

STATE OF NEW HAMPSHIRE
BEFORE THE
PUBLIC UTILITIES COMMISSION

DE 13-063

Granite State Electric Company d/b/a Liberty Utilities

Rate Case

TESTIMONY

OF

LESZEK STACHOW

Date: November 15, 2013

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1 **A. Introduction & Purpose of Testimony**

2 **Q. Please state your name, current position and business address.**

3 A. My name is Leszek Stachow, and I am employed by the New Hampshire Public Utilities
4 Commission (Commission) as a Utility Analyst. My business address is 21 S. Fruit
5 Street, Suite 10, Concord, New Hampshire.

6 **Q. Please summarize your educational and professional background.**

7 A. My educational and professional background is summarized in Attachment 1 of the
8 testimony.

9 **Q. What is the purpose of your testimony?**

10 A. The purpose of my testimony is to respond to Mr. Robert Hevert's rate of return
11 recommendation as filed on behalf of Granite State Electric Company.

12 **B. Overview**

13 **Q. Please summarize Mr. Hevert's rate of return recommendation.**

14 A. Mr. Hevert recommends that a ROE of 10.50% be employed on the common equity
15 capital of Granite State Electric Company. ("GSEC" or the "Company"). Together with
16 the Company's proposed capital structure and cost of debt, this would produce an overall
17 rate of return of 8.32%. Staff concurs that the Company's proposed capital structure is
18 reasonable, and that the Company's proposed long term debt and short term debt are
19 appropriate. However, Staff has concerns with the development of the cost of equity
20 estimation.

21 In determining GSEC's cost of common equity capital, Mr. Hevert applies a discounted
22 cash flow ("DCF") analysis to a group of seventeen electric or combined electric and gas
23 utilities. Mr. Hevert initially makes use of Constant Growth DCF and Multistage DCF

1 analyses to derive his preliminary ROE recommendations. Subsequently he utilizes the
2 Capital Asset Pricing model (“CAPM”) and a Bond Yield Risk Premium approach to
3 reinforce his findings .

4 **Q What is your general reaction to Mr. Hevert’s Cost of Common Equity**
5 **recommendation?**

6 A. Staff believes that Mr. Hevert’s recommended ROE is overstated.
7 In developing his recommendation, Mr. Hevert discarded his own “mean low” results for
8 his selected proxy groups, while retaining the “mean high” range, claiming that of the
9 1,391 rate cases since 1980 that disclosed the approved ROE, only one included an
10 authorized ROE of 9.00% or lower, and that therefore mean low results should not be
11 given any weight.

12 **Q. What are your basic conclusions regarding Mr. Hevert’s cost of equity testimony?**

13 A. A revised selective application of the cost of capital methodologies employed by Mr.
14 Hevert and subsequently revised by Staff will provide results that in Staff’s view will be
15 more within the range of reasonableness for electric utility ROEs being authorized in
16 2013.(See Attachment 3)

17
18 **C. Staff analysis of the Hevert testimony**

19 **Q. Please summarize your comments on the Hevert testimony.**

20 A. I would like to make clear at the outset that I agree with many of Mr. Hevert’s views and
21 procedures.

1 I concur in (1) the use of several methodologies in estimating a fair return on common
2 equity, although I am not convinced that Granite State warrants the level of complexity
3 found;

4 (2) I am concerned about the apparent dissonance in the profile of Granite State and the
5 sample group of utility companies as applied in the DCF and CAPM analyses and (3) I
6 am concerned about the selective application of Mr. Hevert's findings.

7 I have identified eleven specific issues within the Hevert testimony that I would
8 like to address:

9 Selection of proxy

- 10 • Dissonance between Granite State and the Proxy Group
- 11 • Selection methodology

12 Application of the DCF model

- 13 • The limited benefit of using multiple average day closing prices for stock?
- 14 • Applicability of averaging four growth rates
- 15 • The need to abandon retention/sustainable growth measure.
- 16 • Withdraw all Otter Tail related data.
- 17 • Relevance of applying multistage DCF for a highly stable and predictable utility.

18 Analysis of concluding remarks

- 19 • Avoid selective application of findings, rather compare all.
- 20 • Test cost of capital recommendation with ROEs approved in 2011, 2012, 2013
- 21 • Consider the Liberty Utilities subsidiary, Calpeco settlement.
- 22 • Recommended ROE, and using Equity, Debt split, propose overall rate of return.

