision	$ 4,310,461	$ 2,342,381	$ 1,200,808	$ 12,108,052	$ 10,200,749
	<u>Revenue Requirement Increase due to NOL</u>					
		Revenue Requirement Year				
	Vintage Capital Investment Year	FY 2012	FY 2013	FY 2014	FY 2015	FY 2016
3	FY 2012	$ 200,436	$ 424,149	$ 417,253	$ 417,253	$ 417,253
4	FY 2013	$ -	$ 115,245	$ 226,743	$ 226,743	$ 226,743
5	FY 2014	$ -	$ -	$ 27,000	$ 116,238	$ 116,238
6	FY 2015	$ -	$ -	$ -	$ 586,030	$ 1,172,059
7	FY 2016	$ -	$ -	$ -	$ -	$ 493,716
8	TOTAL	**$ 200,436**	**$ 539,395**	**$ 670,996**	**$ 1,346,263**	**$ 2,426,009**
9	**Total FY 2012 through FY 2014 revenue requirement impact**					**$ 1,410,826**
10	**Recovery per year**					**470,275**

1(a) Per Docket No. 4065
1(b)-(c) Per vintage year revenue requirement calculations at Page 9 of 19, and Page 7 of 19, respectively
2 Per Page 17 of 19, Line 10
3 Line 2(a) * Line 1(a) * 50%; Line 2(a) * Line 1(b); Line 2(a) * Line 1(c); Line 2(a) * Line 1(d); Line 2(a) * Line 1(e)
4 Line 2(b) * Line 1(b) * 50%; Line 2(b) * Line 1(c); Line 2(b) * Line 1(d); Line 2(b) * Line 1(e)
5 Line 2(c) * Line 1(c) * Page 16, Line 16 (f); Line 2(c) * Line 1(d); Line 2(c) * Line 1(e)
6 Sum of Lines 3 through 5
7 Line 6(a) + Line 6(b) + Line 6(c)
8 Line 7(e) / 3

The Narragansett Electric Company
d/b/a National Grid
FY 2016 Electric ISR Revenue Requirement Reconciliation
ISR Additions February and March 2014

Line No.	Month No.	Month	FY 2014 Plant Additions	In Rates	Not In Rates	Weight	Weighted Average
			(a)	(b)	(c) = (a) - (b)	(d)	(f) = (d) * (c)
1							
2	1	Apr-13	4,677,463	4,280,528	396,934	0.958	380,395
3	2	May-13	4,677,463	4,280,528	396,934	0.875	347,317
4	3	Jun-13	4,677,463	4,280,528	396,934	0.792	314,240
5	4	Jul-13	4,677,463	4,280,528	396,934	0.708	281,162
6	5	Aug-13	4,677,463	4,280,528	396,934	0.625	248,084
7	6	Sep-13	4,677,463	4,280,528	396,934	0.542	215,006
8	7	Oct-13	4,677,463	4,280,528	396,934	0.458	181,928
9	8	Nov-13	4,677,463	4,280,528	396,934	0.375	148,850
10	9	Dec-13	4,677,463	4,280,528	396,934	0.292	115,772
11	10	Jan-14	4,677,463	4,280,528	396,934	0.208	82,695
12	11	Feb-14	4,677,463	-	4,677,463	0.125	584,683
13	12	Mar-14	4,677,463	-	4,677,463	0.042	194,894
14		Total	$56,129,551	$42,805,284	$13,324,267		$3,095,026
15	**Total February & March 2014**				**$ 9,354,925**		
16	**FY2014 Weighted Average Incremental Rate Base Percentage**						**23.23%**

Column (a)Page 13 of 19, Line 1(c)
Column(b) Page 13 of 19, Line 2(c)
Line 15 = Line 12(c) + Line 13(c)
Line 16 = Line 14(f)/Line 14(c)

Testimony of
Adam S. Crary

PRE-FILED DIRECT TESTIMONY

OF

ADAM S. CRARY

August 1, 2016

Table of Contents

I. INTRODUCTION AND QUALIFICATIONS

Q. Please state your full name and business address.

A. My name is Adam S. Crary, and my business address is 40 Sylvan Road, Waltham, Massachusetts 02451.

Q. By whom are you employed and in what capacity?

A. I am a Senior Analyst for Electric Pricing, New England in the Regulation and Pricing Department of National Grid USA Service Company, Inc. This department provides rate-related support to The Narragansett Electric Company d/b/a National Grid (the Company or National Grid).

Q. Please describe your educational background and training.

A. In 1995, I graduated from Berklee College of Music in Boston, MA with a Bachelor of Music degree.

Q. Please describe your professional experience?

A For approximately eight years between 2000 and 2014, I was employed by Computer Sciences Corporation as a Pricing Analyst for their Managed Hosting and Cloud Computing business divisions. I began my employment as a Senior Pricing Analyst with National Grid in June 2014.

Q. Have you previously testified before Rhode Island Public Utilities Commission (PUC)?

A. Yes.

II. PURPOSE OF TESTIMONY

Q. What is the purpose of your testimony?

A. My testimony is in support of the Fiscal Year 2016 (FY 2016) Electric ISR Plan and presents the following:

- the results of the annual reconciliation of the actual FY 2016 capital investment revenue requirement and the Operations and Maintenance (O&M) expense to the actual revenue billed;
- the status of the Fiscal Year 2014 (FY 2014) CapEx and O&M reconciliations;
- the status of the Fiscal Year 2015 (FY 2015) CapEx and O&M reconciliations;
- the proposed CapEx and O&M Reconciling Factors to be effective October 1, 2016; and
- the typical bill impacts related to the proposed reconciling factors.

Q. How is your testimony organized?

A. My testimony is organized as follows:

- Section III presents the Summary of FY 2016 CapEx and O&M Reconciliations;
- Section IV presents the results of the FY 2016 CapEx Revenue and the Actual

CapEx Revenue Requirement Reconciliation, the calculation of the proposed CapEx Reconciling Factors, and the status of the refund and recovery of the FY 2014 and FY 2015 CapEx reconciliation balances, respectively;

- Section V presents the results of the FY 2016 O&M Revenue and Expense Reconciliation, the calculation of the proposed O&M Reconciling Factor, and the status of the refunds of the FY 2014 O&M and FY 2015 O&M over-recovered balances; and
- Section VI presents the rate class bill impact analysis.

III. SUMMARY OF FY 2016 CAPEX AND O&M RECONCILIATIONS

Q. Please summarize the results of the FY 2016 CapEx and O&M reconciliations.

A. A summary of the results of the FY 2016 CapEx and O&M reconciliations is presented in Attachment ASC-1. Pursuant to the ISR Provision, the annual reconciliations require the comparison of the actual revenue billed during the plan year through the approved CapEx and O&M Factors to the actual CapEx and O&M revenue requirement. The calculation of the actual revenue requirement is presented in the testimony of Company Witness, Amy S. Tabor. Attachment ASC-1 indicates that the result of the CapEx reconciliation is a net over-recovery of approximately $244,000, and the result of the O&M reconciliation is an over-recovery of approximately $1.7 million.

Q. Please briefly summarize the operation of the tariff provision that provides the Company the opportunity to recover certain costs through the ISR Plan.

A. In accordance with the ISR Provision, the Company is allowed to recover the revenue requirement related to capital investments through CapEx Factors and to recover the revenue requirement related to certain expenditures for Inspection and Maintenance (I&M) and Vegetation Management (VM) activities through O&M Factors.

In the ISR Plan filing for the upcoming plan year, the Company determines the CapEx Factors, which are designed to recover the revenue requirement on the forecasted capital investment for the ISR Plan's investment year, plus the cumulative revenue requirement associated with prior years' capital investments, and the O&M Factors which are designed to recover the forecasted plan year O&M expense. Afterward, on an annual basis, the Company is required to reconcile the actual cumulative CapEx revenue requirement and the actual O&M expense to actual billed revenue generated from the CapEx Factors and the O&M Factors. The over or under-recovered balances resulting from the CapEx and O&M reconciliations are either refunded to or recovered from customers through the CapEx Reconciling Factors and the O&M Reconciling Factor, respectively.

IV. CAPEX RECONCILIATION & PROPOSED CAPEX RECONCILING FACTORS

Q. What is the result of the CapEx reconciliation for FY 2016?

A. The FY 2016 CapEx reconciliation by rate class is presented in Attachment ASC-2, page 1, Lines 4 through 6. Line 5 shows the CapEx Revenue billed during the period April 1, 2015 through March 31, 2016 of approximately $8.8 million. Line 4 shows the actual CapEx Revenue Requirement amount of approximately $8.6 million. Line 6 shows the over-recovered balance of approximately $244,000, representing a net over-recovery of this revenue requirement.

Q. Why has the Company prepared the CapEx Factor reconciliation by rate class?

A. The ISR Provision requires that the CapEx Reconciling Factors be calculated as class-specific per-kWh factors designed to recover or refund the under or over-recovery of the actual Cumulative Revenue Requirement, as allocated to each rate class by the Rate Base Allocator, for the prior fiscal year. The Rate Base Allocator is the percentage of total rate base allocated to each rate class determined in the most recently-approved allocated cost of service study. Page 1, Line 4 of Attachment ASC-2 shows the allocation of the actual CapEx revenue requirement to each rate class based upon the Rate Base Allocator approved in the Company's 2012 general rate case in Docket No. 4323.

