Agenda Date:	July 27, 2017
Item Number:	A1
Docket:	UE-170174
Company:	Avista Corporation
Staff:	Kathi Scanlan, Regulatory Analyst

Recommendations

Take no action, thereby allowing the tariff filing made by Avista Corporation in Docket UE-170174 to become effective on August 1, 2017, by operation of law.

Background

On March 14, 2017, Avista Corporation d/b/a Avista Utilities (Avista or company) filed revisions to its electric demand side management (DSM or conservation) tariff, Schedule 91. The purpose of this tariff filing is to establish rates for conservation programs, reflecting changes documented in Avista's 2016 Annual Report and expected 2017 expenditures.¹ The 2017 conservation budget and target were reviewed by the Advisory Group and placed on the no action agenda of the May 31, 2017, open meeting.² On March 27, 2017, staff performed an onsite audit of Avista's conservation incentive and non-incentive expenditures that occurred between April 2016 and February 2017.

In April 2017, staff requested more information about the company's nonresidential interior lighting program rebates, in particular Tubular LED (TLED) projects. The company indicated that the information could not be gathered until June 2017—the data had to be recreated by hand to determine the quantity of rebates paid.

On May 26, 2017, the company filed replacement pages to change the effective date of the tariff revision from June 1, 2017, to August 1, 2017, and the tariff was removed from the open meeting agenda on May 31, 2017. At the request of staff, the company filed a revision to correct the estimated annual revenue change on June 5, 2017. On June 29, 2017, the company presented to staff the information requested about its TLED rebates.

Avista requests a total of \$19.9 million for electric conservation programs, which is a 33 percent increase from 2016.³ At the time of the initial filing, the underfunded tariff rider balance for this filing was approximately \$11.9 million. In order to provide an appropriate level of funding for ongoing conservation efforts, the company projects approximately \$8.0 million in additional

¹ 2016 Annual Conservation Report, Dockets UE-152076 and UG-152077, submitted June 1, 2017.

² Avista Corporation's 2017 Annual Conservation Plan, submitted on November 15, 2016, in Docket UE-152076.

³ *Avista Corporation*, Docket UE-160756. In August 2016, the company requested a total of \$15 million for electric conservation programs, and the commission approved the company's conservation cost recovery adjustment, where the average residential monthly bill increased \$0.59, or 0.7 percent.

funding needed over the next two years to bring the conservation rider balance to zero by July 31, 2019.⁴

Discussion

Avista spent over \$19.6 million on its electric conservation programs in 2016, a 52 percent increase from the \$12.9 million budget that the commission approved for the 2016 program year. This increase is largely due to the rapid increase in nonresidential program customer adoption of Tubular LEDs (TLEDs), which totaled more than \$6.1 million in incentive payments to customers and program implementation costs. The 2016 prescriptive interior lighting program delivered ten times more savings than the prior two years of the program.

As compared with the 2016 Plan, the company achieved savings of 71,572 MWh,⁵ exceeding its 2016 annual conservation program goal by approximately 50 percent. Avista is on track to exceed its total electric biennial conservation commitment of 82,477 MWh.⁶ For 2016, the electric program achieved a Utility Cost Test (UCT) of 2.79 and a Total Resource Cost (TRC) ratio of 1.76 in 2016.

This filing proposes changes to the electric rider rates, reflecting the actual costs and collections in 2016, and covering the amount budgeted for energy efficiency for the next two years. The proposed rates, as shown below, will increase the average monthly bill of a residential electric customer using 957 kWh by \$0.79, or 0.9 percent.

	Schedule	Current Rate per kWh	Proposed Rate per kWh	Percent Change
Residential &	Schedules 1 & 2	\$0.00262	\$0.00344	31%
Fixed-Income/Disabled				
General Service &	Schedules 11 & 12	\$0.00362	\$0.00463	28%
Residential and Farm				
Large General Service &	Schedules 21 & 22	\$0.00273	\$0.00366	34%
Large Residential/Farm				
Extra Large General Service	Schedule 25	\$0.00172	\$0.00232	35%
Pumping Service	Schedules 31 & 32	\$0.00261	\$0.00341	31%
Street Light Service	Schedules 41-48	\$0.00862	\$0.01215	41%

⁴ Avista provided the account balance as of February 28, 2017. The monthly expenditures for the remainder of 2017, and projections through July 2019, are estimates based on the *2017 Annual Conservation Plan*, Docket UE-152076. ⁵ Includes generation and distribution efficiency gains.

