

Puget Sound Energy, Inc. P.O. Box 97034 Bellevue, WA 98009-9734

Filed at WUTC via Hand Delivery

June 1, 2012

Mr. David Danner, Executive Director and Secretary Washington Utilities and Transportation Commission 1300 South Evergreen Park Drive S.W. P.O. Box 47250 Olympia, WA 98504-7250

# Re: <u>RCW-Required Report, RCW 19.285.070 and</u> <u>WAC-Required Report, WAC 480-109-040</u> <u>Renewable Energy Target</u>

Dear Mr. Danner:

Enclosed for filing, please find Puget Sound Energy, Inc.'s ("PSE") report detailing the company's progress in meeting the renewable energy target for 2012, including:

- PSE's annual load for the prior two years;
- the amount of megawatt-hours needed to meet the annual renewable energy target by the end of 2012; and
- the percent of PSE's total annual retail revenue requirement invested in the incremental cost of eligible renewable resources and the cost of renewable energy credits in 2012.

The report is filed pursuant to RCW 19.285.070 and WAC 480-109-040. A copy of this report was also submitted to the Department of Commerce.

If you have any questions about the information contained in this filing, please contact Eric Englert, Manager, Regulatory Initiatives & Tariffs, at 425-456-2312.

Sincerely,

Tom De Boch

Tom DeBoer Director, Federal & State Regulatory Affairs

Enclosures



Filed via Department of Commerce Email

Bellevue, WA 98009-9734

June 1, 2012

Mr. Chuck Murray Department of Commerce i937@commerce.wa.gov

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Annual Reporting Requirements Renewable Energy Target RCW 19.285.070 and WAC 480-109-040 Puget Sound Energy 2012

# **Required Contents: Checklist and Table of Contents**

RCW 19.285.070	WAC 480-109-040	Section/Page
For each year that a qualifying utility elects to demonstrate alternative compliance under RCW $19.285.040(2)$ (d) or (i) or $19.285.050(1)$ , it must include in its annual report relevant data to demonstrate that it met the criteria in that section.	The report must state if the utility is relying upon one of the alternative compliance mechanisms provided in WAC <u>480-109-030</u> instead of meeting its renewable resource target. A utility using an alternative compliance mechanism must include sufficient data, documentation and other information in its report to demonstrate that it qualifies to use that alternative mechanism.	Section 1 - Alternative Compliance Page 3
the utility's annual load for the prior two years,	the utility's annual load for the prior two years,	Section 2 -Annual Load For Previous Two Years Page 4
the amount of megawatt-hours needed to meet the annual renewable energy target,	the total number of megawatt-hours from eligible renewable resources and/or renewable resource credits the utility needed to meet its annual renewable energy target by January 1 of the target year	Section 3 - Renewable Energy Target Page 4
the amount of megawatt-hours of each type of eligible renewable resource acquired, the type and amount of renewable energy credits acquired	the amount (in megawatt-hours) and cost of each type of eligible renewable resource used	Section 4 - Renewable Energy Acquired To Have Met Renewable Energy Target Page 5
the percent of its total annual retail revenue requirement invested in the incremental cost of eligible renewable resources and the cost of renewable energy credits	the type and cost (per megawatt-hour) of the least-cost substitute resources available to the utility that do not qualify as eligible renewable resources, the incremental cost of eligible renewable resources and renewable energy credits, and the ratio of this investment relative to the utility's total annual retail revenue requirement. The report must describe the steps the utility is taking to meet the renewable resource requirements for the current year. This	Section 5 - Incremental Cost Compared To Annual Retail Revenue Requirement Page 6 Section 6 - Current Year Progress
	description should indicate whether the utility plans to use or acquire its own renewable resources, plans to or has acquired contracted renewable resources, or plans to use an alternative compliance mechanism.	Page 8

# **SECTION 1** Alternative Compliance

This section states if the utility is relying upon one of the alternative compliance mechanisms provided in WAC <u>480-109-030</u> instead of meeting its renewable resource target. A utility using an alternative compliance mechanism instead of meeting its renewable resource target, must include sufficient data, documentation and other information in its report to demonstrate that it qualifies to use that alternative mechanism.

