

**BEFORE THE PUBLIC UTILITIES COMMISSION OF THE STATE OF COLORADO**

PROCEEDING NO. 16A-0546E

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IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF  
COLORADO FOR AUTHORIZATION TO IMPLEMENT A REVENUE DECOUPLING  
ADJUSTMENT MECHANISM AS A PART OF ITS COLORADO P.U.C. NO. 7-ELECTRIC  
TARIFF.

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**RECOMMENDED DECISION OF  
ADMINISTRATIVE LAW JUDGE  
ROBERT I. GARVEY  
APPROVING A RESIDENTIAL  
DECOUPLING ADJUSTMENT PILOT AND  
DENYING REVENUE DECOUPLING  
ADJUSTMENT FOR COMMERCIAL CUSTOMERS**

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Mailed Date: May 2, 2017

**TABLE OF CONTENTS**

I. STATEMENT.....	2
A. Procedural History.....	2
II. LEGAL STANDARDS .....	4
III. DISCUSSION.....	7
A. Public Service’s Application for a Revenue Decoupling Adjustment .....	7
B. Position of OCC .....	12
C. Position of Staff.....	16
D. Residential Decoupling .....	17
1. Full Versus Partial Decoupling .....	17
2. Cap on Earnings from the RDA Mechanism .....	21
3. Use per Customer verses Revenue per Customer .....	25
4. Tucson Model.....	26
5. Tucson Model for RE-TOU customers .....	30
6. True-up Mechanism .....	31
7. Adjustment for Customer Growth.....	33

8. Additional Issues .....	35
a. Implementation Date .....	35
b. ROE.....	36
c. DSM Disincentive Offset .....	38
d. Customer Education .....	38
e. Frequency of Rate Cases .....	39
f. WRA’s Recommendations .....	39
g. Monthly Revenue Adjustment .....	40
h. Required Reports.....	40
E. Small Commercial Decoupling .....	41
1. Objections and Recommendations .....	41
2. Positions of the Parties .....	43
IV. ORDER.....	45
A. The Commission Orders That: .....	45

## **I. STATEMENT**

### **A. Procedural History**

1. On November 5, 2014, the Commission dismissed Public Service Company of Colorado’s (Public Service or Company) proposal, filed as part of the Company’s Phase I Electric Rate Case, to implement a revenue decoupling adjustment surcharge. The Commission concluded that a decoupling mechanism would have broad policy implications and therefore should be presented in a separate application.<sup>1</sup>

2. On July 13, 2016, Public Service filed an Application seeking Commission approval to implement a Revenue Decoupling Adjustment (RDA) Mechanism for the period June 1, 2018 through May 31, 2023. The Company argues that the RDA Mechanism

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<sup>1</sup> Decision No. C14-1331-I, issued November 5, 2014, Proceeding No. 14AL-0660E.

is necessary to provide assurance it will recover its Commission approved fixed costs for residential and small commercial customers and to better align the Company's financial interest with public policies. That filing commenced this proceeding.

3. On September 7, 2016, by minute order, the Commission referred this matter to an Administrative Law Judge (ALJ).

4. On September 8, 2016, the undersigned established the parties to this proceeding.<sup>2</sup> Parties include: Staff of the Public Utilities Commission (Staff), the Office of Consumer Counsel (OCC), Southwest Energy Efficiency Project (SWEEP), the City of Boulder, City and County of Denver, Energy Outreach Colorado (EOC), Vote Solar, Western Resource Advocates (WRA), the Colorado Solar Energy Industries Association (COSEIA), and the Energy Freedom Coalition of America (EFCA).

5. Public Service waived the statutory deadline for a Commission decision contained in § 40-6-109.5, C.R.S.<sup>3</sup>

6. On February 14, 2017, Public Service filed a Motion for Admission *Pro Hac Vice* of Ron H. Moss (Motion). The Motion is unopposed and states good cause; therefore, this decision grants the Motion.

7. On February 21 through February 24, 2017, the ALJ held an evidentiary hearing pursuant to the previously established procedural schedule.<sup>4</sup> Hearing Exhibits corresponding to the pre-filed Direct, Answer, Rebuttal, and Cross-Answer Testimony were stipulated into the

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<sup>2</sup> Decision No. R16-0841-I, issued September 8, 2016, Proceeding No. 15A-0546E.

<sup>3</sup> Decision No. R16-0888-I, issued on September 27, 2016, Proceeding No. 15A-0546E.

<sup>4</sup> Decision No. R16-0888-I, issued September 27, 2016, Proceeding No. 15A-0546E established the procedural schedule.

evidentiary record.<sup>5</sup> Hearing Exhibits 2 through 26 were offered during direct examination, cross-examination, or redirect. Hearing Exhibits 8 and 15 were marked for identification, but not admitted; the other Exhibits were admitted into the record. At hearing, the undersigned amended the scheduled date for the filing of Statements of Position to March 17, 2017.

8. On March 17, 2017, Staff, OCC, Colorado Energy Office (CEO), Public Service, EOC, SWEEP, WRA, and Vote Solar each filed a post-hearing Statement of Position (SOP).