Q. Please describe the results of the rate class reconciliation.

A. As shown on Attachment ASC-2, page 1, the allocated actual FY 2016 revenue requirement on capital investment (Line 4) is subtracted from the CapEx Factor revenue billed for each rate class (Line 5), resulting in a net over-recovery (Line 6), which totals approximately $244,000. The detail of each rate class' CapEx revenue billed is presented on Attachment ASC-2, page 2.

Q. Please describe the amount included on Line 7.

A. The amounts presented on Line 7 reflect the final balance related to the refund of the FY 2014 over-recovery reconciliation balance. The refund of the FY 2014 CapEx reconciliation balance is presented on page 3. Of the $1,343,599 over-recovery for FY 2014 approved by the PUC for refund, the Company refunded $1,280,895 from October 1, 2014 through September 30, 2015. As described in Docket No. 4473, the Company is including each rate class' residual balance with the FY 2016 CapEx Reconciliation Factors.

Q. How is the Company proposing to refund the FY 2016 CapEx over-recovery?

A. The Company is proposing to implement a CapEx Reconciling Factor for each rate class that is consistent with the results of the rate class reconciliation. The calculation of the proposed CapEx Reconciling Factors is presented in Attachment ASC-2, page 1. The over/(under)-recoveries on Line 8 are divided by each class' forecasted kWh deliveries for the period October 1, 2016 through September 30, 2017 on Line 9. The class-specific CapEx Reconciling Factors, as shown on Line 10, are as follows:

Rate Class	Charge/(Credit) per kWh
A-16 & A-60	(0.001¢)
C-06	(0.003¢)
G-02	(0.006¢)
G-32 & B-32	(0.010¢)
G-62 & B-62	0.013¢
Streetlights	(0.039¢)
X-01	0.000¢

Q. Is the Company providing the status of the under-recovery balance from the FY 2015 CapEx reconciliation?

A. Yes. The status of the refund of the FY 2015 CapEx reconciliation under-recovery balance is presented in Attachment ASC-2, page 4. As of June 30, 2016, the balance reflects a remaining under-recovery of $1,214,502, which the Company continues to recover from customers. The Company will continue to recover this balance through September 30, 2016.

Q. How will the Company propose to refund or recover any residual balances as of September 30, 2016?

A. Pursuant to the ISR Provision, the amount approved for recovery or refund through the CapEx Reconciling Factors is subject to reconciliation. Therefore, the Company will present the final reconciliation of balances from the FY 2015 reconciliation in the FY 2017 ISR Plan Reconciliation Filing and include each rate class' residual balance from the FY 2015 CapEx reconciliation with the FY 2017 CapEx Reconciliation Factors.

V. O&M RECONCILIATION & PROPOSED O&M RECONCILING FACTOR

Q. What is the result of the O&M reconciliation for FY 2016?

A. The O&M reconciliation for FY 2016 is presented in Attachment ASC-3, page 1. Line 2 shows O&M Revenue billed through the O&M Factors from April 1, 2015 through March 31, 2016 of approximately $11.7 million. Line 1 shows the actual O&M expense for FY 2016 of approximately $9.9 million, which is supported in the testimony of Company Witnesses, Mr. James H. Patterson and Ms. Tabor. Line 3 shows the difference of approximately $1.7 million, representing an over-recovery.

Q. Please describe the amount included on Line 4.

A. The amount presented on Line 4 reflects the final balance related to the recovery of the FY 2014 O&M reconciliation over-recovered balance. The recovery of the FY 2014 O&M reconciliation balance is presented on page 3. Of the $401,715 over-recovery for FY 2014 approved by the PUC for refund, the Company refunded $383,441 from October 1, 2014 through September 30, 2015. As described in Docket No. 4473, the Company is including the residual balance with the FY 2016 O&M Reconciliation Factor.

Q. Is the Company providing the O&M Factor Revenue?

A. Yes. Attachment ASC-3, page 2 presents the O&M Factor Revenue billed by month.

Q. What is the proposed O&M Reconciling Factor?

A. The proposed O&M Reconciling Factor is calculated on Attachment ASC-3, page 1. The over-recovery of $1,753,249 on Line 5 is divided by the forecasted kWhs during the recovery period, October 1, 2016 through September 30, 2017, on Line 6, resulting in a credit of (0.022¢) per kWh on Line 7.

Q. Why is the Company proposing a uniform per kWh O&M Reconciling Factor?

A. Pursuant to the ISR Provision, the O&M Reconciling Factor is a uniform per-kWh factor designed to recover or refund the under- or over-billing of actual I&M and VM expense for the prior fiscal year, based on forecasted kWhs during the recovery or refund period beginning October 1.

Q. Is the Company providing the status of the refund of the over-recovery of the FY 2015 O&M reconciliation?

A. Yes. The status of the balance from the FY 2015 O&M reconciliation is presented in Attachment ASC-3, page 4. As of June 30, 2016, there is a remaining over-recovery balance of $153,542, which the Company will continue to refund through September 30, 2016.

Q. How does the Company propose to refund or recover the residual balance at September 30, 2016?

A. Pursuant to the ISR Provision, the amount approved for recovery or refund through the O&M Reconciling Factor is subject to reconciliation. Therefore, the Company will present the final reconciliation of the balances from the FY 2015 O&M reconciliation in the FY 2017 ISR Reconciliation Filing and include the residual balance of the FY 2015 O&M reconciliation with the FY 2017 O&M Reconciliation Factor.

VI. <u>TYPICAL BILL ANALYSIS</u>

Q. Is the Company providing a typical bill analysis to illustrate the impact of the proposed rates on each of the Company's rate classes?

A. Yes. The typical bill analysis illustrating the monthly bill impact of the proposed rate changes for each rate class is provided in Attachment ASC-4. The impact of the proposed CapEx Reconciling Factor and the proposed O&M Reconciling Factor on a typical residential customer receiving Standard Offer Service and using 500 kWhs per month is a decrease of $0.44, or approximately 0.5%, from $95.01 to $94.57.

Q. Is the Company providing a proposed Summary of Retail Delivery Rates, Tariff No. 2095, reflecting the reconciling factors proposed in this filing?

A. No, not at this time. The Company is submitting concurrent with this filing a Pension and Post-retirement benefits other than Pension (PBOP) Adjustment Factor (PAF) filing, and will be proposing a PAF for effect on October 1, 2016. The Company will file a Summary of Retail Delivery Rates reflecting all rate changes proposed for October 1, 2016 in compliance with the PUC's orders in this proceeding and the PAF proceeding.

VII. CONCLUSION

Q. Does this conclude your testimony?

A. Yes.

List of Attachments

Attachment ASC-1

Attachment ASC-1

FY2016 ISR Plan Annual Reconciliation Summary

FY 2016 ISR Plan Annual Reconciliation Summary

Line No.		CapEx (a)	O&M (b)	Total (c)
(1)	Actual Revenue Requirement	$8,571,356	$9,926,006	$18,497,362
(2)	Revenue Billed	$8,814,974	$11,661,161	$20,476,135
(3)	Total Over/Under Recovery	$243,618	$1,735,155	$1,978,773

Line Notes:
(1) Column (a) per Attachment AST-2, Page 1, Line (13)
Column (b) per Attachment AST-2, page 1, Line (4)
Column (c) per Attachment AST-2, page 1, Line (14)
(2) Column (a) per Attachment ASC-2, page 1, Line (5); Column (b) per Attachment ASC-3, page 1, line (2)
(3) Line (2) - Line (1)

Attachment ASC-2

Attachment ASC-2

CapEx Reconciliations and Proposed CapEx Reconciling Factors

Proposed CapEx Reconciling Factors
For Fiscal Year 2016 ISR Plan
For the Recovery (Refund) Period October 1, 2016 through September 30, 2017

Line No.		Total (a)	Residential A-16 / A-60 (b)	Small C&I C-06 (c)	General C&I G-02 (d)	200 kW Demand B-32 / G-32 (e)	3000 kW Demand B-62 / G-62 (f)	Lighting S-10 / S-14 (g)	Propulsion X-01 (h)
(1)	Actual FY2016 Capital Investment Revenue Requirement	$8,571,356							
(2)	Total Rate Base ($000s)	$561,738	$296,490	$54,542	$82,460	$77,651	$19,545	$29,286	$1,764
(3)	Rate Base as Percentage of Total	100.00%	52.78%	9.71%	14.68%	13.82%	3.48%	5.21%	0.31%
(4)	Allocated Actual FY2016 Capital Investment Revenue Requirement	$8,571,356	$4,524,029	$832,238	$1,258,228	$1,184,851	$298,231	$446,870	$26,910
(5)	CapEx Revenue Billed	$8,814,974	$4,516,691	$849,598	$1,343,302	$1,384,956	$226,599	$466,751	$27,076
(6)	Total Over (Under) Recovery for FY 2016	$243,618	($7,337)	$17,360	$85,075	$200,105	($71,632)	$19,881	$166
(7)	Remaining Over (Under) For FY 2014	$62,704	$44,067	$4,085	($2,736)	$10,276	$1,356	$5,691	($35)
(8)	Total Over (Under) Recovery	$306,323	$36,730	$21,445	$82,339	$210,381	($70,276)	$25,572	$132
(9)	Forecasted kWhs - October 1, 2016 through September 30, 2017	7,633,940,149	3,060,702,775	608,002,263	1,299,920,678	2,067,203,370	509,272,252	65,408,199	23,430,612
(10)	Proposed Class-specific CapEx Reconciling Factor (Credit) per kWh		($0.00001)	($0.00003)	($0.00006)	($0.00010)	$0.00013	($0.00039)	$0.00000