Puget Sound Energy, Inc. ("PSE") has not decided if or to what extent it may utilize one of the alternative compliance mechanisms provided for in the RCW and WAC instead of meeting its 2012 renewable resource target. Events beyond PSE's control may yet occur during the remainder of calendar year 2012. Such determination will be made when PSE reports on its final 2012 compliance in the 2013 or 2014 report.

It should be noted that the actions of a governmental authority have adversely impacted the generation and transmission of eligible renewable resources owned by PSE by over 20,000 MWh in 2011 and through May 15, 2012 (see table below).

### **Adjustments for Events Beyond Control**

	2011	2012 (YTD 05/15/2012)
MWh (anticipated but not generated		
due to curtailment)	18,584	3,984
Apprenticeship Labor Multiplier		
(unable to utilize multiplier credits		
related to curtailment)	-	498
Total	18,584	4,482

# SECTION 2 Annual Load For Previous Two Years

This section states the utility's annual load for the prior two years.

RCW 19.285 Compliance Need	2010	2011	
Delivered Load to Retail Customers (MWh)	20,901,139	21,496,074	

The source of this data is the PSE 2011 FERC Form 1, page 301, line number 10, columns d and e. Please also see Attachment 1.

# **SECTION 3** Renewable Energy Target

This section contains the total number of megawatt-hours from eligible renewable resources, and/or renewable energy credits, and/or multiplier credits the utility needed to meet its annual renewable energy target.

PSE's Renewable Energy Target, should it elect not to utilize an alternative compliance mechanism, is 635,958 MWh for 2012.

Renewable Energy Target Need	2010	2011	2012
Delivered Load to Retail Customers (MWh)	20,901,139	21,496,074	
WA State RCW 19.285 Requirement			3%

Please also see Attachment 1.

**Quantity Required for Compliance** 

635,958

# SECTION 4 Renewable Energy Acquired To Have Met Renewable Energy Target

This section contains the total number of megawatt-hours from eligible renewable resources, renewable energy credits, and/or multiplier credits the utility acquired to meet its annual renewable energy target.

Per RCW 19.285.040, there is no renewable energy target for 2011. Generation and acquisitions will continue in the remainder of calendar year 2012. PSE will report on such generation and acquisitions for its 2012 target in either its 2013 or 2014 report, assuming that it does not elect to utilize one of the alternative compliance mechanisms instead of using megawatt-hours from its eligible renewable resources, renewable energy credits or multiplier credits.

# SECTION 5 Incremental Cost Compared To Annual Retail Revenue Requirement

This section contains the percent of its total annual retail revenue requirement invested in the incremental cost of eligible renewable resources and the cost of renewable energy credits. This includes the type and cost (per megawatt-hour) of the least-cost substitute resources available to the utility that do not qualify as eligible renewable resources, the incremental cost of eligible renewable resources and renewable energy credits, and the ratio of this investment relative to the utility's total annual retail revenue requirement.

The type and cost of the least-cost substitute resources available to the utility at the time of decision that do not qualify as eligible renewable resources is contained in Attachment 2.

The incremental cost of eligible renewable resources and renewable energy credits for 2012 is \$27.83 million. A detailed description of the methodology for this calculation is contained in Attachment 2, which was filed with the Commission on May 27, 2011, as part of PSE's 2011 Integrated Resource Plan, as part of Docket No. U-100961. One important element of that section is the description on page I-48, which demonstrates that the cost of an equivalent non-renewable resource has three components:

- 1. Capacity Cost: There are two parts of capacity cost: First is the capacity in MW. This would be nameplate for a firm resource like biomass, or the assumed capacity of a wind plant. Second is the \$/kW cost, which we assumed to be equal to the cost of a peaker.
- Energy Cost: This was calculated by taking the hourly generation shape of the resource, multiplied by the market price in each hour. This is the equivalent cost of purchasing the equivalent energy on the market.
- 3. Imputed Debt: The law states the non-renewable must be an "equivalent amount," which includes a time dimension. If PSE entered into a long-term contract for energy, there would be an element of imputed debt. Therefore, it is included in this analysis as a cost for the non-renewable equivalent.