## II. LEGAL STANDARDS

9. In the normal course of the proceeding, the party that seeks Commission approval or authorization, Public Service, bears the burden of proof with respect to the relief sought; and the burden of proof is preponderance of the evidence. Section 24-4-105(7), C.R.S.; § 13-25-127(1), C.R.S.; Rule 4 *Code of Colorado Regulations* 723-1-1500 of the Commission's Rules of Practice and Procedure. The evidence must be "substantial evidence," which the Colorado Supreme Court has defined as:

such relevant evidence as a reasonable [person's] mind might accept as adequate to support a conclusion ... it must be enough to justify, if the trial were to a jury, a refusal to direct a verdict when the conclusion sought to be drawn from it is one of fact for the jury.

*City of Boulder v. Colorado Public Utilities Commission*, 996 P.2d 1270, 1278 (Colo. 2000) (quoting *CF&I Steel, L.P. v. Public Utilities Commission*, 949 P.2d 577, 585 (Colo. 1997)).

The preponderance standard requires the finder of fact to determine whether the existence of a *contested fact* is more probable than its non-existence. *Swain v. Colorado Department of*

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<sup>5</sup> Pursuant to Decision No. R16-0938-I, issued on October 11, 2016, this proceeding was conducted with an electronic record. Hearing Exhibits 101, 102, 103, 104, 105, 106, and 107 are the pre-filed testimony of Public Service. Hearing Exhibits 200 and 201 are the testimony of SWEEP. Hearing Exhibits 300 and 301 are the testimony of OCC. Hearing Exhibits 400 and 401 are the testimony of the Colorado Energy Office. Hearing Exhibits 500 and 501 are the testimony of Staff. Hearing Exhibits 800 and 801 are the testimony of Vote Solar. Hearing Exhibit 1000 is the testimony of WRA.

*Revenue*, 717 P.2d 507 (Colo. App. 1985). A party has met this burden of proof when the evidence, on the whole and however slightly, tips in favor of that party.

10. The preponderance of the evidence standard is understood and applied most easily in cases in which: (a) there are disputed facts; and (b) the resolution of the dispositive issue, or of an important issue, depends on the facts as determined by the decision-maker.<sup>6</sup>

11. The standard is not as direct in the above captioned proceeding. The most controversial issues require policy-based decisions and the parties present facts to persuade the decision-maker to adopt a particular policy or approach or to change an existing policy or approach. Generally, there are no disputed facts and the Commission “may set rates based on the evidence as a whole” and “need not base its decision on specific empirical support in the form of a study or data.” *Colorado Office of Consumer Counsel*, 275 P.3d at 656. For these reasons, the ALJ principally applied the reasonable basis standard when resolving issues in this proceeding.

12. The disputed issue in this proceeding is whether to maintain an existing Commission-adopted regulatory method, or to adopt a different regulatory method. In deciding these issues, the ALJ took the Commission-adopted method as the baseline or starting point and then assessed the evidence or policy rationale presented in support of the request to adopt the new method. In assessing a new method, the ALJ took into account the Commission’s rationale for initially adopting the method.

13. Public Service’s rates for electric service and related issues are matters of public interest. The Commission has an independent duty to determine matters that are within the

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<sup>6</sup> A civil penalty assessment proceeding is an example of such a case.

public interest. *Caldwell v. Public Utilities Commission*, 692 P.2d 1085, 1089 (Colo. 1984). As a result, the Commission is not bound by the Parties' proposals. The Commission may do what the Commission deems necessary to ensure that the final result is just, is reasonable, and is in the public interest *provided* the record supports the result *and provided* the reasons for the choices made (*e.g.*, policy decisions) are stated.

14. Section 40-3-101, C.R.S., contains the standard against which the Commission judges proposed rates and charges: All rates and charges must be "just and reasonable." In addition, the Colorado Supreme Court lists these factors:

Those charged with the responsibility of prescribing rates have to consider the interests of both the investors and the consumers. Sound judgment in the balancing of their respective interests is the means by which a decision is reached rather than by the use of a mathematical or legal formula. After all, the final test is whether the rate is "just and reasonable." And, of course, this test includes the constitutional question of whether the rate order "has passed beyond the lowest limit of the permitted zone of reasonableness into the forbidden reaches of confiscation."

*Public Utilities Commission v. Northwest Water Corporation*, 168 Colo. 154, 173, 451 P.2d 266, 276 (Colo. 1969) (*Northwest Water*) (citations omitted).

15. Further, the Commission must consider whether the rates and charges, taken together, are likely to generate sufficient revenue to ensure a financially viable public utility, which is in both the ratepayers' interest and the investors' interest. Finally, the Commission must consider the ratepayers' interest in avoiding or minimizing rate shock because the monopoly that a utility enjoys cannot be exerted, to the public detriment, to impose oppressive rates. *Northwest Water*, 168 Colo. at 181, 451 P.2d at 279. The Commission balances these factors and considerations when reviewing proposed rates and charges

16. In reaching his decision in this matter, the ALJ is mindful of these principles and of the Commission's duty. The ALJ has considered all arguments presented, including those

arguments not specifically addressed in this Decision. Likewise, the ALJ has considered all evidence presented at the hearing, even if the evidence is not specifically addressed in this Decision.

### **III. DISCUSSION**

#### **A. Public Service's Application for a Revenue Decoupling Adjustment**

17. Under traditional rate regulation, utility revenues for certain customer classes, including residential and small commercial customer classes, are based on volumetric sales. Therefore, all things being equal, higher kilowatt-hour (kWh) sales provide a greater opportunity for the utility to recover its costs and earn a profit. This is commonly referred to as the throughput incentive.