23

1 **D. Proxy Group Selection.**

2 **Q. Describe Mr. Hevert's selection his proxy group of companies**

3 **A.** Mr. Hevert's selection of the proxy group began with a Value Line generated universe of
4 49 domestic US electrical utilities which were screened as follows:

- 5 1. Excluded all companies not consistently paying quarterly cash dividends
- 6 2. Analysis performed by at least two analysts
- 7 3. Possessed investment grade senior unsecured bond and/or corporate credit
8 ratings from S&P
- 9 4. Received regulated operating income over the last three reported fiscal years
10 represented more than 60% of combined income
- 11 5. Received regulated electrical operating income over the last three reported fiscal
12 years greater than 90% of total regulated operating income
- 13 6. Companies were not known to be party to a merger, or other significant
14 transaction

15 Mr. Hevert then removed two further companies from the final list of 15, one due to a
16 recorded loss in its competitive power generation segment and the other due to a loss in
17 its natural gas utility segment leaving a balance of 13 companies. He then expanded the
18 list to additionally include 5 companies that are primarily electrical and natural gas
19 distribution utilities. Mr. Hevert used the same screening approach except that he added
20 one additional screening characteristic and amended another:

- 21 1. Excluded all companies with significant regulated generating assets included in
22 their rate base, and
- 23 2. Adjusted screening characteristic #5 above, from 90% to 50%

1 Since one of the companies, PEPCO Holdings, appeared both in the list of 13 and in the
2 subsequent list of 5, the final tally of proxy companies was 17.

3 **Q. Why does Staff believe that the proxy group selection may not provide the best set**
4 **of data in determining the correct ROE for Granite State?**

5 A. (a) Granite State is a small state jurisdictional distribution utility, whose customer base
6 at 43,000 is relatively small, predictable and has faced limited change over the last six
7 years; whose operating revenues for 2012 were only \$78 million, whose sales were
8 relatively flat over the period 2006-2012 and whose business activities at present are
9 confined to the distribution of electrical power. Thus Granite State's fundamental
10 characteristics resemble that of the proxy group of companies only in a very limited way.
11 Attachment 2 below provides a comparison.

12
13 (b) Mr. Hevert made clear that the application of his proxy selection was due to the fact
14 that there are no pure play state jurisdictional electric distribution only companies that
15 may be used as proxies. Given that Granite State is an in-state electric distribution
16 company, Mr. Hevert elected to augment his preliminary proxy list of 13 companies with
17 5 additional companies that are characterized primarily as electric and natural gas
18 distribution utilities.

19 These gas and electric distribution operations were selected irrespective of
20 jurisdictional reach, and including gas distribution, which is not a service Granite State
21 provides. To reinforce acceptability of the selection, Mr. Hevert then performed a
22 segment analysis on the final 5 gas and electric distribution companies, stating that
23 approximately 15% of the companies' operating income was derived from natural gas

1 distribution operations on average, and that, therefore, these were acceptable proxies for
2 Granite State.

3 His analysis (see Table 1 Hevert testimony) belies the fact that two of the five companies
4 have other operations unrelated to electric distribution amounting to 35% and 21%
5 respectively of operating income, and in the case of one of the five, CenterPoint,
6 electrical distribution operating incomes are below 48%, therefore less than half of the
7 total operating income as reported by Mr. Hevert. In fact, if we examine the companies'
8 percentages of revenue arising from electrical activity, we find that Consolidated
9 Edison's percentage revenues associated with electrical operations are 70% as opposed
10 to the 77% operating income, while in the case of UIL Holdings, the revenues reported
11 attributable to electric distribution are 54% rather than the 70% operating income
12 reported by Mr. Hevert.

13 Distribution Utilities, segment analysis

Company	% Electric Distribution operating income(Hevert)	% Electric distribution operating revenues(Stachow)
Consolidated Edison	77%	70%
UIL Holdings	70%	54%

14
15 Thus, we are functioning in an imperfect comparative world, where the use of much
16 larger and more diversified companies as well companies whose primary business
17 activities and concomitant risk differs significantly to that of Granite State

18 (c) Having selected the additional combined gas/electric distribution companies, Mr.
19 Hevert then made clear that those five distribution companies are not a reliable proxy
20 group for Granite State alone since they are relatively small in number and may not
21 provide a reliable measure since anomalous events or data associated with only one

1 company could skew the results thereby complicating the ability to develop a ROE
2 estimate with a reasonable degree of confidence. However, he did not make clear that
3 increasing the proxy group by an additional 13 electric companies that possess varying
4 degrees of electric distribution in their business, but facing multiple regulatory
5 jurisdictions, a multiplicity of services and vastly different customer numbers would be
6 less of a threat to the estimation of a reliable ROE.