The incremental cost of each of the eligible renewable resources is shown in the table below. The analysis is conducted over a 25 year life of the project (for wind) and levelized over that life, producing a one-year cost, in this case, for 2012.

(\$ Millions/Year)	Renewable Resource	Equival	Equivalent Non-Renewable		
		Peaker	Market	Total	Incremental Cost
Hopkins Ridge	\$18.77	\$1.71	\$19.26	\$20.97	(\$2.20)
Wild Horse	\$34.94	\$3.21	\$26.53	\$29.74	\$5.20
Klondike III	\$10.27	\$0.93	\$8.98	\$9.91	\$0.36
Hopkins Infill	\$1.28	\$0.17	\$1.19	\$1.36	(\$0.08)
Wild Horse Expansion	\$10.03	\$0.81	\$5.09	\$5.90	\$4.14
Lower Snake River I	\$70.61	\$1.69	\$48.51	\$50.20	\$20.42
Total					\$27.83

The total annual retail revenue requirement for 2012 is \$2,057.344 million. This total annual retail revenue requirement for 2012 is based on 4.5 months of the revenue requirement of \$2,086.515 million determined in PSE's 2009 GRC (UE-090704), and 7.5 months of the revenue requirement of \$2,039.841 million determined in PSE's 2011 GRC (UE-111048).

Thus the ratio of this investment relative to the utility's total annual retail revenue requirement is 1% (27.83 / 2,057.344 = 1%).

Please also see Attachment 2.

# SECTION 6 Current Year Progress

This section contains a description of the steps the utility is taking to meet the annual renewable energy target for the current year. This description should indicate whether the utility plans to use or acquire its own renewable resources, plans to or has acquired contracted renewable resources, or plans to use an alternative compliance mechanism.

On several occasions, PSE previously informed the Commission that it is on track to meet the Renewable Energy Target requirement for the (current) year 2012.

On March 31, 2011, in its compliance filing in Docket No. U-072375, in regard to merger commitment number 4, PSE informed the Commission: "PSE is on track to meet the Renewable Energy Target requirement for the year 2012. PSE believes that it has acquired enough eligible renewable resources or renewable energy credits to meet the renewable energy target for 2012 as noted in RCW 19.285.040(2)."

On May 27, 2011, PSE filed its 2011 Integrated Resource Plan, as part of Docket No. U-100961. In Appendix I, PSE displays the resources that meet the definition of eligible renewable resource in RCW 19.285. Please see Attachment 2.

On August 11, 2011, PSE presented its 2011 Integrated Resource Plan to the Commissioners and the public. Within that presentation, on slides number 5 and 103, PSE indicated to the Commissioners and the public that PSE has acquired specific eligible renewable resources to meet the Renewable Energy Target for the year 2012. The entire presentation is available at the WUTC Website under Docket No. U-100961.

On December 29, 2011, PSE determined it would have sufficient eligible renewable resources in its portfolio by January 1, 2012 to supply at least three percent of its load for the year 2012. Please see Attachment 3, which documents this determination and also lists the resources that meet the definition of "eligible renewable resource" in RCW 19.285

The Commission has determined that PSE's acquisition of the following eligible renewable resources was prudent, the docket numbers and the order number in which the Commission made the prudence determination is provided. The cost of each eligible renewable resource and its expected production output is contained within the documentation in those dockets.