18. Public Service explains that revenue decoupling reduces the link between volumetric energy sales and the amount of revenue that the utility collects to recover its allowed fixed costs. At a high level, under a decoupling mechanism, the Commission establishes a target level of revenue or target level of sales. The Commission then compares actual revenue (or sales) to the target level. Any over-collection is refunded to customers through a bill credit. If the Company under-collects on its authorized amount of revenue (or sales), they add a surcharge on customers' bills.

19. Public Service contends that revenue decoupling is an increasingly common approach to addressing the throughput incentive. Public Service sites a report by Graceful Systems showing that the number of electric utilities with a decoupling mechanism doubled from 12 to 25 between 2009 and 2015.<sup>7</sup> The Company also points to a Natural Resource Defense Council (NRDC) report showing that 17 states have adopted some form of revenue decoupling

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<sup>7</sup> Hearing Exhibit 101, Jackson Direct, p. 23.

for electric utilities.<sup>8</sup> Finally, Public Service states that the Minnesota Public Utilities Commission (Minnesota PUC) recently adopted a three-year pilot of a revenue decoupling mechanism for residential and small commercial customers for its sister utility, Northern States Power (NSP).

20. Public Service also presents seven reasons that it contends support for the adoption of both the residential and small commercial decoupling adjustment mechanism:<sup>9</sup>

- Revenue decoupling aligns the Company's financial interests with customer preferences in self-generation and energy efficiency;
- Average usage per customer is declining and is diminishing Public Service's opportunity to recover its Commission authorized fixed costs;
- If approved, the Company's Advanced Grid Intelligence and Security (AGIS)<sup>10</sup> proposal has the potential to significantly decrease customers' energy usage;
- The RD-TOU pilot rate for residential customers and the Company's intention to move all residential customers to a different rate design than what is in place today creates uncertainty regarding fixed cost recovery;<sup>11</sup>
- Net metering reduces the opportunity for fixed cost recovery for customers who are billed primarily on the basis of kWh usage;
- Energy efficiency standards, technology advancements, and changes in consumer behavior will continue to erode the Company's opportunity to recover fixed costs; and,
- A decoupling mechanism can help avoid or delay future Phase I rate cases.

21. The Company states that for residential and small commercial customers it recovers part of its fixed costs through a monthly service and facilities (S&F) charge, but that it

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<sup>8</sup> *Id.* p. 23.

<sup>9</sup> *Id.* p. 31.

<sup>10</sup> This application is before the Commission in Proceeding No. 16A-0588E.

<sup>11</sup> The Commission approved the RE-TOU pilot in Decision No. C16-1075 issued on November 23, 2016 in Proceeding No. 16AL-0048E. In that Proceeding, Public Service also stated its view about longer term changes to residential and small commercial rate design.



primarily recovers its fixed costs through the variable kWh energy charge.<sup>12</sup> The Company calculates that 83 percent of the base rate costs allocated to residential and small commercial customers are fixed, but that only 6 percent of those costs for those two customer classes are recovered through fixed customer charges.<sup>13</sup>

22. Public Service argues that while average energy use per residential customer is declining because of customer investments in on-site solar,<sup>14</sup> the “major driver” is energy efficiency improvements resulting from government codes and standards, building and lighting standards of the Energy Independence and Security Act of 2007; energy incentives for individuals in the American Recovery and Reinvestment Act of 2009; and Company-sponsored demand-side management programs.<sup>15</sup> The Company shows that between 2009 and 2015, monthly residential customer use has declined 3.2 percent from 651 kWh a month to 630 kWh.<sup>16</sup> The Company projects that energy efficiency will continue to drive a decline in residential customer sales and that over the five-year period of the proposed revenue decoupling adjustment (RDA), the average monthly residential customer use will decline to just under 586 kWh in 2021.<sup>17</sup> The Company states that because of the reduction in use per customer, it is not recovering part of its fixed costs that it typically recovers through volumetric charges. The Company argues that the RDA mechanism is needed to reduce the “negative economic effects of

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<sup>12</sup> The Company defines fixed costs as costs that do not vary as a result of customer usage in the one to five-year timeframe including distribution costs, transmission costs, and production costs Hearing Exhibit 101, Jackson Direct, p. 20.

<sup>13</sup> Hearing Exhibit 101, Jackson Direct, p. 21.

<sup>14</sup> *Id.* p. 32.

<sup>15</sup> Hearing Exhibit 103, Marks Direct, p. 20.

<sup>16</sup> *Id.* pp. 20-21.

<sup>17</sup> Hearing Exhibit 101. Jackson Direct, p. 32.

specific programs and policies that would otherwise interfere with the Company's opportunity to recover" its approved fixed costs.<sup>18</sup>

23. Public Service proposes an RDA mechanism that applies to residential customers (Schedule R)<sup>19</sup> and a separate RDA mechanism that applies to small commercial customers (Schedule C) that would adjust base rate revenues per class for the period June 1, 2018 through May 31, 2023.<sup>20</sup> The Company states that it designed the two RDA mechanisms to recover lost fixed cost revenue resulting from a declining use per customer in each of those customer classes. The Company indicates that the proposed RDA mechanisms are symmetric in that the calculation method used in each could result in either a surcharge to customers if the Company has under-recovered on its fixed costs or a credit if the Company has over collected.