Line Notes:
(1) Column (a) per Attachment AST-2, Page 1, Line (13)
(2) per RIPUC 4323, Compliance Attachment 3A, (Schedule HSG-1), page 2, Line (10)
(3) Line (2) ÷ Line (2) Total Column
(4) Line (1) Total Column x Line (3)
(5) per page 2
(6) Line (5) - Line (4)
(7) per page 3
(8) Line (6) + Line (7)
(9) per Company forecasts
(10) -1 x [Line (8) ÷ Line (9)], truncated to 5 decimal places

Fiscal Year 2016 Operations & Maintenance Reconciliation
For the Period April 1, 2015 through March 31, 2016
For the Recovery/Refund Period October 1, 2016 through September 30, 2017

CapEx Revenue By Rate Class:

Line No.		Residential A-16 / A-60			Small C&I C-06			General C&I G-02			200 kW Demand B-32 / G-32		
	Month	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)
(1)	Apr-15	$120,933	($23,355)	$144,288	$24,203	($4,725)	$28,928	$36,831	($7,359)	$44,190	$29,980	($6,899)	$36,879
	May-15	$257,862	($41,392)	$299,254	$53,652	($8,875)	$62,527	$92,262	($14,479)	$106,741	$92,251	($14,226)	$106,477
	Jun-15	$289,525	($46,089)	$335,613	$59,548	($9,659)	$69,207	$102,474	($16,385)	$118,860	$112,569	($15,613)	$128,183
	Jul-15	$365,552	($58,192)	$423,744	$65,322	($10,682)	$76,004	$105,183	($17,522)	$122,705	$105,985	($15,753)	$121,737
	Aug-15	$436,981	($69,521)	$506,502	$74,632	($12,159)	$86,791	$110,358	($19,150)	$129,508	$116,222	($16,714)	$132,936
	Sep-15	$438,171	($69,725)	$507,895	$73,750	($12,014)	$85,764	$107,980	($19,460)	$127,440	$112,284	($17,153)	$129,438
	Oct-15	$319,007	($28,703)	$347,710	$61,829	($5,680)	$67,509	$109,873	($9,487)	$119,361	$109,452	($8,404)	$117,857
	Nov-15	$342,151	$132,952	$209,199	$68,093	$25,529	$42,563	$123,549	$49,044	$74,505	$120,424	$32,633	$87,790
	Dec-15	$557,905	$171,136	$386,769	$101,992	$30,374	$71,619	$167,523	$56,040	$111,483	$142,195	$35,145	$107,049
	Jan-16	$591,760	$180,257	$411,503	$104,320	$30,791	$73,528	$167,725	$55,951	$111,773	$139,763	$33,822	$105,941
	Feb-16	$555,591	$169,212	$386,378	$104,308	$30,791	$73,517	$161,742	$52,671	$109,071	$141,426	$34,043	$107,383
	Mar-16	$538,783	$164,085	$374,698	$105,238	$31,191	$74,047	$165,433	$55,222	$110,211	$139,075	$34,465	$104,609
(2)	Apr-16	$263,335	$80,197	$183,138	$53,384	$15,790	$37,594	$85,857	$28,404	$57,453	$117,091	$18,415	$98,677
	Total	$5,077,555	$560,863	$4,516,691	$950,271	$100,672	$849,598	$1,536,791	$193,489	$1,343,302	$1,478,717	$93,761	$1,384,956

		3000 kW Demand B-62 / G-62			Lighting S-10 / S-14			Propulsion X-01		
	Month	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)	Total Revenue (a)	CapEx Rec Factor Revenue (b)	Base Revenue (c)
(1)	Apr-15	$4,218	($1,506)	$5,724	$23,749	($2,350)	$26,099	$52	($147)	$198
	May-15	$14,991	($3,011)	$18,002	$28,160	($4,661)	$32,821	$2,080	($345)	$2,425
	Jun-15	$15,811	($3,166)	$18,977	$23,339	($3,865)	$27,204	$2,214	($355)	$2,569
	Jul-15	$14,824	($2,938)	$17,762	$24,369	($4,035)	$28,404	$2,038	($327)	$2,365
	Aug-15	$19,724	($4,120)	$23,845	$27,820	($4,607)	$32,427	$2,083	($334)	$2,418
	Sep-15	$18,167	($3,744)	$21,911	$31,013	($5,135)	$36,148	$2,213	($355)	$2,568
	Oct-15	$18,169	($2,022)	$20,191	$38,082	($3,322)	$41,404	$2,075	($197)	$2,272
	Nov-15	$21,344	$7,667	$13,677	$56,534	$19,126	$37,408	$2,386	$1,058	$1,328
	Dec-15	$25,592	$8,344	$17,248	$72,502	$22,201	$50,301	$3,710	$1,175	$2,535
	Jan-16	$24,086	$7,310	$16,776	$77,132	$23,616	$53,516	$3,325	$1,014	$2,311
	Feb-16	$28,598	$8,741	$19,857	$59,683	$18,276	$41,407	$3,346	$1,021	$2,325
	Mar-16	$30,036	$8,138	$21,898	$56,559	$17,319	$39,240	$3,435	$1,048	$2,387
(2)	Apr-16	$15,434	$4,702	$10,731	$29,366	$8,992	$20,373	$1,979	$604	$1,376
	Total	$250,995	$24,395	$226,599	$548,307	$81,556	$466,751	$30,937	$3,861	$27,076

Line Notes:
(1) Reflects revenue associated with consumption on and after April 1
(2) Reflects revenue associated with consumption prior to April 1

Column Notes:
(a) from monthly revenue reports
(b) per page 3 and page 4
(c) Column (a) - Column (b)

Fiscal Year 2014 CapEx Reconciliation of Over Recovery
For the Period April 1, 2013 through March 31, 2014
For the Recovery Period October 1, 2014 through September 30, 2015

Line No.		Total	Residential A-16 / A-60		Small C&I C-06		General C&I G-02		200 kW Demand B-32 / G-32	
		(a)	(b)	(c)	(b)	(c)	(b)	(c)	(b)	(c)
(1)	Beginning Over(Under) Recovery	$1,343,599		$705,228		$129,527		$195,785		$193,300
(2)	CapEx Reconciling Factors			($0.00021)		($0.00021)		($0.00015)		($0.00009)
			kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue
(3)	Oct-14	($41,183)	89,174,129	($18,727)	18,333,618	($3,850)	43,026,182	($6,454)	68,967,904	($6,207)
	Nov-14	($94,458)	212,914,730	($44,712)	42,256,130	($8,874)	105,046,828	($15,757)	161,088,205	($14,498)
	Dec-14	($106,421)	258,735,389	($54,334)	47,804,902	($10,039)	107,417,420	($16,113)	166,069,386	($14,946)
	Jan-15	($113,759)	291,662,816	($61,249)	51,734,569	($10,864)	106,722,023	($16,008)	163,691,448	($14,732)
	Feb-15	($115,424)	296,494,019	($62,264)	54,934,751	($11,536)	107,682,866	($16,152)	171,658,577	($15,449)
	Mar-15	($107,535)	269,475,029	($56,590)	53,157,201	($11,163)	106,023,306	($15,903)	162,869,749	($14,658)
	Apr-15	($98,540)	236,491,062	($49,663)	47,845,897	($10,048)	104,328,236	($15,649)	163,001,410	($14,670)
	May-15	($86,988)	197,106,718	($41,392)	42,260,625	($8,875)	96,525,702	($14,479)	158,062,439	($14,226)
	Jun-15	($95,132)	219,470,754	($46,089)	45,994,759	($9,659)	109,235,977	($16,385)	173,482,075	($15,613)
	Jul-15	($109,449)	277,105,218	($58,192)	50,866,504	($10,682)	116,814,448	($17,522)	175,028,365	($15,753)
	Aug-15	($126,605)	331,051,909	($69,521)	57,900,123	($12,159)	127,667,492	($19,150)	185,706,065	($16,714)
	Sep-15	($127,586)	332,021,682	($69,725)	57,209,577	($12,014)	129,734,011	($19,460)	190,592,923	($17,153)
(4)	Oct-15	($57,815)	136,679,586	($28,703)	27,046,079	($5,680)	63,249,344	($9,487)	93,381,181	($8,404)
(5)	Total	($1,280,895)	3,148,383,041	($661,160)	597,344,735	($125,442)	1,323,473,835	($198,521)	2,033,599,726	($183,024)
(6)	Ending Over(Under) Recovery	$62,704		$44,067		$4,085		($2,736)		$10,276