- Hopkins Ridge wind generation facility, Docket No. UE-050870 (Order No. 04)
- Wild Horse wind farm, Docket No. UE-060266 (Order No. 08)
- 7.2 MW additional wind capacity at PSE-owned Hopkins Ridge Wind Farm ("the Hopkins Ridge Infill"), Docket No. UE-072300 (Order No. 12)
- 44 MW additional wind capacity at PSE-owned Wild Horse Wind Facility ("the Wild Horse Expansion"), Docket No. UE-090704 (Order No. 11)
- Lower Snake River 1 ("LSR-1") wind farm, Docket No. UE-111048 (Order No. 08)

The expected output of all these eligible renewable resources was provided in the power cost analysis in Docket No. UE-111048.

PSE has not decided if or to what extent it may utilize one of the alternative compliance mechanisms provided for in the RCW and WAC instead of meeting its 2012 renewable resource target. Events beyond PSE's control may yet occur during the remainder of calendar year 2012. Such determination will be made when PSE reports on its final 2012 compliance in the 2013 or 2014 report.

It should be noted that the actions of a governmental authority have adversely impacted the generation and transmission of eligible renewable resources owned by PSE by over 20,000 MWh in 2011 and through May 15, 2012.

Attachment 1 – Department of Commerce EIA Report for Renewables – RCW 19.285 Compliance Reporting Tool (WUTC)

#### Energy Independence Act (RCW 19.285) *Renewable Energy Report*

	Utility	Puget Sound Energy	_
	Report Submittal Date	June 1, 2012	
	Utility Contact Name/Dept	Eric Englert	
	Phone	(425) 456-2312	
	Email	eric.englert@pse.com	_
Compliance Year		2012	_

#### *Note:* All entries are based on contracts dated no later than January 1, 2012.

	In Thousands
Annual Retail Revenue Requirement	\$ 2,057,344
Budgeted Incremental Expenditures on Eligible Renewable	
Resources	\$ 27,830
Budgeted Expenditures for Renewable Energy Credits	
Net Incremental Cost	\$ 27,830
Budgeted Incremental Expenditures on Renewable Resources	
as % of Annual Retail Revenue Requirement	1%

2010 Annual Load (MWh)	20,901,139
2011 Annual Load (MWh)	21,496,074
Average of 2010 & 2011 Loads (MWh) Statutory Target 2012-2015	21,198,607 3%
2012 Renewable Energy Target (MWh)	635,958

Reporting Entity:	Puget Sound Energy				
Reporting Date:	June 1	, 2012			
RCW 19.285 Compliance Need	2010	2011	2012	2013	
Delivered Load to Retail Customers (MWh)	20,901,139	21,496,074			
WA State RCW 19.285 Requirement		0%	3%	3%	
Quantity Required for Compliance		-	635,958		
Eligible Quantity Acquired	2010	2011	2012	2013	
Qualifying MWh Allocated to WA		-	-	-	
Quantity from Non REC Eligible Generation		-	-	-	
Total Quantity Available for RCW 19.285 Comp	liance	-	-	-	
Sales and Transfers	2010	2011	2012	2013	
Quantity of RECs Sold		-	-	-	
Bonus Incentives Transferred		-	-	-	
Bonus Incentives Not Realized		-	-	-	
Total Sold / Transferred / Unrealized		-	-	-	
Adjustments	2010	2011	2012	2013	
2011 Surplus Applied to 2012		-	-		
2012 Surplus Applied to 2011		-	-		
2012 Surplus Applied to 2013			-	-	
2013 Surplus Applied to 2012			-	-	
Net Surplus Adjustments		-	-	-	
Adjustment for Events Beyond Control		-	-	-	
	2010	2011	2012*	2013*	
RCW 19.285 Compliance Surplus / (Deficit)		-	(635,958)		

\* Any surplus shown in 2012 or 2013 may be sold or used for compliance in subsequent years. Compliance deficits shownin 2013 may be filled by REC procurement from subsequent years.

In both the "Compliance Summary" and "Facility Detail" worksheets, utilities may need to protect commercially sensitive information by use of the CONFIDENTIAL designation.

