# THE STATE OF NEW HAMPSHIRE BEFORE THE NEW HAMPSHIRE PUBLIC UTILITIES COMMISSION

## Public Service Company of New Hampshire Energy Service Rate

Docket No. DE 13-275

### Joint Technical Statement of Eric H. Chung and Frederick B. White

December 12, 2013

### A. Purpose of Technical Statement

This Technical Statement is being submitted to explain the major changes to Public Service Company of New Hampshire's proposed Default Energy Service (ES) Rate effective January 1, 2014. This filing updates the Company's ES revised initial filing that was submitted on October 11, 2013.

### B. Proposed Rate

On October 11, 2013, PSNH filed a revised preliminary 2014 ES rate of 8.99 cents/kWh to be effective for the 12 month period January 1 through December 31, 2014. In this filing, PSNH has calculated an ES rate of 9.23 cents/kWh for effect on January 1, 2014, which is an increase of 0.24 cents/kWh from the October 11, 2013 filed ES rate. The rates above include the temporary recovery of Scrubber costs at a rate of 0.98 cents/kWh as ordered in DE 11-250, Order No. 25,346.

The 0.24 cents/kWh increase in the ES rate from the October 11, 2013 filing to this filing is attributable to a decrease in forecasted retail sales of 149 GWH and a net decrease in actual and forecasted costs of \$3.1 million as contained in Attachment EHC-1.

The 2014 forecasted cost changes are contained in Attachment EHC-1, page 1, and are specifically referenced below. The decrease in forecasted costs and retail sales is primarily attributable to lower load due to an increase in customer migration. Other changes, including an increase in forward electricity market prices as of November 20, 2013, are as noted below.

### C. Changes in Forecasted Retail Sales

For the forecast period January through December 2014, the migration rate increased from 52.0% in the initial filing to 53.7% in the updated filing. This increase in migration caused forecasted retail sales to decrease from 3,831 GWH in the initial filing to 3,682 GWH in the updated filing, for a change of 149 GWH.

<u>D. Changes from September 27, 2013 Filing, Attachment EHC-2, Page 3</u> (Note: The costs in this attachment on September 27, 2013 were the same as those in the October 11, 2013 revised filing.)

For the forecast period January through December 2014, the impact of power supply variable cost updates is to decrease ES costs by \$13.9 million. Following is a discussion of the major changes (numbers may not add due to rounding):

- 1. Lines 4 and 5 Projected coal generation increased 441 GWh to 1,550 GWh due to higher forward electricity market prices. Coal fuel expense increased \$20.9 million due to higher forecasted generation.
- 2. Lines 7 thru 9 Projected wood generation decreased 34 GWh to 296 GWh due to inclusion of a 5 week planned maintenance outage. Wood fuel expense decreased \$2.0 million and revenue credits decreased \$1.2 million due to lower forecasted generation.
- 3. Lines 11 and 12 Newington generation increased by 19 GWh due to higher forward electricity market prices, relative to delivered fuel prices. Higher forecasted generation and higher fuel prices (gas) resulted in increased fuel expense of \$1.9 million.
- 4. Line 15 IPP energy expenses increased by \$3.3 million due to higher forward electricity market prices. A table showing forecasted forward electricity market prices used for calculating the preliminary ES rate filed in September and for this filing is provided below.

# Forward Electricity Prices for Delivery at Massachusetts Hub All Hours - \$/MWh Filing Dates

	September 27, 2013	December 12, 2013	<u>Change</u>		
<u>2014</u>	(8/28/13 Closing Prices)	(11/20/13 Closing Prices)	<u>\$/MWh</u>	<u>%</u>	
Jan	85.4	112.8	27.4	32.2%	
Feb	85.4	108.7	23.3	27.3%	
Mar	48.0	56.7	8.7	18.2%	
Apr	37.2	40.4	3.1	8.4%	
May	34.7	34.6	(0.1)	-0.3%	
Jun	36.9	38.7	1.8	4.9%	
Jul	43.4	44.9	1.5	3.5%	
Aug	43.0	44.5	1.5	3.5%	
Sep	35.1	35.1	(0.0)	-0.1%	
Oct	41.6	35.3	(6.4)	-15.3%	
Nov	45.9	49.3	3.5	7.5%	
Dec	59.7	72.3	12.6	21.2%	
Total	49.5	55.8	6.3	12.8%	