		3000 kW Demand B-62 / G-62		Lighting S-10 / S-14		Propulsion X-01	
		(b)	(c)	(b)	(c)	(b)	(c)
(1)	Beginning Over(Under) Recovery		$44,440		$71,348		$3,971
(2)	CapEx Reconciling Factors		($0.00009)		($0.00103)		($0.00017)
		kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue
(3)	Oct-14	37,631,785	($3,387)	2,341,343	($2,412)	866,815	($147)
	Nov-14	45,152,379	($4,064)	6,036,531	($6,218)	1,974,718	($336)
	Dec-14	37,859,725	($3,407)	7,005,971	($7,216)	2,145,782	($365)
	Jan-15	32,344,546	($2,911)	7,443,788	($7,667)	1,922,981	($327)
	Feb-15	40,289,862	($3,626)	5,909,720	($6,087)	1,816,228	($309)
	Mar-15	38,729,815	($3,486)	5,278,565	($5,437)	1,752,188	($298)
	Apr-15	35,585,017	($3,203)	4,850,450	($4,996)	1,833,529	($312)
	May-15	33,452,922	($3,011)	4,525,372	($4,661)	2,026,489	($345)
	Jun-15	35,177,423	($3,166)	3,752,332	($3,865)	2,088,454	($355)
	Jul-15	32,643,370	($2,938)	3,917,710	($4,035)	1,922,369	($327)
	Aug-15	45,780,912	($4,120)	4,472,362	($4,607)	1,965,492	($334)
	Sep-15	41,598,984	($3,744)	4,985,365	($5,135)	2,088,151	($355)
(4)	Oct-15	22,465,148	($2,022)	3,225,266	($3,322)	1,160,775	($197)
(5)	Total	478,711,888	($43,084)	63,744,775	($65,657)	23,563,971	($4,006)
(6)	Ending Over(Under) Recovery		$1,356		$5,691		($35)

Line Notes:
(1) per R.I.P.U.C. Docket No. 4382, Attachment SMM-2-Revised, page 1, line (8)
(2) per R.I.P.U.C. Docket No. 4382, Attachment SMM-2-Revised, page 1, line (10)
(3) prorated for usage on and after October 1st
(4) prorated for usage prior to October 1st
(5) sum of kWhs & revenue
(6) Line (1) + Line (5)

Column Notes:
(a) sum of Column (b) from each rate
(b) from Company revenue report
(c) Column (b) x CapEx Reconciling Factor

Fiscal Year 2015 CapEx Reconciliation of Under Recovery
For the Period April 1, 2014 through March 31, 2015
For the Recovery Period November 1, 2015 through September 30, 2016

Line No.		Total	Residential A-16 / A-60		Small C&I C-06		General C&I G-02		200 kW Demand B-32 / G-32	
		(a)	(b)	(c)	(b)	(c)	(b)	(c)	(b)	(c)
(1)	Beginning Over(Under) Recovery	($3,605,451)		($1,926,844)		($353,418)		($516,285)		($474,456)
(2)	CapEx Reconciling Factors			$0.00067		$0.00063		$0.00052		$0.00021
			kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue
(3)	Nov-15	$268,010	198,436,428	$132,952	40,522,337	$25,529	94,315,077	$49,044	155,396,762	$32,633
	Dec-15	$324,416	255,426,956	$171,136	48,212,025	$30,374	107,769,579	$56,040	167,357,712	$35,145
	Jan-16	$332,762	269,040,539	$180,257	48,875,074	$30,791	107,598,964	$55,951	161,057,221	$33,822
	Feb-16	$314,756	252,555,825	$169,212	48,875,183	$30,791	101,290,898	$52,671	162,108,994	$34,043
	Mar-16	$311,468	244,902,745	$164,085	49,509,526	$31,191	106,196,954	$55,222	164,119,909	$34,465
	Apr-16	$288,263	219,628,885	$147,151	45,986,650	$28,972	100,224,108	$52,117	160,895,802	$33,788
	May-16	$248,370	186,428,234	$124,907	40,465,218	$25,493	93,924,677	$48,841	149,258,346	$31,344
	Jun-16	$302,904	240,069,008	$160,846	47,884,377	$30,167	110,243,864	$57,327	172,790,748	$36,286
	Jul-16	$0	-	$0	-	$0	-	$0	-	$0
	Aug-16	$0	-	$0	-	$0	-	$0	-	$0
	Sep-16	$0	-	$0	-	$0	-	$0	-	$0
(4)	Oct-16	$0	-	$0	-	$0	-	$0	-	$0
(5)	Total	$2,390,949		$1,250,547		$233,308		$427,213		$271,527
(6)	Ending Over(Under) Recovery	($1,214,502)		($676,296)		($120,110)		($89,072)		($202,929)

Line No.		3000 kW Demand B-62 / G-62		Lighting S-10 / S-14		Propulsion X-01	
		(b)	(c)	(b)	(c)	(b)	(c)
(1)	Beginning Over(Under) Recovery		($130,424)		($192,405)		($11,618)
(2)	CapEx Reconciling Factors		$0.00023		$0.00320		$0.00054
		kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue	kWhs	CapEx Reconciling Factor Revenue
(3)	Nov-15	33,336,135	$7,667	5,976,945	$19,126	1,958,351	$1,058
	Dec-15	36,278,905	$8,344	6,937,889	$22,201	2,176,665	$1,175
	Jan-16	31,781,472	$7,310	7,379,873	$23,616	1,878,619	$1,014
	Feb-16	38,005,812	$8,741	5,711,285	$18,276	1,890,314	$1,021
	Mar-16	35,380,553	$8,138	5,412,154	$17,319	1,940,779	$1,048
	Apr-16	37,512,938	$8,628	5,156,191	$16,500	2,051,947	$1,108
	May-16	31,794,000	$7,313	2,953,889	$9,452	1,887,984	$1,020
	Jun-16	35,398,730	$8,142	2,821,171	$9,028	2,052,916	$1,109
	Jul-16	-	$0	-	$0	-	$0
	Aug-16	-	$0	-	$0	-	$0
	Sep-16	-	$0	-	$0	-	$0
(4)	Oct-16	-	$0	-	$0	-	$0
(5)	Total	279,488,545	$64,282	42,349,397	$135,518	15,837,575	$8,552
(6)	Ending Over(Under) Recovery		($66,141)		($56,887)		($3,066)

Line Notes:
(1) per R.I.P.U.C. Docket No. 4473, Attachment ASC-6, page 1, line (8)
(2) per R.I.P.U.C. Docket No. 4473, Attachment ASC-6, page 1, line (10)
(3) prorated for usage on and after November 1, 2015
(4) prorated for usage prior to October 1st, 2016
(5) sum of kWhs & revenue
(6) Line (1) + Line (5)

Column Notes:
(a) sum of Column (b) from each rate
(b) from Company revenue report
(c) Column (b) x CapEx Reconciling Factor

Attachment ASC-3

Attachment ASC-3

O&M Reconciliations and Proposed O&M Reconciling Factor

Fiscal Year 2016 Operation & Maintenance Reconciliation and Proposed Factor
Reconciliation of O&M Revenue and Actual O&M Revenue Requirement
For Fiscal Year 2016 ISR Plan
For the Recovery (Refund) Period October 1, 2016 through September 30, 2017

Line No.		
(1)	Actual FY 2016 O&M Revenue Requirement	$9,926,006
(2)	O&M Revenue Billed	$11,661,161
(3)	Total Over (Under) Recovery for FY 2016	$1,735,155
(4)	Remaining Over (Under) For FY 2014	$18,274
(5)	Total Over (Under) Recovery	$1,753,429
(6)	Forecasted kWhs - October 1, 2016 through September 30, 2017	7,633,940,149
(7)	Proposed O&M Reconciling Factor (Credit) per kWh	($0.00022)

Line Notes:
(1) per Attachment AST-2, page 1, Line (4)
(2) per Page 2
(3) Line (2) - Line (1)
(4) per page 3 Line (4)
(5) Line (3) + Line (4)
(6) per Company forecast
(7) -1 x [Line (5) ÷ Line (6)], truncated to 5 decimal places

Fiscal Year 2016 Operations & Maintenance Reconciliation
For the Period April 1, 2015 through March 31, 2016
For the Recovery/Refund Period October 1, 2016 through September 30, 2017

O&M Factor Revenue:

Line No.	Month	O&M Revenue (a)	Prior Period Reconciliation Factor Revenue (b)	Base O&M Revenue (c)
(1)	Apr-15	$387,567	($13,958)	$401,525
	May-15	$792,130	($26,698)	$818,828
	Jun-15	$863,217	($29,460)	$892,677
	Jul-15	$987,920	($32,915)	$1,020,835
	Aug-15	$1,137,808	($37,727)	$1,175,535
	Sep-15	$1,149,499	($37,912)	$1,187,410
	Oct-15	$899,411	($17,360)	$916,771
	Nov-15	$825,636	($31,797)	$857,432
	Dec-15	$960,877	($37,450)	$998,326
	Jan-16	$984,391	($37,657)	$1,022,048
	Feb-16	$928,367	($36,626)	$964,993
	Mar-16	$923,631	($36,448)	$960,079
(2)	Apr-16	$426,014	($18,687)	$444,700
	Total	$11,266,467	($394,693)	$11,661,161