Attachment 2 – Portion of PSE's 2011 IRP describing: the type and cost of the least-cost substitute resources available to the utility at the time of decision that do not qualify as eligible renewable resource; and the incremental cost of eligible renewable resources

# **APPENDIX I • ELECTRIC ANALYSIS**

D. Incremental Cost of Renewable Resources to meet RCW 19.285 Incremental Cost Alternative Compliance

# 1. Overview

According to RCW 19.285, certain electric utilities in Washington must meet 15 percent of their retail electric load with eligible renewable resources by the calendar year 2020. The annual target for the calendar year 2012 is 3 percent of retail electric load. However, if the incremental cost of those renewable resources compared to an equivalent non-renewable is greater than 4 percent of its revenue requirement, then a utility will be considered in compliance with the annual renewable energy target in RCW 19.285. "The incremental cost of an eligible renewable resource is calculated as the difference between the levelized delivered cost of the eligible renewable resource, regardless of ownership, compared to the levelized delivered cost of an equivalent amount of reasonably available substitute resource that do not qualify as eligible renewable resources"<sup>3</sup> (equivalent non-renewable).

# 2. Analytic Framework

This analysis compares the revenue requirement cost of each renewable resource with the projected market value and capacity value at the time of the renewable acquisition. This, "contemporaneous" with the decision-making aspect of PSE's approach, is important. Utilities should be able to assess whether they will exceed the cost cap before an acquisition, without having to worry about ex-post adjustments that could change compliance status. The analytical framework here reflects a close approximation of the portfolio analysis used by PSE in resource planning, as well as in the evaluation of bids received in response to the company's Request for Proposals (RFP).

<sup>&</sup>lt;sup>3</sup> RCW 19.285.050 (1) (*a*) (*b*)

# *3. Resources that meet RCW 19.285 definition of Eligible Renewable Resource*

Figure I-35

Resources that meet RCW 19.285 definition of Eligible Renewable Resource

	Nameplate (MW)	Annual Energy (aMW)	Commercial Online Date	Poakor	
Hopkins Ridge	149.4	53.3	Dec 2005	2004 RFP	20%
Wild Horse	228.6	73.4	Dec 2006	2006 RFP	17.2%
Klondike III	50	18.0	Dec 2007	2006 RFP	15.6%
Hopkins Infill	7.2	2.4	Dec 2007	2007 IRP	20%
Wild Horse Expansion	44	10.5	Dec 2009	2007 IRP	15%
Lower Snake River I	342.7	102.5	Apr 2012	2010 Trends	5%
Snoqualmie Upgrades	6.1	3.9	Mar 2013	2009 Trends	95%
Lower Baker Upgrades	30	12.5	May 2013	2011 IRP Base	95%
Generic Wind 2020	300	89.7	Jan 2020	2011 IRP Base	1.8%
Generic Wind 2027	100	29.9	Jan 2027	2011 IRP Base	1.8%
Generic Biomass 2020	25	21.25	Jan 2020	2011 IRP Base	93%
Generic Biomass 2029	25	21.25	Jan 2029	2011 IRP Base	93%

# 4. Equivalent Non-Renewable

The incremental cost of a renewable resource is defined as the difference between the levelized cost of the renewable resource compared to an equivalent non-renewable resource. An equivalent non-renewable is an energy resource that does not meet the definition of a renewable resource in RCW 19.285, but is equal to a renewable resource on an energy and capacity basis. For the purpose of this analysis, the cost of an equivalent non-renewable resource has three components:

- Capacity Cost: There are two parts of capacity cost: First is the capacity in MW. This would be nameplate for a firm resource like biomass, or the assumed capacity of a wind plant. Second is the \$/kW cost, which we assumed to be equal to the cost of a peaker.
- 2. Energy Cost: This was calculated by taking the hourly generation shape of the resource, multiplied by the market price in each hour. This is the equivalent cost of purchasing the equivalent energy on the market.