24. The Company recommends using weather-normalized use per customer (UPC) to calculate the RDA.<sup>21</sup> Public Service proposes to calculate the Baseline UPC using residential customer sales from 2013, which were used in the Company's most recent Phase I electric rate case to set the currently effective base rates.<sup>22</sup> The Company states that it will reset the Baseline UPC when the Commission approves new residential base rates in the next Phase I electric rate case.<sup>23</sup>

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<sup>18</sup> *Id.* p. 30.

<sup>19</sup> Public Service defined Schedule R to include standard residential customers and residential customers on the Company's proposed Residential Demand Time of Use Pilot (proposed in 16AL-0048E). As part of a settlement agreement in Proceeding No. 16AL-0048E, the Commission approved a Residential Demand Time Differentiated Rate Pilot (RD-TDR Pilot) and a Residential Energy Time of Use Trial (RE-TOU Trial). Decision No. C16-1075, issued on November 23, 2016. On rebuttal, Public Service included both the RD-TDR Pilot and the RE-TOU Trial in its definition of Schedule R. *See* Hearing Exhibit 104, Wishart Supplemental Direct, pp. 11-12.

<sup>20</sup> This Decision addresses the Small Commercial RDA in Section III.d.

<sup>21</sup> Decoupling mechanisms that use weather-normalized sales or revenue are referred to as partial decoupling mechanisms.

<sup>22</sup> Public Service proposes using the residential sales from Proceeding No. 14AL-0660E as the baseline UPC.

<sup>23</sup> Hearing Exhibit 102, Wishart Direct, p. 22.

25. Public Service bases the calculation of the annual RDA amount on a comparison of the weather-normalized use per customer in each year in which the RDA mechanism is in effect to the weather-normalized Baseline UPC. Starting in 2017, the Company proposes to calculate the weather-normalized UPC and to subtract that amount from the Baseline UPC to derive the change in sales between the baseline year and the current year. To calculate the total impact of the change in sales between those years, the Company proposes multiplying the change in the UPC by the average number of customers in each billing month of the current year. Then to determine the total dollar amount of the RDA, Public Service proposes multiplying the total change in sales in the current year by the residential fixed cost rate expressed in cents per kWh.<sup>24</sup> Finally, the Company proposes to subtract the Demand-Side Management Disincentive Offset (DSM Offset) from any RDA surcharge.<sup>25</sup> Company witness Mr. Wishart's example of the 2017 calculation shows that subtracting the \$2,096,155 residential portion of the DSM Offset results in a net RDA surcharge of roughly \$16.6 million.<sup>26</sup>

26. Public Service requests the Commission find that the proposed RDA mechanisms do not reduce the Company's risk and therefore do not impact the Commission's authorized Return on Equity (ROE). The Company suggests that if the Commission disagrees about the impact of decoupling on its overall risk profile, that the Commission should address the issue in the next Phase I rate case.<sup>27</sup>

27. Based on the method proposed by the Company in its Case in Chief, residential customers will see a surcharge each year that the RDA mechanism is in effect. In his

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<sup>24</sup> *Id.* pp. 15-16. The fixed costs rate is defined as the total retail rate minus the variable Operating and Maintenance costs in the retail rate.

<sup>25</sup> Hearing Exhibit 101, Jackson Direct, p. 32.

<sup>26</sup> Hearing Exhibit 102, Wishart Direct, Figure SWW-1, p. 16.

<sup>27</sup> Hearing Exhibit 101, Jackson Direct, 13.

Supplemental Direct Testimony, Company witness Mr. Wishart updated the forecast of the annual residential RDA amounts to reflect the inclusion of the RE-TOU Trial and the elimination of the Grid Use Charge that were part of the Settlement Agreement of the Company's Phase II Electric Rate Case.<sup>28</sup> The Company forecasts that these changes result in an increase in the proposed RDA surcharge over the five-year period. The new Residential RDA surcharge ranges from a high of \$35.4 million in 2021 to a low of \$7.2 million in 2018.<sup>29</sup> The Company agrees with Staff's analysis that at its highest, the RDA results in a customer bill impact of roughly 3.4 percent.<sup>30</sup>

**B. Position of OCC**

28. The OCC is the only party to this proceeding and to the Settlement Agreement resolving Public Service's most recent Phase II rate case,<sup>31</sup> that did not agree to "the principle that the Company should be permitted to have some form of a decoupling mechanism in place for its residential (Schedule R) and small commercial (Schedule C) customers for a period of time".<sup>32</sup>

29. The OCC opposes any form of decoupling due to its belief that Public Service failed to show that "a fixed cost recovery mechanism is necessary, that it is supported by the

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<sup>28</sup> See Decision No. C16-1075, Proceeding No. 16AL-0048E, issued on November 23, 2016. Hearing Exhibit 104, Wishart Supplemental Direct, p. 18.

<sup>29</sup> Hearing Exhibit 104, Wishart Supplemental Direct, p. 20.

<sup>30</sup> Transcript February 21, 2017, pp. 113-114.

<sup>31</sup> Proceeding No. 16AL-0048E.

<sup>32</sup> Non-Unanimous Comprehensive Settlement Agreement, Proceeding Nos. 16AL-0048E, 16A-0055E and 16A-0139E, p. 40.

evidence, or that it is in the public interest.”<sup>33</sup> All other intervenors support an RDA in principle.<sup>34</sup>

30. The OCC argues that Public Service’s ability to recover its fixed costs has not been shown to be impaired or detrimentally effected due to Public Service earning in excess of its ROE from 2012 through 2015.<sup>35</sup>

31. The OCC also believes that projected customer growth “should mitigate”<sup>36</sup> any under recovery of fixed costs and that revenue decoupling provides a means to subsidize rooftop solar.