Line Notes:
(1) Reflects kWhs consumed on and after April 1
(2) Reflects kWhs consumed prior to April 1

Column Notes:
(a) from monthly revenue reports
(b) per page 3 and page 4
(c) Column (a) - Column (b)

Fiscal Year 2014 O&M Reconciliation of Over Recovery
For the Period April 1, 2013 through March 31, 2014
For the Recovery Period October 1, 2014 through September 30, 2015

Line No.		Total	
(1)	Over (Under) Recovery	$401,715	
(2)	O&M Reconciling Factor	($0.00005)	
		Total kWhs	Total Revenue
		(a)	(b)
	Oct-14	260,341,776	($13,017)
	Nov-14	574,469,521	($28,723)
	Dec-14	627,038,575	($31,352)
	Jan-15	655,522,171	($32,776)
	Feb-15	678,786,055	($33,939)
	Mar-15	637,285,978	($31,864)
	Apr-15	593,935,698	($29,697)
	May-15	533,960,267	($26,698)
	Jun-15	589,201,774	($29,460)
	Jul-15	658,297,984	($32,915)
	Aug-15	754,544,355	($37,727)
	Sep-15	758,230,693	($37,912)
	Oct-15	347,207,379	($17,360)
(3)	Total	7,668,822,226	($383,441)
(4)	Over (Under) Recovery		$18,274

Line Descriptions:
(1) per R.I.P.U.C. Docket No. 4382, Attachment SMM-3, page 1, line (5)
(2) per R.I.P.U.C. Docket No. 4382, Attachment SMM-3, page 1, line (7)
(3) sum of kWhs & revenue
(4) Line (1) + Line (3)

Column Descriptions:
(a) per Company Records
(b) Line (2) x Column (a)

Fiscal Year 2015 O&M Reconciliation of Over Recovery
For the Period April 1, 2014 through March 31, 2015
For the Recovery Period November 1, 2015 through September 30, 2016

Line No.		Total	
(1)	Over (Under) Recovery	$434,885	
(2)	O&M Reconciling Factor	($0.00006)	
		Total kWhs (a)	Total Revenue (b)
	Nov-15	529,942,035	($31,797)
	Dec-15	624,159,731	($37,450)
	Jan-16	627,611,762	($37,657)
	Feb-16	610,438,311	($36,626)
	Mar-16	607,462,620	($36,448)
	Apr-16	571,456,521	($34,287)
	May-16	506,712,348	($30,403)
	Jun-16	611,260,814	($36,676)
	Jul-16	-	$0
	Aug-16	-	$0
	Sep-16	-	$0
	Oct-16	-	$0
(3)	Total	4,689,044,142	($281,343)
(4)	Over (Under) Recovery		$153,542

Line Descriptions:
(1) per R.I.P.U.C. Docket No. 4473, Attachment ASC-3 Revised, page 1, line (5)
(2) per R.I.P.U.C. Docket No. 4473, Attachment ASC-3 Revised, page 1, line (7)
(3) sum of kWhs & revenue
(4) Line (1) + Line (3)

Column Descriptions:
(a) per Company Records
(b) Line (2) x Column (a)

Attachment ASC-4

Attachment ASC-4

Typical Bill Analysis

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to A-16 Rate Customers

	Present Rates				Proposed Rates				Increase (Decrease)								
									$				% of Total Bill				
Monthly kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Percentage of Customers
150	$18.47	$13.02	$1.31	$32.80	$18.35	$13.02	$1.31	$32.68	($0.12)	$0.00	$0.00	($0.12)	-0.4%	0.0%	0.0%	-0.4%	13.7%
300	$31.04	$26.04	$2.38	$59.46	$30.79	$26.04	$2.37	$59.20	($0.25)	$0.00	($0.01)	($0.26)	-0.4%	0.0%	0.0%	-0.4%	17.5%
400	$39.42	$34.72	$3.09	$77.23	$39.09	$34.72	$3.08	$76.89	($0.33)	$0.00	($0.01)	($0.34)	-0.4%	0.0%	0.0%	-0.4%	11.8%
500	$47.81	$43.40	$3.80	$95.01	$47.39	$43.40	$3.78	$94.57	($0.42)	$0.00	($0.02)	($0.44)	-0.4%	0.0%	0.0%	-0.5%	10.8%
600	$56.19	$52.07	$4.51	$112.77	$55.68	$52.07	$4.49	$112.24	($0.51)	$0.00	($0.02)	($0.53)	-0.5%	0.0%	0.0%	-0.5%	9.4%
700	$64.57	$60.75	$5.22	$130.54	$63.98	$60.75	$5.20	$129.93	($0.59)	$0.00	($0.02)	($0.61)	-0.5%	0.0%	0.0%	-0.5%	7.7%
1,200	$106.47	$104.15	$8.78	$219.40	$105.46	$104.15	$8.73	$218.34	($1.01)	$0.00	($0.05)	($1.06)	-0.5%	0.0%	0.0%	-0.5%	15.0%
2,000	$173.52	$173.58	$14.46	$361.56	$171.84	$173.58	$14.39	$359.81	($1.68)	$0.00	($0.07)	($1.75)	-0.5%	0.0%	0.0%	-0.5%	14.1%

		Present Rates		Proposed Rates	
Customer Charge		$5.00		$5.00	
RE Growth Factor		$0.17		$0.17	
LIHEAP Charge		$0.73		$0.73	
Transmission Energy Charge	kWh x	$0.02705		$0.02705	
Distribution Energy Charge	kWh x	$0.04283	(1)	$0.04199	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08679		$0.08679	

Note (1): includes the current CapEx Reconciling Factor of 0.067¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.001¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/ kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to A-60 Rate Customers

Monthly kWh	Present Rates				Proposed Rates				Increase (Decrease)								Percentage of Customers
									$				% of Total Bill				
	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	
150	$11.45	$13.02	$1.02	$25.49	$11.33	$13.02	$1.01	$25.36	($0.12)	$0.00	($0.01)	($0.13)	-0.5%	0.0%	0.0%	-0.5%	13.7%
300	$22.00	$26.04	$2.00	$50.04	$21.75	$26.04	$1.99	$49.78	($0.25)	$0.00	($0.01)	($0.26)	-0.5%	0.0%	0.0%	-0.5%	17.5%
400	$29.04	$34.72	$2.66	$66.42	$28.70	$34.72	$2.64	$66.06	($0.34)	$0.00	($0.02)	($0.36)	-0.5%	0.0%	0.0%	-0.5%	11.8%
500	$36.07	$43.40	$3.31	$82.78	$35.65	$43.40	$3.29	$82.34	($0.42)	$0.00	($0.02)	($0.44)	-0.5%	0.0%	0.0%	-0.5%	10.8%
600	$43.10	$52.07	$3.97	$99.14	$42.60	$52.07	$3.94	$98.61	($0.50)	$0.00	($0.03)	($0.53)	-0.5%	0.0%	0.0%	-0.5%	9.4%
700	$50.14	$60.75	$4.62	$115.51	$49.55	$60.75	$4.60	$114.90	($0.59)	$0.00	($0.02)	($0.61)	-0.5%	0.0%	0.0%	-0.5%	7.7%
1,200	$85.31	$104.15	$7.89	$197.35	$84.30	$104.15	$7.85	$196.30	($1.01)	$0.00	($0.04)	($1.05)	-0.5%	0.0%	0.0%	-0.5%	15.0%
2,000	$141.58	$173.58	$13.13	$328.29	$139.90	$173.58	$13.06	$326.54	($1.68)	$0.00	($0.07)	($1.75)	-0.5%	0.0%	0.0%	-0.5%	14.1%

		Present Rates		Proposed Rates	
Customer Charge		$0.00		$0.00	
RE Growth Factor		$0.17		$0.17	
LIHEAP Charge		$0.73		$0.73	
Transmission Energy Charge	kWh x	$0.02705		$0.02705	
Distribution Energy Charge	kWh x	$0.02936	(1)	$0.02852	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08679		$0.08679	

Note (1): includes the current CapEx Reconciling Factor of 0.067¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.001¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/ kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to C-06 Rate Customers

	Present Rates				Proposed Rates				Increase (Decrease)								
									$				% of Total Bill				
Monthly kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Percentage of Customers
250	$30.53	$20.91	$2.14	$53.58	$30.32	$20.91	$2.13	$53.36	($0.21)	$0.00	($0.01)	($0.22)	-0.4%	0.0%	0.0%	-0.4%	35.2%
500	$50.06	$41.82	$3.83	$95.71	$49.65	$41.82	$3.81	$95.28	($0.41)	$0.00	($0.02)	($0.43)	-0.4%	0.0%	0.0%	-0.4%	17.0%
1,000	$89.13	$83.64	$7.20	$179.97	$88.31	$83.64	$7.16	$179.11	($0.82)	$0.00	($0.04)	($0.86)	-0.5%	0.0%	0.0%	-0.5%	19.0%
1,500	$128.20	$125.46	$10.57	$264.23	$126.97	$125.46	$10.52	$262.95	($1.23)	$0.00	($0.05)	($1.28)	-0.5%	0.0%	0.0%	-0.5%	9.8%
2,000	$167.27	$167.28	$13.94	$348.49	$165.63	$167.28	$13.87	$346.78	($1.64)	$0.00	($0.07)	($1.71)	-0.5%	0.0%	0.0%	-0.5%	19.1%