⁶ Docket UE-152076, Order 01, at Page 2. The biennial conservation target that is subject to penalties is 72,626 MWh, the NEEA projected savings includes 6,220 MWh, and the Decoupling Commitment of 5 percent is 3,631 MWh, totaling 82,477 MWh.

Staff Audit

The prudence review of Avista's conservation programs occurs in an ongoing manner through such avenues as advisory group participation and review of annual business plans, conservation potential assessments, biennial conservation reports, and annual cost recovery tariff filings. The cost recovery tariff filings before the commission now provide us with one of many opportunities to review Avista's conservation expenditures and the appropriateness of those expenditures.

On March 27, 2017, staff conducted an on-site audit of electric conservation expenditures and selected 27 residential, nonresidential and low-income program line item expenses. In particular, staff focused on Avista's 1,134 interior lighting energy savings projects under the Washington prescriptive interior lighting program, totaling over \$6.1 million in expenditures.⁷ During its prudence review, staff raised questions about why TLED incentives were paid at the higher \$15 incentive level. When using the Design Lights Consortium (DLC) ⁸ "rated data," it appeared that some of the TLED rebates could have been paid at the \$10 incentive level.

TLED Incentives

In early 2016, Avista commercial customers and vendors expressed confusion regarding the \$15 and \$10 incentive levels for TLED lamps because of the difference between what was printed in the DLC "rated data" and what was labeled on the lamp and lamp packaging. For example, in the case of a Philips TLED 15W product, the lamp itself, the packaging, and the online marketing materials all discuss 15W, but when the DLC measured and tested the actual operation of the lamp with a standard ballast, the DLC found that it used 17W.⁹

⁷ Avista's "Non-Residential Prescriptive Interior Lighting Rebate Form" consists of 30+ line item rebates offered for a set dollar amount (per unit), for fixtures, retrofits, lamps, or other lighting equipment.

⁸ The Design Lights Consortium® (DLC) lists and rates energy-efficient lighting products, establishes product quality specifications, and provides technical expertise for lighting.

⁹ Tubular LED lamps are used to replace fluorescent tubular lamps using the existing fixture. Therefore, the DLC testing protocol for TLEDs includes the effect of the ballast, which is needed to control all fluorescent lights. The ballast may consume an additional 8 to 10 watts. <u>http://www.naturallighting.com/cart/store.php?sc_page=50</u> Ballasts may be high or low output, and their energy use changes accordingly. Standard industry guidance directs manufacturers to label TLED bulbs with a wattage based on the power draw before the ballast.

2016 TLED Interior Lighting (Replacement–4 foot)	Annual Hours (hr)	Annual Savings (kWh) ¹⁰	Incentive (\$)	Quantity of lamps (q)
1-Lamp T12/T8 Fixture to 1-Lamp LED 8 W to 15 W	3,700	62.9	\$15	*11
1-Lamp T12/T8 Fixture to 1-Lamp LED 16 W to 23 W	3,700	40.7	\$10	*

Table 1: 2016 TLEDs Annual Savings and Incentive Levels

As shown in Table 1, when designing this lighting program, Avista divided TLEDs into two categories of incentives based on the estimated savings values from the DLC. These kWh savings estimates include an adjustment for the proportion of customers who changed from T12 to T8 technology and chose to leave all of the lamps in their fixtures in place and those customers who reduce the number of lamps. Typically, higher wattage lamps are brighter, and customers are thus more likely to reduce the number of lamps per fixture. Lower wattage lamps achieve higher savings, but are more likely to be fully replaced. Avista split the wattage and incentive levels at 15W to reflect these differences.