7 Staff believes that in evaluating a ROE recommendation, application of (a) a proxy group
8 comprising the five distribution companies alone may be a more reliable basis for
9 measurement than the plethora of companies presented in Mr. Hevert's testimony and (b)
10 as a sanity check consideration of what other Commissions have allowed as ROE's for
11 electric distribution companies may also be considered.

12 Mr. Hevert then made clear that reliance on companies whose risk profile is substantially
13 related to natural gas operations may be more likely to result in higher credit ratings
14 relative to electric distribution utilities, thereby skewing the ROE downwards, whereas
15 credit rating difference between electric distribution companies and vertically integrated
16 electrical utilities are far less making them better candidates for proxy comparison.

17 This analysis would suggest that a prevailing benchmark of proxy similarity between
18 Granite State and the Proxy Group is their relative credit rating. Staff believes that this is
19 but one measure and that other factors need to be taken into account.

20 From Staff's perspective there is limited resemblance between Granite State and the
21 Proxy companies. Granite State serves the smallest and relatively one of the more
22 homogenous groups of customers in the whole sample. At 43,000 customers served, it
23 lies well below the next smallest customer pool captured in the proxy group, i.e. Empire

1 District Electric Company at 167,000. Out of the proxy sample, 13 companies have a
2 customer base of 500,000 or above. Thus the scale of operations, the challenges faced
3 and the risks are different.

4 As has been stated elsewhere¹ it may be possible to highlight four main determinants of
5 risk that electrical transmission and distribution shareholders may face. They are:

- 6 • Demand variability
- 7 • Cost variability
- 8 • Regulation
- 9 • Cost/revenue structure

10
11 If that is correct, one measure of utility risk is determined by the nature and quality of
12 regulatory oversight. The design of price controls and associated incentive mechanisms
13 and the way in which changes in volumes or costs translate into changes in profit all
14 directly affect the degree to which shareholders are exposed to risk. Only two of the
15 proxy group face single jurisdictional regulation similar to Granite State. They are
16 Portland General Electric and Cleco Corp, both possessing vertically integrated
17 operations that cover not only distribution in common with Granite State, but also
18 generation and transmission. The remaining Proxy companies face a multiplicity of
19 regulatory bodies (See Attachment 2), each pursuing its own at times divergent policies
20 and all which must be monitored when assessing the company's risk profile.

21 An examination of the initial 13 proxy companies identified by Mr. Hevert reveals that
22 their operating revenues are substantially higher, between a high of \$17,249.0 million

¹ First Economics, *An estimate of NIE T&D's Costs of Capital, Prepared for NIAUR*, (11Dec 2011)(Page 5, Section 3.3)

1 and a low of \$1,016.4 million, in comparison to Granite State's \$78.9 million. Given the
2 scope and scale of operations is vastly different to Granite State, there may be room for
3 doubt as to the suitability in utilizing the Proxy companies.

4 Significantly, out of the Proxy Group, only 5 companies generated all of their revenues
5 from the electric business. They are Great Plains Energy Inc., IDA Corp, Pinnacle West
6 Capital Corp, Portland General Electric Company and Westar Energy Inc. Staff shares
7 Mr. Hevert's view that they may be a comparatively smaller difference in the risk profile
8 (credit ratings) between electrical distribution companies and vertically integrated electric
9 utilities, and therefore will select that subgroup as one of the Proxy subgroups in its DCF
10 analysis as a sanity check against the Proxy Group as a whole.

11 Further, Staff believes that instead of using the five combined gas and electric
12 distribution utility companies to augment the group of 13, recognize that the risk profile
13 of gas utilities might be lower than electric utilities, but perform an alternative sanity
14 check highlighting their collective distribution characteristics, by replicating the DCF
15 analysis using the five combined distribution companies alone and comparing with the
16 Proxy Group as a whole.