		Present Rates		Proposed Rates	
Customer Charge		$10.00		$10.00	
RE Growth Factor		$0.26		$0.26	
LIHEAP Charge		$0.73		$0.73	
Transmission Energy Charge	kWh x	$0.02566		$0.02566	
Distribution Energy Charge	kWh x	$0.03855	(1)	$0.03773	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.063¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.003¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/ kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-02 Rate Customers

Hours Use: 200

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
20	4000	$393.35	$334.56	$30.33	$758.24	$390.39	$334.56	$30.21	$755.16	($2.96)	$0.00	($0.12)	($3.08)	-0.4%	0.0%	0.0%	-0.4%
50	10000	$859.79	$836.40	$70.67	$1,766.86	$852.39	$836.40	$70.37	$1,759.16	($7.40)	$0.00	($0.30)	($7.70)	-0.4%	0.0%	0.0%	-0.4%
100	20000	$1,637.19	$1,672.80	$137.92	$3,447.91	$1,622.39	$1,672.80	$137.30	$3,432.49	($14.80)	$0.00	($0.62)	($15.42)	-0.4%	0.0%	0.0%	-0.4%
150	30000	$2,414.59	$2,509.20	$205.16	$5,128.95	$2,392.39	$2,509.20	$204.23	$5,105.82	($22.20)	$0.00	($0.93)	($23.13)	-0.4%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$135.00		$135.00	
RE Growth Factor		$2.46		$2.46	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.59		$3.59	
Transmission Energy Charge	kWh x	$0.01068		$0.01068	
Distribution Demand Charge-xcs 10 kW	kW x	$5.58		$5.58	
Distribution Energy Charge	kWh x	$0.00728	(1)	$0.00654	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.052¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.006¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-02 Rate Customers

Hours Use: 300

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease) $				Increase (Decrease) % of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
20	6000	$457.13	$501.84	$39.96	$998.93	$452.69	$501.84	$39.77	$994.30	($4.44)	$0.00	($0.19)	($4.63)	-0.4%	0.0%	0.0%	-0.5%
50	15000	$1,019.24	$1,254.60	$94.74	$2,368.58	$1,008.14	$1,254.60	$94.28	$2,357.02	($11.10)	$0.00	($0.46)	($11.56)	-0.5%	0.0%	0.0%	-0.5%
100	30000	$1,956.09	$2,509.20	$186.05	$4,651.34	$1,933.89	$2,509.20	$185.13	$4,628.22	($22.20)	$0.00	($0.92)	($23.12)	-0.5%	0.0%	0.0%	-0.5%
150	45000	$2,892.94	$3,763.80	$277.36	$6,934.10	$2,859.64	$3,763.80	$275.98	$6,899.42	($33.30)	$0.00	($1.38)	($34.68)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$135.00		$135.00	
RE Growth Factor		$2.46		$2.46	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.59		$3.59	
Transmission Energy Charge	kWh x	$0.01068		$0.01068	
Distribution Demand Charge-xcs 10 kW	kW x	$5.58		$5.58	
Distribution Energy Charge	kWh x	$0.00728	(1)	$0.00654	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.052¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.006¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-02 Rate Customers

Hours Use: 400

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
20	8000	$520.91	$669.12	$49.58	$1,239.61	$514.99	$669.12	$49.34	$1,233.45	($5.92)	$0.00	($0.24)	($6.16)	-0.5%	0.0%	0.0%	-0.5%
50	20000	$1,178.69	$1,672.80	$118.81	$2,970.30	$1,163.89	$1,672.80	$118.20	$2,954.89	($14.80)	$0.00	($0.61)	($15.41)	-0.5%	0.0%	0.0%	-0.5%
100	40000	$2,274.99	$3,345.60	$234.19	$5,854.78	$2,245.39	$3,345.60	$232.96	$5,823.95	($29.60)	$0.00	($1.23)	($30.83)	-0.5%	0.0%	0.0%	-0.5%
150	60000	$3,371.29	$5,018.40	$349.57	$8,739.26	$3,326.89	$5,018.40	$347.72	$8,693.01	($44.40)	$0.00	($1.85)	($46.25)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$135.00		$135.00	
RE Growth Factor		$2.46		$2.46	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.59		$3.59	
Transmission Energy Charge	kWh x	$0.01068		$0.01068	
Distribution Demand Charge-xcs 10 kW	kW x	$5.58		$5.58	
Distribution Energy Charge	kWh x	$0.00728	(1)	$0.00654	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.052¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.006¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-02 Rate Customers

Hours Use: 500

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease) $				Increase (Decrease) % of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
20	10000	$584.69	$836.40	$59.21	$1,480.30	$577.29	$836.40	$58.90	$1,472.59	($7.40)	$0.00	($0.31)	($7.71)	-0.5%	0.0%	0.0%	-0.5%
50	25000	$1,338.14	$2,091.00	$142.88	$3,572.02	$1,319.64	$2,091.00	$142.11	$3,552.75	($18.50)	$0.00	($0.77)	($19.27)	-0.5%	0.0%	0.0%	-0.5%
100	50000	$2,593.89	$4,182.00	$282.33	$7,058.22	$2,556.89	$4,182.00	$280.79	$7,019.68	($37.00)	$0.00	($1.54)	($38.54)	-0.5%	0.0%	0.0%	-0.5%
150	75000	$3,849.64	$6,273.00	$421.78	$10,544.42	$3,794.14	$6,273.00	$419.46	$10,486.60	($55.50)	$0.00	($2.32)	($57.82)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$135.00		$135.00	
RE Growth Factor		$2.46		$2.46	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.59		$3.59	
Transmission Energy Charge	kWh x	$0.01068		$0.01068	
Distribution Demand Charge-xcs 10 kW	kW x	$5.58		$5.58	
Distribution Energy Charge	kWh x	$0.00728	(1)	$0.00654	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.052¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.006¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-02 Rate Customers

Hours Use: 600

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
20	12000	$648.47	$1,003.68	$68.84	$1,720.99	$639.59	$1,003.68	$68.47	$1,711.74	($8.88)	$0.00	($0.37)	($9.25)	-0.5%	0.0%	0.0%	-0.5%
50	30000	$1,497.59	$2,509.20	$166.95	$4,173.74	$1,475.39	$2,509.20	$166.02	$4,150.61	($22.20)	$0.00	($0.93)	($23.13)	-0.5%	0.0%	0.0%	-0.6%
100	60000	$2,912.79	$5,018.40	$330.47	$8,261.66	$2,868.39	$5,018.40	$328.62	$8,215.41	($44.40)	$0.00	($1.85)	($46.25)	-0.5%	0.0%	0.0%	-0.6%
150	90000	$4,327.99	$7,527.60	$493.98	$12,349.57	$4,261.39	$7,527.60	$491.21	$12,280.20	($66.60)	$0.00	($2.77)	($69.37)	-0.5%	0.0%	0.0%	-0.6%

		Present Rates		Proposed Rates	
Customer Charge		$135.00		$135.00	
RE Growth Factor		$2.46		$2.46	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.59		$3.59	
Transmission Energy Charge	kWh x	$0.01068		$0.01068	
Distribution Demand Charge-xcs 10 kW	kW x	$5.58		$5.58	
Distribution Energy Charge	kWh x	$0.00728	(1)	$0.00654	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.08364		$0.08364	

Note (1): includes the current CapEx Reconciling Factor of 0.052¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.006¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-32 Rate Customers

Hours Use: 200

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
200	40,000	$2,907.91	$1,835.60	$197.65	$4,941.16	$2,889.11	$1,835.60	$196.86	$4,921.57	($18.80)	$0.00	($0.79)	($19.59)	-0.4%	0.0%	0.0%	-0.4%
750	150,000	$11,027.01	$6,883.50	$746.27	$18,656.78	$10,956.51	$6,883.50	$743.33	$18,583.34	($70.50)	$0.00	($2.94)	($73.44)	-0.4%	0.0%	0.0%	-0.4%
1,000	200,000	$14,717.51	$9,178.00	$995.65	$24,891.16	$14,623.51	$9,178.00	$991.73	$24,793.24	($94.00)	$0.00	($3.92)	($97.92)	-0.4%	0.0%	0.0%	-0.4%
1,500	300,000	$22,098.51	$13,767.00	$1,494.40	$37,359.91	$21,957.51	$13,767.00	$1,488.52	$37,213.03	($141.00)	$0.00	($5.88)	($146.88)	-0.4%	0.0%	0.0%	-0.4%
2,500	500,000	$36,860.51	$22,945.00	$2,491.90	$62,297.41	$36,625.51	$22,945.00	$2,482.10	$62,052.61	($235.00)	$0.00	($9.80)	($244.80)	-0.4%	0.0%	0.0%	-0.4%