### **APPENDIX I • ELECTRIC ANALYSIS**

3. Imputed Debt: The law states the non-renewable must be an "equivalent amount," which includes a time dimension. If PSE entered into a long-term contract for energy, there would be an element of imputed debt. Therefore, it is included in this analysis as a cost for the non-renewable equivalent.

For example, Hopkins Ridge produces 466,900 MWh annually. The equivalent non renewable is to purchase 466,900 MWh from the Mid-C market and then build a 30 MW (149.4\*20 percent = 30) peaker plant for capacity only. With the example, the cost comparison includes the hourly Mid-C price plus the cost of building a peaker, plus the cost of the imputed debt. The total revenue requirement (fixed and variable costs) of the non-renewable is the cost stream—including end-effects—discounted back to the first year. That net present value is then levelized over the life of the comparison renewable resource.

#### 5. Cost of Renewable Resource

Levelized cost of the renewable resource is more direct. It is based on the preforma financial analysis performed at the time of the acquisition. The stream of revenue requirement (all fixed and variable costs, including integration costs) are discounted back to the first year—again, including end effects. That net present value is then levelized out over the life of the resource/contract. The levelized cost of the renewable resource is then compared with the levelized cost of the equivalent non-renewable resource to calculate the incremental cost.

# 6. Example

The following is a detailed example of how PSE calculated the incremental cost of Wild Horse. It is important to note that PSE's approach uses information contemporaneous with the decision making process, so this analysis will not reflect updated assumptions for capacity, capital cost, or integration costs, etc.

Eligible Renewable: Wild Horse Wind Facility Capacity Contribution Assumption: 228.6 \* 17.2% = 39 MW

1. Calculate Wild Horse Revenue Requirement

Figure I-36 is a sample of the annual revenue requirement calculations for the first few years of Wild Horse, along with the NPV of revenue requirement.

#### Figure I-36

#### Calculation of Wild Horse Revenue Requirement

(\$ Millions)	20-yr NPV	2007	2008	 2025
Gross Plant		384	384	 384
Accumulative depreciation		(10)	(29)	 (355)
(Avg.)				
Accumulative deferred tax		(20)	(56)	 (7)
(EOP)				
Rate base		354	299	 22
After tax WACC		7.01%	7.01%	 7.01%
After tax return		25	21	 2
Grossed up return		38	32	 2
PTC grossed up		(20)	(20)	 -
Expenses		16	16	 22
Book depreciation		19	19	 19
Revenue required	370.9	53	48	 44
End effects	4.6			
Total revenue requirement	375			

## **APPENDIX I • ELECTRIC ANALYSIS**

2. Calculate Revenue Requirement for Equivalent non-renewable: Peaker Capacity

Capacity = 39 MW Capital Cost of Capacity: \$462/KW

#### Figure I-37

#### **Calculation of Peaker Revenue Requirement**

(\$ Millions)	20-yr NPV	2007	2008	 2025
Gross Plant		18	18	 18
Accumulative depreciation (Avg.)		(0)	(1)	 (10)
Accumulative deferred tax (EOP)		(0)	(0)	 (3)
Rate base		18	17	 5
After tax WACC		7.01%	7.01%	 7.01%
After tax return		1	1	 0
Grossed up return		2	2	 0
Expenses		1	1	 2
Book depreciation		1	1	 1
Revenue required	32	4	4	 3
End effects	2			
Total revenue requirement	34			

3. Calculate Revenue Requirement for Equivalent non-renewable: Energy

Energy: 642,814 MWh

For the Market purchase, we used the hourly power prices from the 2006 RFP plus a transmission adder of \$1.65/MWh in 2007 and escalated at 2.5 percent.