32. The OCC does not address policy arguments made by Public Service and many of the intervenors. These policy arguments include eliminating the “throughput incentive”,<sup>37</sup> encouraging energy efficiency, maximizing distributed renewable generation, or the reduction in air pollution.

33. The evidence is unrefuted that the average use per residential customer has declined and there is little evidence to suggest that this trend will reverse itself. The OCC also steadfastly refused to consider public policy that could result in the encouragement of energy efficiency and a further decline in use per customer.<sup>38</sup>

34. While the OCC is correct that the ROE currently does not reflect an inability to meet fixed cost recovery, waiting until the average use per customer has dropped to a level that

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<sup>33</sup> OCC SOP, p. 1.

<sup>34</sup> Although Public Service believes that Staff’s proposal is not consistent with the spirit of the settlement, it is not a blanket rejection of revenue decoupling.

<sup>35</sup> Hearing Exhibit 300, Attachment RAF-2.

<sup>36</sup> OCC SOP, p. 10

<sup>37</sup> The incentive utilities have to sell more energy in order to increase profits.

<sup>38</sup> Hearing Transcript February 21, 2017, pp. 167-174.

maintenance or service is affected or that works against legislative mandates to encourage energy efficiency<sup>39</sup> is not the answer.

35. The approval of an RDA is a major step for Colorado, which many states have already taken to align the interests of utilities and public policy goals.<sup>40</sup>

36. The question is if an RDA will result in the furtherance of these public policy goals or is consistent with these goals. Other intervenors, with the exception of Staff,<sup>41</sup> are united in the belief that revenue decoupling works towards these public policy goals.

- a) Vote Solar - Decoupling is an important policy tool that removes an inherent disincentive for utilities to increase the amounts of rooftop solar, energy efficiency, and other new technologies that reduce electricity sales. Vote Solar Statement of Position p. 3.
- b) WRA - Decoupling frees the utility to think creatively about new business models and allows the Commission an opportunity to pursue new initiatives rewarding the utility for taking actions that align with state policy goals and customer expectations. WRA Statement of Position p. 8
- c) EOC- To the extent that the introduction of decoupling into Public Service's tariff leads to more investments in demand-side management, particularly DSM opportunities to assist low-income customers in managing their energy bills, EOC sees a potential benefit to a decoupling mechanism. EOC Statement of Position. P. 4.
- d) SWEEP - Without decoupling, Public Service's recovery of fixed costs is reduced as a result of both successful energy efficiency and conservation programs and increased customer adoption of distributed renewable energy systems such as rooftop solar systems. While energy efficiency and distributed renewable energy provide a number of benefits for customers and society, and are energy policy goals of the state of Colorado, Public Service's net revenues decline and potentially its profits are compromised from pursuit of these goals. Sweep Statement of Position, p. 5.

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<sup>39</sup> § 40-3.2-101, C.R.S., § 40-2-124, C.R.S., § 40-2-127(1), C.R.S., Amendment 37.

<sup>40</sup> 21 states have either adopted electric decoupling or had pending proposals as of September 2014, Exhibit 100, p. 24.

<sup>41</sup> Staff believes that the "company's incentives are not always "in sync" with certain public policy goals, but the evidence is not compelling that revenue decoupling actually improves energy efficiency. Although Staff does not provide any evidence that revenue does not improve energy efficiency. *Staff Statement of Position*, p.13.

- e) CEO - The CEO supports the Company's proposed decoupling mechanism, with modifications and believes the proposal will align the Company's interests with public policy goals.

37. There was ample evidence to show that an RDA not only aligns the interests of the utility with public policy, but that an RDA can help a utility meet the goals stated in those policies.

38. Finally, the OCC's argument that increased customer growth will result in over collection by the utility and therefore negates the need for an RDA is without merit. If the OCC is correct in its argument, then an RDA will have no effect on ratepayers' bills or could result in a refund that the ratepayer would otherwise not receive. If the additional customers caused the average use per customer to exceed the level of the fixed use per customer, a refund would be due to the ratepayers. This potential refund would not occur without the RDA.<sup>42</sup>

39. If the OCC is incorrect and the additional customers do not make up for the decrease in use per customer, an RDA would meet public policy goals and ensure the utility meets its fixed costs, or in other words, exactly what it is designed to do.

40. Energy efficiency and a viable electric utility are in the interest of the ratepayers. An RDA applied to residential customers will align public policy interests and with the Commission's interests in maintaining the financial viability of the utility. As approved in this Decision the RDA will align these interests without rate shock.<sup>43</sup>

41. Public Service has shown by a preponderance of the evidence that an RDA mechanism for residential customers is just and reasonable and in the public interest.

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<sup>42</sup> This concept is addressed in the cross-examination of Dr. Geller, Hearing Transcript February 22, 2017, p. 118-120.

<sup>43</sup> No party has argued that the addition of the RDA, with the safeguards discussed later in this Decision, will cause rate shock.

**C. Position of Staff**

42. The Staff supports an RDA limited to participants in the TOU rate trial.<sup>44</sup> Staff also recommends that the RDA be considered a pilot program with a sunset date of 2021.<sup>45</sup>

43. Staff's recommendation to limit the scope of an RDA mechanism to customers participating in the TOU rate trial is a compromise that does nothing to address the problems or the goals put forward by Public Service. For example, it does nothing to reduce the throughput incentive embedded in the Company's existing residential or small commercial rates.