		Present Rates		Proposed Rates	
Customer Charge		$825.00		$825.00	
RE Growth Factor		$17.78		$17.78	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.97		$3.97	
Transmission Energy Charge	kWh x	$0.01047		$0.01047	
Distribution Demand Charge-xcs 10 kW	kW x	$4.44		$4.44	
Distribution Energy Charge	kWh x	$0.00736	(1)	$0.00689	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.021¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.010¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-32 Rate Customers

Hours Use: 300

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
200	60,000	$3,543.11	$2,753.40	$262.35	$6,558.86	$3,514.91	$2,753.40	$261.18	$6,529.49	($28.20)	$0.00	($1.17)	($29.37)	-0.4%	0.0%	0.0%	-0.4%
750	225,000	$13,409.01	$10,325.25	$988.93	$24,723.19	$13,303.26	$10,325.25	$984.52	$24,613.03	($105.75)	$0.00	($4.41)	($110.16)	-0.4%	0.0%	0.0%	-0.4%
1,000	300,000	$17,893.51	$13,767.00	$1,319.19	$32,979.70	$17,752.51	$13,767.00	$1,313.31	$32,832.82	($141.00)	$0.00	($5.88)	($146.88)	-0.4%	0.0%	0.0%	-0.4%
1,500	450,000	$26,862.51	$20,650.50	$1,979.71	$49,492.72	$26,651.01	$20,650.50	$1,970.90	$49,272.41	($211.50)	$0.00	($8.81)	($220.31)	-0.4%	0.0%	0.0%	-0.4%
2,500	750,000	$44,800.51	$34,417.50	$3,300.75	$82,518.76	$44,448.01	$34,417.50	$3,286.06	$82,151.57	($352.50)	$0.00	($14.69)	($367.19)	-0.4%	0.0%	0.0%	-0.4%

		Present Rates		Proposed Rates	
Customer Charge		$825.00		$825.00	
RE Growth Factor		$17.78		$17.78	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.97		$3.97	
Transmission Energy Charge	kWh x	$0.01047		$0.01047	
Distribution Demand Charge-xcs 10 kW	kW x	$4.44		$4.44	
Distribution Energy Charge	kWh x	$0.00736	(1)	$0.00689	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.021¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.010¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-32 Rate Customers

Hours Use: 400

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
200	80,000	$4,178.31	$3,671.20	$327.06	$8,176.57	$4,140.71	$3,671.20	$325.50	$8,137.41	($37.60)	$0.00	($1.56)	($39.16)	-0.5%	0.0%	0.0%	-0.5%
750	300,000	$15,791.01	$13,767.00	$1,231.58	$30,789.59	$15,650.01	$13,767.00	$1,225.71	$30,642.72	($141.00)	$0.00	($5.87)	($146.87)	-0.5%	0.0%	0.0%	-0.5%
1,000	400,000	$21,069.51	$18,356.00	$1,642.73	$41,068.24	$20,881.51	$18,356.00	$1,634.90	$40,872.41	($188.00)	$0.00	($7.83)	($195.83)	-0.5%	0.0%	0.0%	-0.5%
1,500	600,000	$31,626.51	$27,534.00	$2,465.02	$61,625.53	$31,344.51	$27,534.00	$2,453.27	$61,331.78	($282.00)	$0.00	($11.75)	($293.75)	-0.5%	0.0%	0.0%	-0.5%
2,500	1,000,000	$52,740.51	$45,890.00	$4,109.60	$102,740.11	$52,270.51	$45,890.00	$4,090.02	$102,250.53	($470.00)	$0.00	($19.58)	($489.58)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$825.00		$825.00	
RE Growth Factor		$17.78		$17.78	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.97		$3.97	
Transmission Energy Charge	kWh x	$0.01047		$0.01047	
Distribution Demand Charge-xcs 10 kW	kW x	$4.44		$4.44	
Distribution Energy Charge	kWh x	$0.00736	(1)	$0.00689	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.021¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.010¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-32 Rate Customers

Hours Use: 500

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
200	100,000	$4,813.51	$4,589.00	$391.77	$9,794.28	$4,766.51	$4,589.00	$389.81	$9,745.32	($47.00)	$0.00	($1.96)	($48.96)	-0.5%	0.0%	0.0%	-0.5%
750	375,000	$18,173.01	$17,208.75	$1,474.24	$36,856.00	$17,996.76	$17,208.75	$1,466.90	$36,672.41	($176.25)	$0.00	($7.34)	($183.59)	-0.5%	0.0%	0.0%	-0.5%
1,000	500,000	$24,245.51	$22,945.00	$1,966.27	$49,156.78	$24,010.51	$22,945.00	$1,956.48	$48,911.99	($235.00)	$0.00	($9.79)	($244.79)	-0.5%	0.0%	0.0%	-0.5%
1,500	750,000	$36,390.51	$34,417.50	$2,950.33	$73,758.34	$36,038.01	$34,417.50	$2,935.65	$73,391.16	($352.50)	$0.00	($14.68)	($367.18)	-0.5%	0.0%	0.0%	-0.5%
2,500	1,250,000	$60,680.51	$57,362.50	$4,918.46	$122,961.47	$60,093.01	$57,362.50	$4,893.98	$122,349.49	($587.50)	$0.00	($24.48)	($611.98)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$825.00		$825.00	
RE Growth Factor		$17.78		$17.78	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.97		$3.97	
Transmission Energy Charge	kWh x	$0.01047		$0.01047	
Distribution Demand Charge-xcs 10 kW	kW x	$4.44		$4.44	
Distribution Energy Charge	kWh x	$0.00736	(1)	$0.00689	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.021¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.010¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-32 Rate Customers

Hours Use: 600

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
200	120,000	$5,448.71	$5,506.80	$456.48	$11,411.99	$5,392.31	$5,506.80	$454.13	$11,353.24	($56.40)	$0.00	($2.35)	($58.75)	-0.5%	0.0%	0.0%	-0.5%
750	450,000	$20,555.01	$20,650.50	$1,716.90	$42,922.41	$20,343.51	$20,650.50	$1,708.08	$42,702.09	($211.50)	$0.00	($8.82)	($220.32)	-0.5%	0.0%	0.0%	-0.5%
1,000	600,000	$27,421.51	$27,534.00	$2,289.81	$57,245.32	$27,139.51	$27,534.00	$2,278.06	$56,951.57	($282.00)	$0.00	($11.75)	($293.75)	-0.5%	0.0%	0.0%	-0.5%
1,500	900,000	$41,154.51	$41,301.00	$3,435.65	$85,891.16	$40,731.51	$41,301.00	$3,418.02	$85,450.53	($423.00)	$0.00	($17.63)	($440.63)	-0.5%	0.0%	0.0%	-0.5%
2,500	1,500,000	$68,620.51	$68,835.00	$5,727.31	$143,182.82	$67,915.51	$68,835.00	$5,697.94	$142,448.45	($705.00)	$0.00	($29.37)	($734.37)	-0.5%	0.0%	0.0%	-0.5%

		Present Rates		Proposed Rates	
Customer Charge		$825.00		$825.00	
RE Growth Factor		$17.78		$17.78	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.97		$3.97	
Transmission Energy Charge	kWh x	$0.01047		$0.01047	
Distribution Demand Charge-xcs 10 kW	kW x	$4.44		$4.44	
Distribution Energy Charge	kWh x	$0.00736	(1)	$0.00689	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.021¢/kWh and the current O&M Reconciling Factor of (0.006¢)/kWh

Note (2): includes the proposed CapEx Reconciling Factor of (0.010¢)/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-62 Rate Customers

Hours Use: 200

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
3,000	600,000	$55,747.80	$27,534.00	$3,470.08	$86,751.88	$55,591.80	$27,534.00	$3,463.58	$86,589.38	($156.00)	$0.00	($6.50)	($162.50)	-0.2%	0.0%	0.0%	-0.2%
5,000	1,000,000	$81,347.80	$45,890.00	$5,301.58	$132,539.38	$81,087.80	$45,890.00	$5,290.74	$132,268.54	($260.00)	$0.00	($10.84)	($270.84)	-0.2%	0.0%	0.0%	-0.2%
7,500	1,500,000	$113,347.80	$68,835.00	$7,590.95	$189,773.75	$112,957.80	$68,835.00	$7,574.70	$189,367.50	($390.00)	$0.00	($16.25)	($406.25)	-0.2%	0.0%	0.0%	-0.2%
10,000	2,000,000	$145,347.80	$91,780.00	$9,880.33	$247,008.13	$144,827.80	$91,780.00	$9,858.66	$246,466.46	($520.00)	$0.00	($21.67)	($541.67)	-0.2%	0.0%	0.0%	-0.2%
20,000	4,000,000	$273,347.80	$183,560.00	$19,037.83	$475,945.63	$272,307.80	$183,560.00	$18,994.49	$474,862.29	($1,040.00)	$0.00	($43.34)	($1,083.34)	-0.2%	0.0%	0.0%	-0.2%

		Present Rates		Proposed Rates	
Customer Charge		$17,000.00		$17,000.00	
RE Growth Factor		$347.07		$347.07	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.22		$3.22	
Transmission Energy Charge	kWh x	$0.01378		$0.01378	
Distribution Demand Charge-xcs 10 kW	kW x	$3.81		$3.81	
Distribution Energy Charge	kWh x	$0.00114	(1)	$0.00088	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.023¢/kWh and the current O&M Reconciling Factor of (0.006¢)kWh