Mont h	Day	Hour	20-yr NPV	2007		2025	
1	1	1		49 MW * \$59/MW = \$2891		49 MW * \$61/MW = \$2989	
1	1	2		92 MW * \$60/MW = \$5520		92 MW * \$63/MW = \$5796	
12	31	24		13 MW * \$59/MW = \$767		13 MW * \$65/MW = \$845	
(\$Millions)							
Cost of Market			36		41		
Imputed Debt			1		0		
Total Revenue Requirement		285	37		41		

Figure I-38

#### **Calculation of Energy Revenue Requirement**

4. Incremental Cost

The table below is the total cost of Wild Horse less the cost of the peaker and less the cost of the market purchases for the total 20-year incremental cost difference of the renewable to an equivalent non-renewable.

#### Figure I-39

#### 20-yr Incremental Cost of Wild Horse

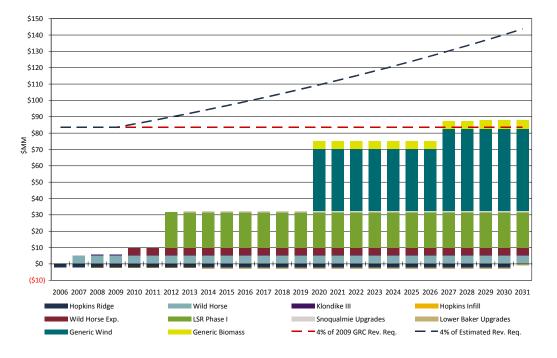
(\$ Millions)	20-yr NPV		
Wild Horse	375		
Peaker	34		
Market	285		
20-yr Incremental Cost of Wild Horse	56		

We chose to spread the incremental cost over 25 years since that is the depreciable life of a wind project used by PSE. The payment of \$56 Million over 25 years comes to \$5.2 Million/Year using the 7.01 percent discount rate.

## 7. Summary Results

Each renewable resource that counts towards meeting the renewable energy target was compared to an equivalent non-renewable resource starting in the same year and levelized over the book life of the plant: 25 years for wind power, and 40 years for hydroelectric power. Figure I-40 presents results of this analysis for existing resources and projected resources. This demonstrates PSE expects to meet the physical targets under RCW 19.285 without being constrained by the cost cap. The negative cost difference means that the renewable was lower-cost than the equivalent non-renewable, while a positive cost means that the renewable was a higher cost.

#### Figure I-40



## Equivalent Non-renewable 20-year Levelized Cost Difference Compared to 4 Percent of 2009 GRC Revenue Requirement

As the chart reveals, even if the company's revenue requirement were to stay the same for the next 10 years, PSE would still not hit the 4 percent requirement. The estimated revenue requirement uses a 2.5 percent assumed escalation from the 2009 General Rate Case revenue requirement. Attachment 3 – Memorandum determining that PSE has sufficient eligible renewable resources in its portfolio by January 1, 2012 to supply at least three percent of its load for the year 2012



# **MEMORANDUM**

TO: Tom DeBoer, Roger Garratt

FROM: Eric Englert, Anna Mikelsen

SUBJECT: Requirements of Chapter 480-109-020 WAC

DATE: December 29, 2011

## **Background**

Chapter 480-109-020 WAC Renewable resources states:

"(1) Each utility must meet the following annual targets.

- (a) *By January 1 of each year beginning in 2012* and continuing through 2015, each utility must use sufficient eligible renewable resources, acquire equivalent renewable energy credits, or a combination of both, to supply at least three percent of its load for the remainder of each year.
- . . .

(2) Renewable energy credits produced during the target year, the preceding year or the subsequent year may be used to comply with this annual renewable resource requirement provided that they were acquired by January 1 of the target year.

(3) In meeting the annual targets of this subsection, a utility must calculate its annual load based on the average of the utility's load for the previous two years.

(4) A renewable resource within the Pacific Northwest may receive integration, shaping, storage or other sevices from sources outside of the Pacific Northwest and remain eligible to count towards a utility's renewable resource target."

(Emphasis added.)

#### <u>Summary</u>

Pursuant to the requirements of Chapter 480-109-020 WAC, we have prepared this Memorandum to document that Puget Sound Energy, Inc. ("PSE") believes it has sufficient

eligible renewable resources in its portfolio by January 1, 2012 to supply at least three percent of its load for the year 2012.

