

**BEFORE THE WASHINGTON
UTILITIES AND TRANSPORTATION COMMISSION**

In the Matter of

PUGET SOUND ENERGY'S

Renewable Energy Target Progress
Report under RCW 19.285.070 and
WAC 480-109-040

DOCKET UE-140800

ORDER 02

ORDER AUTHORIZING USE OF
METHOD 2 AND RESULTING
INCREMENTAL HYDROPOWER
RATIOS

BACKGROUND

- 1 Pursuant to RCW 19.285.070(1), Puget Sound Energy (PSE or Company) filed its 2014 annual Renewable Energy Target Report with the Washington Utilities and Transportation Commission (Commission) on May 30, 2014. At the request of Commission Staff (Staff), the Company filed an amended report on June 27, 2014.
- 2 RCW 19.285.030(12)(b) allows the incremental output of certain hydropower facilities that have undergone efficiency improvements to be counted as an eligible resource for renewable portfolio standard (RPS) compliance. The law, however, does not specify how the incremental portion of an upgraded facility's output should be calculated.
- 3 In Docket UE-110523, the Commission acknowledged three methods for calculating incremental hydropower output: Method 1, which is annual calculation based on the observed water flows for that year; Method 2, which is a one-time calculation of a fixed incremental ratio based on historical flows that is then applied to observed generation each year; and Method 3, which is a one-time calculation of the average incremental output of the upgraded facility over a historical period that is then reported in perpetuity.
- 4 In the Company's 2013 Renewable Energy Target Report, it identified newly upgraded hydropower facilities at Lower Baker and Snoqualmie Falls that it intended to use for RPS compliance, and stated that it intended to use Method 3 for calculating their incremental output. The Commission recognized both facilities as eligible renewable resources¹ and approved PSE's use of Method 3, but noted that the Commission "may

¹ *In the Matter of Puget Sound Energy, Inc.'s Renewable Energy Target Progress Report Under RCW 19.285.070 and WAC 480-109-040, Docket UE-131072, Order 01 (September 9, 2013) at ¶30.*

determine in the future that a different method is more appropriate for determining EIA compliance in other years.”²

5 On March 13, 2015, the Commission adopted new rules for its enforcement of the Energy Independence Act (EIA) that, among other things, codified the three methods for calculating incremental hydropower production.³

6 In its 2015 Renewable Energy Target Report, Docket UE-151164, PSE indicated its intent to change to Method 2 for calculating incremental hydropower production from its Lower Baker and Snoqualmie Falls facilities. Staff reviewed the Company’s documentation of its incremental ratio calculations for Method 2 and recommended that the Commission accept them, which the Commission did in Order 01 of that docket.

7 WAC 480-109-200(3) requires all eligible resources used for RPS compliance by investor-owned utilities to be registered in the Western Renewable Energy Generation Information System (WREGIS). In Washington, the Department of Commerce (Commerce) has been designated as the WREGIS administrator.

8 PSE has filed applications with Commerce to register its Lower Baker and Snoqualmie Falls facilities in WREGIS. To approve the applications, Commerce requires that the Commission, as the oversight body for PSE, approve the incremental ratios that PSE has calculated for the facilities. While the Commission approved the Company’s calculations in Order 01 of Docket UE-151164, that order did not explicitly identify the approved ratios.

9 PSE’s petition seeks two things: the Commission’s authorization to switch from Method 3 to Method 2 for its 2014 RPS final compliance report, which is due by June 1, 2016; and acknowledgment of specific incremental hydropower ratios of 8.5 percent for Snoqualmie Falls and 28.3 percent for Lower Baker.

DISCUSSION

10 WAC 480-109-200(7)(c)(i) now requires that a utility using Method 2 calculate its incremental ratio using a historical period of at least five consecutive years. PSE’s modeling of the incremental output of Snoqualmie is based on five consecutive years of data, from 2005-2009. The Lower Baker modeling, however, is based on five representative, but non-consecutive, years. The modeling for both facilities was

² *Id.* at ¶23.

³ WAC 480-109-200(7). This rule went into effect in 2015, well after the commission’s initial review of these items.

conducted in 2010 in support of the Company's application for Section 1603 Treasury Grants.⁴

- 11 In discussions with Staff, the Company indicated that it no longer had access to the model used in 2010 to develop the incremental hydropower ratios, because the consultant that developed the model is no longer in business. PSE argues that re-modeling the Lower Baker plant using five consecutive years of data would require PSE to rebuild the model, at significant time and expense.
- 12 Staff reviewed the Company's Lower Baker analysis and believes that it complies with the intent of the rule, which is to prevent utilities from cherry-picking years to inflate the incremental ratio. The five years used in the analysis covers a wide range of water flow conditions, and had been used in PSE's relicensing process for Lower Baker in 2002 because of their close approximation to longer-term average conditions. On average, annual generation in the five years used in the analysis is about 1 percent lower than annual average generation from 1976-2002.⁵
- 13 Staff recommends that the Commission grant both requests. On the question of switching from Method 2 to Method 3, Staff believes that Method 2's use of actual water conditions each year means that it is more likely to be accurate over the long term than Method 3, which is a one-time calculation that may not accurately capture long-term variations. In its adoption order for the current EIA rule, the Commission identified this potential concern and required additional analysis for utilities using Method 3, including longer historical periods and regular checks on the method's accuracy.⁶ Staff believes it is in the public interest for PSE to switch to the more accurate and less burdensome Method 2.
- 14 On the question of Lower Baker's incremental ratio, Staff believes that PSE's use of five representative years that closely mirror longer-term averages complies with the rule's intent. Any accuracy gains that may be achieved by re-modeling the facility using five consecutive years would likely be insignificant, in Staff's opinion, and would come at significant administrative burden.

FINDINGS AND CONCLUSIONS

- 15 (1) The Washington Utilities and Transportation Commission is an agency of the state of Washington vested by statute with the authority to regulate the rates,

⁴ PSE's petition at ¶10.

⁵ PSE's petition, exhibit 2 at page 1.

⁶ *In the Matter of Amending, Adopting, and Repealing Rules in WAC 480-109 Relating to the Energy Independence Act*, Docket UE-131723, General Order R-578 (March 13, 2015) at ¶102-108.

regulations, practices, and accounts of public service companies, including electric companies.

- 16 (2) PSE is an electric company and a public service company subject to Commission jurisdiction.
- 17 (3) PSE serves more than 25,000 customers within the State of Washington and is a “qualifying utility” within the meaning of RCW 19.285.030(18).
- 18 (4) The Commission finds that PSE’s methodology for calculating the Company’s incremental electricity from hydropower efficiency improvements and the results of those calculations as described in the petition are appropriate, as is the Company’s request to change to Method 2 for RPS reporting.

ORDER

THE COMMISSION ORDERS:

- 19 (1) The Commission authorizes Puget Sound Energy to use Method 2 to calculate the incremental hydropower ratios toward its 2014 renewable energy target.
- 20 (2) The Commission approves an incremental hydropower ratio of 8.5 percent for Snoqualmie Falls and a ratio of 28.3 percent for Lower Baker.

The Commissioners, having determined this Order to be consistent with the public interest, directed the Secretary to enter this Order.

DATED at Olympia, Washington, and effective April 28, 2016.

WASHINGTON UTILITIES AND TRANSPORTATION COMMISSION

STEVEN V. KING, Executive Director and Secretary