44. The loss in use per customer, which Public Service states is reducing the Company's ability to recover its fixed costs, is not addressed in Staff's proposal. All customers, not just solar customers, are the target of many energy efficiency programs. As discussed above, Public Service argues that non-solar users cause a larger reduction in usage and are one of the main drivers in the anticipated failure of the Company to recover fixed costs.

45. Staff's proposal to limit an RDA to such a small group of customers makes the RDA likely ineffective.

46. There is significant merit in Staff's proposal to consider the RDA mechanism a pilot program with a sunset date of 2021. The approval of an RDA is a major change to fixed cost recovery. While the Company argues that the mechanism is limited and focused on very specific goals, decoupling also has the potential to be confusing or costly to ratepayers. Before taking the step of implementing a permanent RDA, it must be shown that the decline in fixed cost recovery is significant; that any such decline is addressed by the RDA; that the speculated positive benefits of removing throughput incentive (*i.e.*, large DSM savings or increased

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<sup>44</sup> These are solar customers in a trial program that was formed due to the Joint settlement in Proceeding No. 16AL-0048E, which included the last Phase II rate case.

<sup>45</sup> Hearing Exhibit 501, Peuquet Answer, p. 75.



investment in on-sight generation) materialize; and that customers are not adversely impacted. A pilot program is the best way to test these propositions while protecting both Public Service and ratepayers.<sup>46</sup>

47. Additional Staff proposals are discussed in this Decision.

## **D. Residential Decoupling**

### **1. Full Versus Partial Decoupling**

48. Public Service's proposed RDA uses partial decoupling. Partial decoupling (*i.e.*, with weather normalization) converts actual sales into a hypothetical sales figure that approximates what the sales would have been under "normal" historical weather conditions. Public Service defines historical weather conditions as a rolling 30-year average of historical values.<sup>47</sup> Weather response coefficients are then developed using regression modeling.<sup>48</sup>

49. The Company argues that under traditional rate regulation, utilities manage the weather impact on their sales and that its proposal neither seeks to change this fundamental ratemaking concept nor shift weather risk to its customers.<sup>49</sup>

50. Full decoupling uses actual sales information for calculating the RDA (*i.e.*, no weather normalization). Because it does not require the development of coefficients or of regression models, full decoupling is simpler than the partial decoupling favored by Public Service.

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<sup>46</sup> Required filings for this pilot program are listed starting at paragraph 137 of this Decision.

<sup>47</sup> Hearing Exhibit 103, Marks Direct, p. 12.

<sup>48</sup> *Id.* at p. 10.

<sup>49</sup> Public Service SOP p. 17

51. Every intervenor in this proceeding favors the use of full decoupling. Each intervenor argues that full decoupling is more transparent and that a partial decoupling RDA will favor Public Service.

- a) Vote Solar - Using actual sales, rather than weather-normalized sales, is also far simpler and more transparent.<sup>50</sup> Weather-normalization obfuscates how climate change impacts Public Service's sales. Because of climate change, what was "normal" weather in the past will likely no longer be "normal" weather in the future.<sup>51</sup>
- b) WRA - Second, full decoupling is simpler and easier to understand because it omits the complex weather normalization calculations.<sup>52</sup> Notably, if weather normalized decoupling had been in effect over the last few years, it would have favored the utility.<sup>53</sup>
- c) OCC - Therefore, if decoupling had been in effect during this period and weather-normalized data [had] been used to calculate the decoupling adjustment, it would have been to the favor of Public Service and this result "supports the notion that weather normalization tends to skew the adjustment to favor the utility."<sup>54</sup>
- d) EOC - [A] full decoupling mechanism [is] less complex, and therefore less controversial. ... Weather normalization increases risks to ratepayers with no corresponding benefit.<sup>55</sup>
- e) Staff - The Commission should require Public Service to use actual sales information in its calculations of UPC rather than the weather normalization process it proposed.<sup>56</sup>
- f) SWEEP - Weather normalization tends to skew the decoupling adjustment in a manner that favors PSCo.<sup>57</sup>
- g) CEO - A full decoupling mechanism is simple and transparent to customers and stakeholders. Adopting a full decoupling mechanism could remove the likelihood that the Company could benefit from underestimating its potential

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<sup>50</sup> Vote Solar SOP, p. 6.

<sup>51</sup> *Id.* at p. 8.

<sup>52</sup> WRA SOP, p. 11.

<sup>53</sup> *Id.* at p. 12.

<sup>54</sup> OCC SOP, p. 23.

<sup>55</sup> EOC SOP, p. 13.

<sup>56</sup> Staff SOP, p. 26.

<sup>57</sup> SWEEP SOP, p. 15.

sales, and may also increase customer refunds and decrease customer surcharges under the RDA.<sup>58</sup>

52. Public Service opposes full decoupling and argues that its proposed weather normalization method “is transparent and straightforward,”<sup>59</sup> and that “there is no indication of bias or trend of [weather normalization] sales being lower than actual sales.”<sup>60</sup> Further, the Company argues that the Commission already accepts the use of the same weather normalization method to calculate sales in electric rate cases.