Note (2): includes the proposed CapEx Reconciling Factor of 0.013¢/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-62 Rate Customers

Hours Use: 300

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
3,000	900,000	$64,402.80	$41,301.00	$4,404.33	$110,108.13	$64,168.80	$41,301.00	$4,394.58	$109,864.38	($234.00)	$0.00	($9.75)	($243.75)	-0.2%	0.0%	0.0%	-0.2%
5,000	1,500,000	$95,772.80	$68,835.00	$6,858.66	$171,466.46	$95,382.80	$68,835.00	$6,842.41	$171,060.21	($390.00)	$0.00	($16.25)	($406.25)	-0.2%	0.0%	0.0%	-0.2%
7,500	2,250,000	$134,985.30	$103,252.50	$9,926.58	$248,164.38	$134,400.30	$103,252.50	$9,902.20	$247,555.00	($585.00)	$0.00	($24.38)	($609.38)	-0.2%	0.0%	0.0%	-0.2%
10,000	3,000,000	$174,197.80	$137,670.00	$12,994.49	$324,862.29	$173,417.80	$137,670.00	$12,961.99	$324,049.79	($780.00)	$0.00	($32.50)	($812.50)	-0.2%	0.0%	0.0%	-0.3%
20,000	6,000,000	$331,047.80	$275,340.00	$25,266.16	$631,653.96	$329,487.80	$275,340.00	$25,201.16	$630,028.96	($1,560.00)	$0.00	($65.00)	($1,625.00)	-0.2%	0.0%	0.0%	-0.3%

		Present Rates		Proposed Rates	
Customer Charge		$17,000.00		$17,000.00	
RE Growth Factor		$347.07		$347.07	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.22		$3.22	
Transmission Energy Charge	kWh x	$0.01378		$0.01378	
Distribution Demand Charge-xcs 10 kW	kW x	$3.81		$3.81	
Distribution Energy Charge	kWh x	$0.00114	(1)	$0.00088	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.023¢/kWh and the current O&M Reconciling Factor of (0.006¢)kWh

Note (2): includes the proposed CapEx Reconciling Factor of 0.013¢/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-62 Rate Customers

Hours Use: 400

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease) $				Increase (Decrease) % of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
3,000	1,200,000	$73,057.80	$55,068.00	$5,338.58	$133,464.38	$72,745.80	$55,068.00	$5,325.58	$133,139.38	($312.00)	$0.00	($13.00)	($325.00)	-0.2%	0.0%	0.0%	-0.2%
5,000	2,000,000	$110,197.80	$91,780.00	$8,415.74	$210,393.54	$109,677.80	$91,780.00	$8,394.08	$209,851.88	($520.00)	$0.00	($21.66)	($541.66)	-0.2%	0.0%	0.0%	-0.3%
7,500	3,000,000	$156,622.80	$137,670.00	$12,262.20	$306,555.00	$155,842.80	$137,670.00	$12,229.70	$305,742.50	($780.00)	$0.00	($32.50)	($812.50)	-0.3%	0.0%	0.0%	-0.3%
10,000	4,000,000	$203,047.80	$183,560.00	$16,108.66	$402,716.46	$202,007.80	$183,560.00	$16,065.33	$401,633.13	($1,040.00)	$0.00	($43.33)	($1,083.33)	-0.3%	0.0%	0.0%	-0.3%
20,000	8,000,000	$388,747.80	$367,120.00	$31,494.49	$787,362.29	$386,667.80	$367,120.00	$31,407.83	$785,195.63	($2,080.00)	$0.00	($86.66)	($2,166.66)	-0.3%	0.0%	0.0%	-0.3%

		Present Rates		Proposed Rates	
Customer Charge		$17,000.00		$17,000.00	
RE Growth Factor		$347.07		$347.07	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.22		$3.22	
Transmission Energy Charge	kWh x	$0.01378		$0.01378	
Distribution Demand Charge-xcs 10 kW	kW x	$3.81		$3.81	
Distribution Energy Charge	kWh x	$0.00114	(1)	$0.00088	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.023¢/kWh and the current O&M Reconciling Factor of (0.006¢)kWh

Note (2): includes the proposed CapEx Reconciling Factor of 0.013¢/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-62 Rate Customers

Hours Use: 500

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
3,000	1,500,000	$81,712.80	$68,835.00	$6,272.83	$156,820.63	$81,322.80	$68,835.00	$6,256.58	$156,414.38	($390.00)	$0.00	($16.25)	($406.25)	-0.2%	0.0%	0.0%	-0.3%
5,000	2,500,000	$124,622.80	$114,725.00	$9,972.83	$249,320.63	$123,972.80	$114,725.00	$9,945.74	$248,643.54	($650.00)	$0.00	($27.09)	($677.09)	-0.3%	0.0%	0.0%	-0.3%
7,500	3,750,000	$178,260.30	$172,087.50	$14,597.83	$364,945.63	$177,285.30	$172,087.50	$14,557.20	$363,930.00	($975.00)	$0.00	($40.63)	($1,015.63)	-0.3%	0.0%	0.0%	-0.3%
10,000	5,000,000	$231,897.80	$229,450.00	$19,222.83	$480,570.63	$230,597.80	$229,450.00	$19,168.66	$479,216.46	($1,300.00)	$0.00	($54.17)	($1,354.17)	-0.3%	0.0%	0.0%	-0.3%
20,000	10,000,000	$446,447.80	$458,900.00	$37,722.83	$943,070.63	$443,847.80	$458,900.00	$37,614.49	$940,362.29	($2,600.00)	$0.00	($108.34)	($2,708.34)	-0.3%	0.0%	0.0%	-0.3%

		Present Rates		Proposed Rates	
Customer Charge		$17,000.00		$17,000.00	
RE Growth Factor		$347.07		$347.07	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.22		$3.22	
Transmission Energy Charge	kWh x	$0.01378		$0.01378	
Distribution Demand Charge-xcs 10 kW	kW x	$3.81		$3.81	
Distribution Energy Charge	kWh x	$0.00114	(1)	$0.00088	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.023¢/kWh and the current O&M Reconciling Factor of (0.006¢)kWh

Note (2): includes the proposed CapEx Reconciling Factor of 0.013¢/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh

Calculation of Monthly Typical Bill
Total Bill Impact of Proposed
Rates Applicable to G-62 Rate Customers

Hours Use: 600

Monthly Power		Present Rates				Proposed Rates				Increase (Decrease)							
										$				% of Total Bill			
kW	kWh	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total	Delivery	SOS	GET	Total
3,000	1,800,000	$90,367.80	$82,602.00	$7,207.08	$180,176.88	$89,899.80	$82,602.00	$7,187.58	$179,689.38	($468.00)	$0.00	($19.50)	($487.50)	-0.3%	0.0%	0.0%	-0.3%
5,000	3,000,000	$139,047.80	$137,670.00	$11,529.91	$288,247.71	$138,267.80	$137,670.00	$11,497.41	$287,435.21	($780.00)	$0.00	($32.50)	($812.50)	-0.3%	0.0%	0.0%	-0.3%
7,500	4,500,000	$199,897.80	$206,505.00	$16,933.45	$423,336.25	$198,727.80	$206,505.00	$16,884.70	$422,117.50	($1,170.00)	$0.00	($48.75)	($1,218.75)	-0.3%	0.0%	0.0%	-0.3%
10,000	6,000,000	$260,747.80	$275,340.00	$22,336.99	$558,424.79	$259,187.80	$275,340.00	$22,271.99	$556,799.79	($1,560.00)	$0.00	($65.00)	($1,625.00)	-0.3%	0.0%	0.0%	-0.3%
20,000	12,000,000	$504,147.80	$550,680.00	$43,951.16	$1,098,778.96	$501,027.80	$550,680.00	$43,821.16	$1,095,528.96	($3,120.00)	$0.00	($130.00)	($3,250.00)	-0.3%	0.0%	0.0%	-0.3%

		Present Rates		Proposed Rates	
Customer Charge		$17,000.00		$17,000.00	
RE Growth Factor		$347.07		$347.07	
LIHEAP Charge		$0.73		$0.73	
Transmission Demand Charge	kW x	$3.22		$3.22	
Transmission Energy Charge	kWh x	$0.01378		$0.01378	
Distribution Demand Charge-xcs 10 kW	kW x	$3.81		$3.81	
Distribution Energy Charge	kWh x	$0.00114	(1)	$0.00088	(2)
Transition Energy Charge	kWh x	($0.00058)		($0.00058)	
Energy Efficiency Program Charge	kWh x	$0.01107		$0.01107	
Renewable Energy Distribution Charge	kWh x	$0.00344		$0.00344	
Gross Earnings Tax		4%		4%	
Standard Offer Charge	kWh x	$0.04589		$0.04589	

Note (1): includes the current CapEx Reconciling Factor of 0.023¢/kWh and the current O&M Reconciling Factor of (0.006¢)kWh

Note (2): includes the proposed CapEx Reconciling Factor of 0.013¢/kWh and the proposed O&M Reconciling Factor of (0.022¢)/kWh