In addition to the confusion around the DLC "rated data" and the incentive payment split, Avista's third party evaluator, Nexant, calculated an interim realization rate of 71 percent for Avista's prescriptive lighting measures. This resulted in an adjusted 29 percent decrease in savings, as shown in Table 2. Nexant conducted 20 document reviews of the nonresidential prescriptive interior lighting rebates processed in 2016, including onsite verification activities, on a sample of non-residential projects for its annual conservation report.¹² As a result of Nexant's findings, the company voluntarily reduced its nonresidential interior lighting savings, as noted in Avista's 2016 Annual Report.¹³

			Adjusted
Program Measure Category	Annual Reported	Adjustment	Savings Decrease
	Savings (kWh)	-	(kWh)
PSC Nonresidential Interior Lighting	36,042,267	71%	25,590,010

Table 2: Nonresidential Reported and Adjusted Annual Savings

In March 2016, Avista's Energy Efficiency team discussed customer and vendor confusion related to TLED payments internally for possible solutions. The company determined that in order to give customers more clarity in their decision-making process, the incentive should be

¹⁰ Response to audit questions from Kathi Scanlan, follow-up dated April 6, 2017. Avista provided an illustrative example of 2016 TLED savings based on 3,700 annual hours of operation.

¹¹ In April 2017, staff requested more information about the company's nonresidential interior lighting program rebates. Avista indicated that the information could not be readily obtained until June 2017—the data had to be collected by hand to determine the quantity of rebates paid at the \$15 and \$10 levels. ¹² WAC 480-109-120(3).

¹³ Avista's 2016 Annual Report (June 1, 2017), at pages 46-47, in Docket UE-152076.

clarified and paid using the lamp's packaging and online marketing materials at the higher \$15 incentive level.

Staff has concerns that the company: 1) may not have pursued all feasible stakeholder involvement related to the TLED payment issues, and 2) should have discussed the issue in greater detail at the September 2016 meeting. Avista informed the advisory group, that in the 2017 Business Plan, the company would be lowering the rebate per lamp from \$15.00 to \$6.50. However staff believes the issue of the internal Avista decision and clarification to pay at the higher \$15 incentive level should have been discussed with the Advisory Group in March of 2016.

On June 29, 2017, over two months after staff initially requested information about the company's TLED rebates, Avista finally provided compelling evidence that the \$15 incentives were paid at the correct level. Based on the following information¹⁴, staff is satisfied that the rebates paid at the higher \$15 incentive level were prudent:

•	8w-15w Lamps (\$15 rebate):	364,167 units (273,008 were 12w lamps)

- 16w-23w Lamps (\$10 rebate): <u>23,394</u> units
- Total Lamps: $387,561 \text{ units}^{15}$

Avista is expected to keep adequate, detailed records that allow the commission to evaluate the company's decision making process. Avista kept the TLED rebate data; however, it did not track it via a spreadsheet or database upon initial processing. At the time of the audit, Avista could not readily produce the quantity of rebates paid at the different levels. In order to determine the quantity of rebates paid at the \$10 and \$15 level, the company had to undertake a cumbersome, by-hand, record retrieval process for over 1,100 commercial interior lighting prescriptive rebate forms. Staff encourages the company, particularly its Demand Side Management (DSM) group, to explore ways of better record keeping and rebate processing.

Improved Documentation and Advisory Group Communication

On June 29, 2017, Avista representatives met in person with commission staff and renewed their commitment to more open communication with the DSM Advisory Group, including more frequent Advisory Group check-ins. Further, the company indicated that an improved demand side database is under development and should eliminate the time lag issue encountered with staff's TLED rebate data request.

¹⁴ Puget Sound Energy's Business Lighting Incentive Program also allows TLED lamps to be "listed" on the Design Lights Consortium (DLC) and does not solely use DLC's "rated data" for incentive payment processing purposes. <u>https://pse.com/savingsandenergycenter/forbusinesses/lighting/pages/business-lighting-program.aspx</u>

¹⁵ For 2016 TLED rebates, \$ 5,462,505 in rebates were paid at the \$15 level and \$233,940 were paid at the \$10 level.

For the summer of 2017, the company scheduled several topic-specific WebEx Advisory Group meetings and initiated a standing bi-weekly conference call with staff to discuss upcoming conservation filings and outstanding issues. Staff is cautiously optimistic that communication with the Advisory Group will improve and that significant data request delays will be minimized (or eliminated) with the new database capabilities.

Customer Notification

A "Notice of Tariff Change" was posted on the company's website coincident with the date of this filing. Avista also sent bill inserts to customers regarding the proposed increase. Staff did not receive any comments opposing this tariff revision.

Conclusion

Commission staff has completed a thorough review of the company's supporting financial documents and records. Staff recommends the commission take no action, allowing the tariff to go into effect by operation of law.