53. The undersigned ALJ agrees with the intervenors that full decoupling is an easier to understand method for calculating the RDA and therefore is more transparent. Public Service is correct when it argues that weather normalization is not a new concept and has been a part of traditional rate making in the past. However, Public Service cannot assert revenue decoupling is a “fundamental change”<sup>61</sup> in its economic model and not expect other aspects of rate setting to be examined and subject to change. When a fundamental change is supported, it should be expected that aspects of the old model that appear to benefit the utility may no longer be just or reasonable.

54. The strong support of intervenors and especially the testimony of Dr. Geller were persuasive that partial decoupling potentially favors the utility.<sup>62</sup> Public Service does not argue that full decoupling is unfair to the company, that it would thwart the goals of implementing a RDA, or that full decoupling in any way results in an unreasonable result. Public Service

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<sup>58</sup> CEO SOP, pp. 9-10.

<sup>59</sup> Public Service SOP p. 21.

<sup>60</sup> *Id.* at p. 22.

<sup>61</sup> Hearing Exhibit 101, Jackson Direct, p.12, l. 118-19.

<sup>62</sup> See Hearing Transcript February 22, 2017, pp. 131-136.

contends that partial decoupling results in less volatility and that this stability is better for the ratepayers. Given that this stability results in a forecasted surcharge for residential customers in each of the five years that the RDA is in effect, this is not a persuasive reason to adopt partial decoupling.

55. Additionally, the “backcasting” of the RDA presented in Exhibits 4 and 19 supports the argument that partial decoupling favors the utility.

56. The argument of Public Service that the methodology for determining the weather normalization is straightforward and transparent is on its face without merit. While this argument may be true for economists or utility industry experts, it is not the case for the average ratepayer. Mr. Wishart testified that “significant benefits” must exist to justify adding complexity to a rate design.<sup>63</sup> Public Service has failed to demonstrate any significant benefit to residential or small customers to justify the added complexity of partial decoupling.

57. Finally, as noted by most intervenors, the vast majority of jurisdictions that have adopted revenue decoupling have done so with full decoupling. The most recent being the Minnesota PUC, which when rejecting partial decoupling stated:

Because full revenue decoupling is simpler, more transparent, and potentially more beneficial than partial decoupling, the Commission will authorize Xcel to implement a full revenue decoupling rate design for its residential and small business customers.<sup>64</sup>

58. The evidence is compelling that for the RDA to be just and reasonable it must be done with full decoupling.

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<sup>63</sup> Transcript, February 21, 2017, p. 141, l. 11-17.

<sup>64</sup> Hearing Exhibit 1000, Farnsworth Direct, Attachment GF-7, p. 83.

## 2. Cap on Earnings from the RDA Mechanism

59. In its Case in Chief, Public Service does not propose a cap on the amount it can recover annually through residential or small commercial RDA mechanisms, arguing that a cap is unnecessary because the Company's estimates show only a 2.2 percent impact on a typical residential customer's bill.<sup>65</sup>

60. As part of its contingent recommendations, Staff suggests the Commission implement a hard cap to protect residential and small commercial customers from potentially large swings in their electric bills resulting from year-to-year shifts in the RDA calculation. A hard cap acts as an upper limit on recovery of costs through the RDA mechanism; Public Service would not be allowed to recover any costs above the capped amount. Staff supports a symmetrical cap of 4 percent of residential class-level revenues.<sup>66</sup> Staff contends that its proposal provides opportunity for additional recovery for unforeseen volatility of customer usage on top of the Company's current projections. Staff rejects Public Service's concern that a hard cap could result in a further throughput incentive and maintains that the chief reason for a cap is to protect customers from rate impacts.<sup>67</sup>

61. WRA, SWEEP, EOC, and the CEO support implementing a soft cap on the dollar amount Public Service can recover each year through the decoupling adjustment. Each of the parties notes that the Minnesota PUC adopted a soft cap equal to 3 percent of customer group bases revenues (*i.e.*, not including riders or monthly service charges) when it approved the revenue decoupling adjustment mechanism for NSP. Under a soft cap proposed by the

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<sup>65</sup> *Id.*, Attachment GF-6.

<sup>66</sup> Staff also recommends implementing a cap 0.5 percent of small commercial class revenues.

<sup>67</sup> Staff SOP, p. 27.

intervenors, Public Service can petition for recovery of costs above the capped amount as part of the next year's adjustment.

62. The parties supporting the soft cap also recommended the Commission adopt language similar to that approved by the Minnesota PUC in placing conditions on the utility's petition to recover amounts above the cap. Pursuant to the Minnesota PUC's decision, NSP must show "that its demand-side management programs and other company initiatives were a substantial contributing factor to the declining energy sales triggering the rate adjustment, and that other non-conservation factors were not the primary factors for declining sales."<sup>68</sup>

63. In its SOP, the CEO clarifies that it supports a cap of 3 percent of base revenues. The CEO calculates that a 3 percent cap on a customer's total bill results in a maximum monthly increase of only \$1.17 and argues that a cap built on base revenues will result in a smaller bill impact.<sup>69</sup>

64. SWEEP supports implementing a cap on the annual RDA adjustment and argues that the rationale for including a cap is stronger if the Commission adopts full decoupling because the effects of weather variation potentially could increase the revenue adjustment amount in any given year. SWEEP proposes adopting either the Minnesota policy of a soft cap of 3 percent of base revenues or a soft cap of 2 percent of all revenues in a customer class. SWEEP suggests that these two approaches are likely to have similar impacts on customers' bills given that base revenues are about 60 percent of total revenues for the residential customer class.