17 **E. Estimation of Cost of Equity.**

18 **Q. Please describe how Mr. Hevert made use of the DCF and other analyses to develop**
19 **a range of recommended ROE's**

20 A. In determining Granite State's cost of equity capital, Mr. Hevert first applied a constant
21 growth DCF analysis to the group of 17 proxy companies. He utilized 30, 90 and 180 day
22 closing stock price averages, as well as the dividend growth estimates as provided by
23 proprietary services such as Zacks, First Call, and Value Line. Not content with

1 averaging these growth rates, Mr. Hevert made an adjustment to the dividend yield to
2 account for periodic growth in dividend by applying one-half of the long term growth rate
3 to the current dividend yield. Citing the NHPUC (Ref) declared concern about sole
4 reliance on earnings growth, Mr. Hevert developed a measure for retention (sustainable)
5 growth that sought to capture the proportion of earnings that are reinvested back into the
6 firm. Despite expressing various concerns with the reliability of the sustainable growth
7 measure, and indicating that the measure should be used with caution, Mr. Hevert
8 integrated it fully into his Constant Growth analysis and averaged the proprietary service
9 based growth data with the sustainable growth estimate in developing his ROE estimates.

10 **Q. How did Mr. Hevert account for the possibility of different growth rates over**
11 **discrete stages?**

12 A. Citing its acceptance by the NHPUC in the past² Mr. Hevert chose to consider the results
13 of a Multi Stage (three stage) DCF model, this would permit the specification of near,
14 intermediate and long term growth rates, thereby avoiding the sometime limiting
15 assumption that the company will grow at the same constant rate in perpetuity.

16 In support his ROE recommendation, Mr. Hevert went on to further apply the CAPM and
17 Risk Premium analyses.

18
19 **Q. Does Staff have any concerns with the methodologies employed by Mr. Hevert to**
20 **develop his ROE recommendations?**

² See, New Hampshire Public Utilities Commission, Docket No DT 02-110, Oder No 24,265, *Verizon New Hampshire, Investigation into Cost of Capital*, Order Establishing Cost of capital, January 16, 2004, at 31-34

1 A. Yes, we do. While we generally concur with the broad methodological approach utilized
2 by Mr. Hevert, our areas of concern are related to the need to further fine tune the
3 analysis as follows:

4 (a) Replace Mr. Hevert’s partial removal of Otter Tail data by rejecting the
5 inclusion of all Otter Tail data

6 (b) The marginal utility of using three different duration average day stock
7 prices.

8 (c) The application of the sustainable growth estimate

9 (d) The development of the average earnings growth using the sustainable
10 growth estimate

11 (e) The use of a multistage DCF to determine the ROE for Granite State

12 (f) Rejection of low ROE findings

13 Staff has therefore adjusted the standard Hevert Cost of Equity models, where relevant, to
14 reflect the outcome of fine tuning the issues listed above and then developed the
15 following revised DCF recommendations to serve as a sanity check against the Hevert
16 findings.

17

Option 1.	Constant growth DCF with all above mentioned corrections in place
Option 2.	Constant growth DCF utilizing the five combined gas and electric distribution utilities
Option 3.	Constant growth DCF utilizing the 100% electric revenue driven companies.

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19

20

1 **Q. Why does Staff reject Mr. Hevert’s partial removal of the Otter Tail data from the**
2 **DCF model?**

3 A. Staff’s position is that while the Value Line EPS growth estimate may be two standard
4 deviations from the unadjusted group mean as reported by Mr. Hevert, the fact that this
5 data is compiled by at least two or more analysts may suggest that the calculation is
6 sound. Abandoning data in a piecemeal fashion may subject the author to the accusation
7 of cherry picking. Staff would consider leaving all the data complete, or where there is
8 any doubt Staff recommends removing all the Otter Tail data inputs in a consistent
9 manner.

10 **Q. Why does Staff object to the use of multiple average closing stock prices over 30, 90**
11 **and 180 trading day periods as of January 18, 2013**

12 A. Staff believes that while the Hevert assertion that using three averaging periods is more
13 likely to limit the effect of skewed results precipitated by anomalous events that might
14 affect the stock price on a given day, the selection of the three periods is an arbitrary
15 matter, and three alternative periods or even one long period might suffice. Since the
16 range of ROE estimates arising from the 30, 90 and 180 trading day estimates appears to
17 vary to a very small extent, in the interests of simplifying the methodology, Staff
18 recommends the adoption of only a 90 trading day for determining the average closing
19 stock price, and has replaced the Value line data with (the average of 90 day trading data
20 ending October 2013) from SNL.