- 5. Line 21 Berlin Station (Burgess Biopower) The December 1, 2013 contract start date in this filing is unchanged from the September filing, as are forecasted generation amounts and costs. Actual contract in-service began on November 25, 2013 and the first operating year will end on November 30, 2014. All future contract operating years will run from 12/1 thru 11/30 of each year, ending on November 30, 2033. The station is expected to provide approximately 60 MW of capacity, 500,000 MWh of energy, and 400,000 Class I renewable energy credits, annually.
- 6. Lines 25 thru 27, 29 and 30, and 32 and 33 Purchases decreased by 290 GWh decreasing expenses by \$13.4 million. Sales increased by 280 GWh decreasing expenses by \$26.0 million. The decrease in purchases and increase in sales is primarily due to higher coal generation and lower loads.
- 7. Lines 35 and 43 Congestion and loss adjustments and RGGI costs increased by \$1.5 and \$1.0 million, respectively, primarily due to increased generation amounts.
- 8. Line 37 Total Energy decreased 145 GWh due to an increase in migration from 52% to 53.7%. This figure also includes an overall sales forecast decrease of 28 GWh (approx. 0.35% decrease). Total ES sales are lower by 149 GWh. The table below shows the forecasted sales and migration (Non-ES sales) as measured at the customer meter used for calculating the preliminary ES rate filed in September and for this filing. The amount of migration modeled in this update is as of October, 2013. Overall, ES sales are lower by 3.9% from the estimates used in the September 27, 2013 preliminary ES rate filing primarily due to additional migration.

## PSNH ES Sales Forecast

Filing Dates										
	September 27, 2013			December 12, 2013			<u>Change</u>			
<u>2014</u>	<u>Total</u>	Non-ES	<u>ES</u>	<u>Total</u>	Non-ES	<u>ES</u>	<u>Total</u>	Non-ES	<u>ES</u>	ES %
Jan	716,294	372,473	343,821	719,779	386,522	333,258	3,486	14,049	(10,563)	-3.1%
Feb	637,145	331,315	305,830	646,249	347,035	299,213	9,104	15,720	(6,617)	-2.2%
Mar	655,187	340,697	314,490	649,831	348,959	300,872	(5,357)	8,262	(13,618)	-4.3%
Apr	598,834	311,394	287,440	593,663	318,797	274,866	(5,171)	7,403	(12,574)	-4.4%
May	612,793	318,652	294,140	613,151	329,262	283,889	358	10,610	(10,252)	-3.5%
Jun	665,012	345,806	319,206	667,009	358,184	308,825	1,998	12,378	(10,380)	-3.3%
Jul	770,732	400,781	369,951	753,119	404,425	348,694	(17,613)	3,644	(21,257)	-5.7%
Aug	731,455	380,356	351,098	729,195	391,578	337,617	(2,259)	11,222	(13,481)	-3.8%
Sep	636,740	331,105	305,635	630,103	338,366	291,738	(6,637)	7,261	(13,898)	-4.5%
Oct	626,520	325,790	300,730	621,278	333,626	287,652	(5,242)	7,836	(13,078)	-4.3%
Nov	634,777	330,084	304,693	619,685	332,771	286,914	(15,092)	2,687	(17,779)	-5.8%
Dec	695,654	361,740	333,914	710,233	381,395	328,838	14,579	19,655	(5,076)	-1.5%
Total	7,981,142	4,150,194	3,830,948	7,953,296	4,270,920	3,682,376	(27,846)	120,726	(148,572)	-3.9%

- 9. Lines 40 and 44 RPS and Capacity expenses decreased \$0.6 million and \$1.3 million, respectively, due to lower loads.
- 10. Line 41 ISO-NE ancillary costs decreased \$0.4 million primarily due to lower loads.