This is consistent with the information provided to the WUTC on March 31, 2011 in PSE's compliance filing in Docket No. U-072375, in regard to merger commitment number 4, PSE stated that:

"PSE is on track to meet the Renewable Energy Target requirement for the year 2012. PSE believes that it has acquired enough eligible renewable resources or renewable energy credits to meet the renewable energy target for 2012 as noted in RCW 19.285.040(2)."

Following provides a summary of the Company's eligible renewable resources, load and renewable energy target.

## Eligible Renewable Resources

PSE has sufficient eligible renewable resources in its portfolio to supply at least three percent of its load for the year 2012, in advance of January 1, 2012.

Eligible renewable resources that PSE may elect to use in whole or in part to meet its 2012 target include:

- Hopkins Ridge Wind Project
- Wild Horse Wind Project
- Wild Horse Expansion Wind Project (including extra apprenticeship credits)
- Lower Snake River Wind Project (including extra apprenticeship credits)<sup>1</sup>
- Klondike III Wind Project (e.g. the output PSE purchases from Iberdrola)
- Customer-Generator owned facilities taking service from PSE under PSE electric rate Schedule 91.

These eligible renewable resources may be impacted by events beyond PSE's reasonable control that could not have been reasonably anticipated or ameliorated prevented PSE from meeting the renewable energy target. Such events may include weather-related damage, mechanical failure, strikes, lockouts, or actions of a governmental authority that adversely affect the generation, transmission, or distribution of an eligible renewable resource owned by or under contract to a qualifying utility.

<sup>&</sup>lt;sup>1</sup> Lower Snake River Wind Project is expected to commence commercial operation in 2012.

# <u>Load</u>

Load is defined in the rules as:

"Load" means the amount of kilowatt-hours of electricity delivered in the most recently completed year by a qualifying utility to its Washington retail customers. Load does not include off-system sales or electricity delivered to transmission-only customers.

PSE's actual 2010 delivered load is 20,908,384,000 kilowatt-hours (i.e. 20,908,384 megawatt-hours) and the 2011 forecast load is 21,473,836,000 kilowatt-hours (i.e. 21,473,836 megawatt-hours).

Consistent with WAC 480-109-020(3), based on the average of PSE's load in 2010 and 2011 and as reflected above, the Company's estimated load for purposes of meeting its 2012 target is 21,191,110 megawatt-hours.

## 2012 Renewable Energy Target

PSE's load is used to compute its annual renewable energy target.

Chapter 480-109-020(1)(a) WAC states: "By January 1 of each year beginning in 2012 and continuing through 2015, each utility must use sufficient eligible renewable resources, acquire equivalent renewable energy credits, or a combination of both, *to supply at least three percent of its load for the remainder of each year*." (Emphasis added.)

Based on the load calculations above and the three percent requirement in Chapter 480-109-020(1)(a) WAC, the Company's estimated renewable energy target for 2012 may end up being approximately 635,733 megawatt-hours.

# **Conclusion**

PSE's eligible renewable resources in 2012 may be expected to generate approximately 2,058,366 [REDACTED] after renewable energy credits committed/sold) megawatt-hours and/or renewable energy credits and/or extra apprenticeship credits – thus in surplus of PSE's 2012 renewable energy target, barring any impacts by events beyond PSE's reasonable control that could not have been reasonably anticipated or ameliorated prevented PSE from meeting the renewable energy target. Such events may include weather-related damage, mechanical failure, strikes, lockouts, or actions of a governmental authority that adversely affect the generation, transmission, or distribution of an eligible renewable resource owned by or under contract to a qualifying utility.

As reported to the WUTC on March 31, 2011, PSE is on track to meet the Renewable Energy Target requirement for the year 2012. PSE believes that it has acquired enough eligible renewable resources or renewable energy credits to meet the renewable energy target for 2012 as noted in RCW 19.285.040(2).