21

22 **Q. What recommendations does Staff propose with respect to the sustainable growth**
23 **estimate as submitted by Mr. Hevert in the DCF analysis?**

1 A. Staff took note of the concerns and qualifications as indicated by Mr. Hevert and also
2 considered the written remarks of Dr. Morin³ with respect to the use of this approach.
3 Accordingly, he has identified three problems in the application of the sustainable growth
4 method:

5 1. Sustainable growth can be expressed by the following notation:

6 $G = br + sv$, where

7 b is the fraction of earnings to be retained by a company, i.e. the
8 retention factor;

9 r is expected returns on book equity

10 s is the expected percentage growth rate in the number of shares to finance
11 investment, and

12 v , is the profitability of the expected investment.

13 Clearly there are four variables that need to be identified and measured as opposed to the
14 single earnings growth.

15 According to Dr. Morin, it may be much more difficult to estimate the four variables b , r ,
16 s and v investors have in mind than to estimate what g they envisage, and that using four
17 variables to predict growth may introduce far more errors than a direct forecast of growth
18 itself. Further Dr. Morin suggests that there is a measure of circularity in estimating g by
19 a forecast of b and ROE for the utility being regulated since ROE is determined in large
20 part by regulation. Finally Morin claims that the finance literature demonstrates that the
21 sustainable growth method of determining growth is not as significantly correlated to
22 measures of value, such a stock price and price/earnings ratios as other historical growth
23 measures.

³ Roger Morin, PhD, *New Regulatory Finance*, Public Utility Reports, Inc. Virginia,(2006) (Page 306 and following)

1 Mr. Hevert has made use of the sustainable (retention) growth estimate because of his
2 awareness that the NHPUC⁴ did not wish to solely rely on earnings growth for the
3 Constant Growth DCF. After calculating the sustainable growth estimate, Mr. Hevert
4 added it to three other commercially available growth estimates, Zacks, First Call and
5 Value Line and averaged them out before solving for the ROE estimates. Mr. Hevert,
6 however, also cautions about the use of sustainable growth.

7
8 **Q. What reservations does Staff have to the development of average earnings growth**
9 **utilizing the sustainable growth estimate?**

10 A. Taking into account Dr. Morin's concerns and Mr. Hevert's expressed caution, Staff
11 elected not to make use of the Sustainable Growth data and has relied instead on the
12 remaining three commercially available services for the development of average earning
13 growth.

14
15 **Q. What is Staff's position concerning the use of a Multistage DCF to determine the**
16 **ROE for Granite State?**

17 A. Staff's understanding of the three stage DCF model is that it is based on the notion that a
18 company's dividend payout progresses initially through a growth stage, then via a
19 transitional level it finally reaches a steady state stage. Table 2 below seeks to illustrate
20 this mechanism.

21
22

⁴ See, State of New Hampshire Public Utilities Commission, Docket no DG 08-009, Order No 24,972, *Energy North Natural Gas, Inc. D/B/A National Grid NH, Notice of Intent to File Rate Schedules*, Order granting Delivery Rate Increase, May 29, 2009, at 62

1
2

Table 2: Stages of the three stage DCF Model⁵

Stage	Characteristics
Growth stage	In this period, sales are increasing, profit margins are on the rise, accompanied by high growth in earnings per share. Due to highly profitable expected investment opportunities, the payout ratio is low.
Transition Stage	This period is characterized by increased competition, which results in reduced profit margins and slower earnings growth. Fewer new investment opportunities result in the company beginning to pay out a larger percentage of earnings.
Maturity Stage	Finally the company reaches a position where its new investments offer on average only slightly attractive returns on equity. At this point the earnings growth rate, payout ratio, and return on equity stabilize for the remainder of its life.

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It is Staff's understanding that Granite State was a well-established electric distribution company for many years prior to the Liberty Energy acquisition and based on the testimony of Ms. ChristiAne Mason and Dr. Michael Schmidt, we understand that while the number of customers grew in a measured way from 1997 to 2012 (from 35,910 to 42,697) actual sales of electricity remained quite stable from approximately 700,000 MWH in 1997 to 900,000 MWH in 2012. Absent any Schumpeterian inspired gales of creative destruction in the pipeline, Staff would characterize the company as in the maturity stage of its life cycle, where the constant growth DCF model is most appropriate. Staff therefore recommends discarding the multi stage DCF analysis and considers it an inappropriate model to use for purposes of estimating GSEC's ROE.