Included in this item are costs and revenues associated with ISO-NE's Winter Reliability Program. ISO New England's Winter Reliability Program has an unavoidable cost to ES customers as their share of program costs charged to all load serving entities. This cost is included in the filing and is estimated to be \$2.2 million (for the December, 2013 thru February, 2014 period); which is a \$0.2 million decrease from the September filing because the total program cost decreased due to an adjustment by ISO-NE (from \$78.8 million to \$75.1 million), and a lower PSNH load share due to increased migration.

Offsetting this cost, PSNH's Newington Station bid and was awarded \$4.8 million for its participation in the ISO-NE Winter Reliability Program. However, there are incremental costs and risks associated with participation which reduce the \$4.8 million. Incremental costs and risks include:

- Price risk the risk of the market price of oil moving over the period from the assumed price in the offer, to procurement, to oil burn/liquidation. Price movement could be detrimental or favorable.
- Delivery risk the program includes penalties for not having in inventory by certain dates the "contracted" quantity of oil. PSNH has already taken delivery of required quantities.
- Inventory cost/risk the cost and risk of carrying surplus inventory (above typical amounts) from procurement to beyond the term of the program.
- Unit availability risk the program includes penalties (forfeiture of daily revenue) for days when the unit is not available.
- Performance test risk dual fuel units like Newington are required to demonstrate the ability to switch to oil fired generation and achieve full load output. Costs associated with the conduct of a successful test are fully compensated through ISO-NE markets (through a mechanism very similar to NCPC, if necessary). Over market costs associated with an unsuccessful test are borne by the participant. PSNH successfully completed its performance test in November, on its first attempt.

In summary, the benefit reflected in this filing for the Winter Reliability Program is \$3.4 million of revenue. This revenue resulted in a change from a \$2.2 million cost to customers to a benefit of \$1.2 million to customers.

### E. 2013 (Over)/Under Recovery (\$ 5.2 million decrease in (over) recovery)

The updated ES 2013 (over) recovery decreased by \$5.2 million due to an \$8.3 million decrease in revenues due to increased migration offset by a net decrease in costs of \$3.1 million.

### F. 2014 Other Cost Changes (\$5.6 million cost increase)

RGGI Auction Refund credits decreased by \$3.1 million as they were removed from the updated filing until the proper mechanism for returning these credits can be determined by the Commission. All other forecasted costs increased by \$2.5 million.

### G. Rate ADE

For the period of July 1, 2013 through December 31, 2013, PSNH expects to under recover approximately \$100,000 associated with 4,600 megawatt-hours of rate ADE sales. These figures are based on PSNH's most recent ADE reports filed in DE 11-216 in November 2013. PSNH has incorporated this under recovery into the January 1, 2014 energy service rate.

### H. Green Rate

As of November 30, 2013, PSNH had 131 customers taking service under the Renewable Default Energy Service Rate (Green Rate). Thirty-four (34) were enrolled under the 25% option, 34 under the 50% option, and 63 under the 100% option. These 131 customers represent 0.04% of the total customers eligible for the Green Rate.

PSNH is filing the under collection to be reconciled in the energy service rate for January 1, 2014 as the Green Rate will be discontinued as of January 1, 2014, consistent with Commission Order No. 25,511. The total under collection for the Green Rate for the period of May 2010 – December 2013 is \$31,388.47. During this period, PSNH has purchased 1122 Class I RECs, 32 Class II RECs and will pay \$16,038 towards the Alternative Compliance Payment or purchase RECs by July 1, 2014 for RECs PSNH has not purchased on behalf of 2013 program kilowatt-hours.

#### I. Summary

The decrease of the forecasted expense changes noted in items 1-10 in Section D above totaling \$13.9 million netted with the 2013 (over) recovery decrease of \$5.2 million in Section E and the other cost increase of \$5.6 million in Section F results in a total net expense decrease of \$3.1 million. Combining this with the decrease in customer sales results in the 0.24 cents/kWh rate increase identified above.