15 **Q. Does Staff have any concerns relating to Hevert's development of CAPM and bond**
16 **Risk Premium methodologies?**

⁵ This description derives from William F. Sharp, Gordon J. Alexander, and Jeffrey V. Bailey, Investments (Prentiss-Hall, 1995) pp.590-91

1 A. Staff has not taken a position with respect to the above and is content to be informed by
2 the results of these supporting methodologies.

3 **Q. What is Staff's position with respect to Mr. Hevert's selective acceptance of the**
4 **results of his own findings?**

5 A. Having incorporated substantive refinements to his analysis, including multiple trading
6 day periods for the development of average closing stock prices, incorporation of four
7 growth estimates, the application of multi stage growth estimates in developing a matrix
8 comprising his mean low, mean and mean high, ROE estimates, Mr. Hevert discarded all
9 mean low estimates on the grounds that of 1,391 rate cases where the authorized ROE
10 was disclosed, only one included an authorized return of 9.00% or less. In this way he
11 was able to provide a ROE recommendation range of between 10.25% and 11.00%. In
12 practice, Mr. Hevert though claiming that since the Constant growth DCF mean low
13 results lay below his self-imposed 9.00 percent or lower threshold, he also elected to
14 ignore the mean low results from his own multi stage DCF analysis.

15 This is an example of the classic selective discarding of low end DCF results. In addition,
16 the asymmetric elimination of low end and not high end results permits an overstatement
17 of the DCF equity cost rate. Staff therefore recommends that in the interest of symmetry
18 mean low and mean high results should be considered. In addition, Staff analysis has
19 demonstrated (See Appendix 3) that over the last three years, i.e. 2011-2013, there has
20 been a tendency for a greater number of electric utilities to have been authorized ROE's
21 between 9.00 and 9.95%.

22

1 **Q. How did Staff seek to inform the Hevert DCF analysis by its concerns and**
2 **recommendations?**

3 A. Staff adopted the model approach utilized by Mr. Hevert for his Constant growth DCF,
4 but with the following adjustments:

- 5 ○ Selection of the 90-day trading period for the determination of the average closing
6 stock price on January 18, 2013.
- 7 ○ Removal of the Otter Tail data.
- 8 ○ Removal of the sustained/retention growth parameter.
- 9 ○ Consideration of mean low, mean and mean high ROE recommendations

10 Then Staff modeled a number of optional scenarios (see below) to determine the revised
11 ROE recommendations. All proxy group companies except Otter Tail were modeled
12 when incorporating the above mentioned adjustments.

13 **Option 1.**

14 This option retained the full Proxy Group (excluding Otter Tail) and made the following
15 adjustments:

Adjustments	<ul style="list-style-type: none">• Selection of a single 90-day average stock price (Aug – Nov 2013, SNL)• Removal of all Otter Tail data• Remove Sustainable Growth estimate• Correction for new stock price/dividend yield (Aug –Oct 2013, SNL)
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16

17 The corresponding ROE estimates are:

Constant growth DCF	Mean Low	Mean	Mean High
90- day average	8.68	9.82	11.09

18

19 See Attachment 4 for DCF

1 **Option 2.**

2 Proxies modeled for the five combined gas and electric distribution companies (the
3 ‘distribution ‘option)

Adjustments	<ul style="list-style-type: none">• Selection of the five ‘distribution’ companies from the original Proxy Group
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4

5 The corresponding ROE estimates are:

Constant growth DCF	Mean Low	Mean	Mean High
90-day average	8.68	9.33	10.11

6

7 See Attachment 5 for DCF

8 **Option 3.**

9 Proxies modeled for the five 100% electric revenue generated companies (the ‘electric’
10 option).

Adjustments	<ul style="list-style-type: none">• Selection of five 100% electric operating companies from the original Proxy Group
--------------------	---

11

12 The corresponding ROE estimates are:

Constant growth DCF	Mean Low	Mean	Mean High
90-day average	8.02	9.27	10.10

13

14 See Attachment 6 for DCF

15

16 **F. Staff Findings & Recommendations**

17

18 **Q. What were the findings arising from the Staff analysis?**

1 A. Having discarded the multi stage DCF model, Staff focused attention on replicating the
2 Constant growth DCF analysis using the company designed methodology, and adjusting
3 for all issues as listed below:

- 4 • Replace partial data by full rejection of OtterTail data
- 5 • Making use of a single 90-day average day stock prices.
- 6 • Rejection of the application of the sustainable growth estimate
- 7 • Rejection of the use of a multistage DCF to determine the ROE for Granite State
- 8 • Consideration of all ROE estimates, low mean, mean and high of low
- 9 • Testing the DCF results by applying it to a gas and electric distribution subset of
10 companies
- 11 • Testing the DCF results by applying to a subset of 100% electric revenue drive
12 companies.
- 13 • Taking account of the ROE authorized in other jurisdictions for all electric
14 utilities in the last three years.

15 **Q. What are Staff's conclusions arising from the analysis?**

16 A. Correcting the Constant Growth DCF analysis for Otter Tail data, removal of sustainable
17 growth estimates, and updating the stock price and dividend yield for the period August
18 2013 to October 2013, using SNL proprietary data, we find that the resulting cluster
19 between low, mean and high is narrower than the results expressed by Mr. Hevert;
20 between 8.68% and 11.09%.

21 If we then take into account the first subset of distribution only companies, and set aside
22 the potential danger arising from small sample size, we find that the cluster of potential
23 ROEs is tighter yet between 8.65% and 10.11%. Despite a proxy group of five, Staff is

1 mindful of the New Hampshire Public Utilities guidance in the matter and its view that
2 “the DCF is an economic theory for which a more comparable sample, rather than a
3 larger sample, produces results that are more likely to be representative of the subject
4 utility.”⁶

5 Finally, if we compare the distribution sample with the results of the 100% electric
6 revenue driven sample, we find that despite there being no overlap in companies
7 considered, the ROE range is once again consistent between 8.02% and 10.10%.

8 Taking account of the range of ROEs for the full sample, and the two distribution and
9 electric subsets we have a ROE range of between 8.02% and 11.09%. Within that range
10 it is Staff’s view that an ROE of 9.55% is reasonable and appropriate.

11 **Q. How can the CALPECO settlement inform our recommendations with respect to**
12 **Granite States’ ROE?**

13 A. CALPECO (‘ CPE’) is an affiliate of GSEC, with a company profile not dissimilar as an
14 electric distribution company serving approximately 49,000 customers in California. On
15 November 29, the California Public Utilities Commission adopted a unanimous
16 settlement which authorized California Pacific Electric an electric rate base increase
17 based on a 9.85% return on equity (51.5% of capital) and a 7.75% return on average rate
18 base for the 2013 calendar test year. CPE filed the rate case in February of 2012 seeking a
19 10.5% return on equity and 8.24% return on rate base. The California settlement may be
20 used as a sanity check and further evidence that the Staff recommendation for GSEC of
21 9.55% ROE is reasonable.

⁶ New Hampshire Public Utilities Commission, Docket No DT 02-110, Order No 24,265, *Verizon New Hampshire, Investigation into Cost of Capital*, Order establishing Cost of Capital, January 16, 2004, at 61

1 **Q. What are the findings from Staff’s analysis of ROEs awarded to electric utilities in**
2 **the last year?**

3 A. Staff has determined that of the authorized ROEs for 38 electrical utilities listed to date in
4 2013, 8 did not provide an outcome and of the remainder, 17 were authorized in the range
5 of 9.00 -9.83, with an average of 9.60% .This serves to reinforce Staff’s view that the
6 9.55% ROE recommendation is reasonable.(See Attachment 3)

7 **Q. What are Staff’s recommendations for the ROE, and using the debt/equity split as**
8 **proposed by the company and confirmed by Staff, what should be the overall rate of**
9 **return?**

10 Based on the company proposed capital structure of 45.00 percent debt and 55.00 percent
11 equity, the company’s proposed cost of debt of 5.95 percent and my recommended 9.55%
12 return on equity, the company’s proposed overall Rate of Return is 7.92 percent. (See
13 Table 3 below).

14

15

Table 3

16

Proposed overall rate of return

Component	Percentage of Total	Cost Rate	Weighted Cost Rate
Common Equity	55.00%	9.55%	5.25%
Long Term Debt	45.00%	5.95%	2.67%
Total	100.00%		7.92%

17