65. WRA argues that using a hard cap could increase the risk to the utility of under-recovery of allowed revenues and thus thwart the intent of implementing a decoupling

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<sup>68</sup> Hearing Exhibit 1000, Farnsworth Direct, Attachment GF-7, p. 71.

<sup>69</sup> CEO SOP, p 17.

mechanism. WRA recommends implanting a soft cap of 3 percent of current year base revenue. To minimize the potential accrual of deferred recovery, and thus potential rate shock to customers, WRA suggests that any revenue above the cap must be collected within two years or be deemed recovered.

66. EOC supports the implementation of soft cap on the RDA surcharge of not more than 3 percent of annual customer class base revenues and cites the Minnesota PUC's conclusion that "setting the cap above 3 % would virtually eliminate the cap for the standard residential customer because [decoupling] rate increases would rarely exceed that level" in support of this position.<sup>70</sup>

67. In Rebuttal, the Company states that it opposes a hard cap. Public Service recommends using a symmetric soft cap of 4 percent for both the residential and small commercial RDA mechanisms if the mechanisms are based on weather-normalized sales. The Company argues that if the Commission adopts the use of non weather-normalized sales data as the basis for the RDA, then the soft cap should be increased to 6 percent of base rate revenues, which it argues corresponds to a roughly 2.4 percent overall bill impact.<sup>7172</sup> Finally, the Company takes the position that although the forecast of RDA surcharge is lower for the small commercial class, it supports implementing the same cap to the two rate classes.

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<sup>70</sup> EOC SOP, p. 9 citing Hearing Exhibit 1000, Attachment GF-4, p. 86.

<sup>71</sup> Hearing Exhibit 106, Wishart Rebuttal, p. 25.

<sup>72</sup> Transcript, February 21, 2017, p. 135.

68. Public Service states that it is “trying to develop a decoupling mechanism that is limited, circumspect and only addresses the disconnect between the utility's financial incentives and public policy objectives to the extent possible.”<sup>73</sup> Such a mechanism is untested. The Regulatory Assistance Project (RAP) report, *Decoupling Design* states that a cap on the size of decoupling adjustments can help manage potential rate shock and make it easier for customers to transition to new pricing structures.<sup>74</sup>

69. Either a hard or a soft cap would limit rate increases from an RDA and therefore protect customers. However, a hard cap as proposed by Staff would limit Public Service’s ability to recover the Commission approved amount for fixed costs and therefore may impose the same kinds of limits on cost recovery that the Company seeks to address in proposing the decoupling mechanism. A hard cap may not remove the throughput incentive and therefore may continue to put the Company’s financial interests in conflict with state policy goals. Therefore, a soft cap will be adopted.

70. The record shows that the majority of electric utilities that have a decoupling mechanism see changes in rates of less than 3 percent. Consistent with the recommendation of the majority of intervenors, the undersigned finds that a 3 percent soft percent of base revenues is reasonable and in the public interest. Further, the undersigned agrees with SWEEP and others that it is reasonable to permit Public Service to seek recovery for revenue above the cap on the condition that the Company can demonstrate that the foregone revenue is a result of its DSM programs or of customer adoption of on-site generation. Because Company action is not responsible for natural DSM, Public Service cannot seek recovery for lost revenue above the cap

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<sup>73</sup> *Id.*, p. 34.

<sup>74</sup> Hearing Exhibit 400, Worley Answer, Attachment CW-4, page 10.



that results from it. Finally, the undersigned finds WRA's proposal to limit any additional recovery to two years to be reasonable and in the public interest. Therefore, it will be adopted.

### **3. Use per Customer verses Revenue per Customer**

71. Public Service proposes basing the RDA mechanism on UPC. As discussed above, this method calculates the annual RDA adjustment by subtracting the current year use per customer from the use per customer approved in the Company's last Phase I electric rate.

72. WRA recommends changing the basis for the RDA calculation from use per customer to revenue per customer. WRA suggests that this approach is simpler than the use per customer approach proposed by the Company and that it better aligns the solution with the Company's stated concern about revenue erosion per customer.<sup>75</sup> WRA notes that the Minnesota PUC approved a revenue-per-customer adjustment for Northern States Power.<sup>76</sup>

73. SWEEP states that it supports adoption of revenue per customer decoupling for the residential and commercial customer classes.<sup>77</sup>

74. Public Service does not oppose using a revenue per customer method to calculate the RDA stating that a revenue per customer method and a use per customer calculation yield similar results.<sup>78</sup>

75. Public Service has stated that declining revenue per customer is the primary reason it is seeking to implement a decoupling mechanism.

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<sup>75</sup> Hearing Exhibit 1000, Farnsworth Answer, pp. 18-19.

<sup>76</sup> Hearing Exhibit 1000, Attachment GF-5.

<sup>77</sup> Hearing Exhibit 201, Geller Cross-Answer, p. 26.

<sup>78</sup> Public Service SOP, p. 31.

76. Because the Company indicates that a revenue per customer approach and a use (or sales) per customer approach are likely to yield similar results and therefore address the Company's concerns about lost revenue, WRA's revenue per customer approach will be adopted.

#### **4. Tucson Model**

77. In SWEEP's Answer Testimony, Dr. Gellar proposes a modification to the RDA by adjusting the mechanism in the summer months (June through September) so that any refund is applied to electricity consumption in Tier 1 (usage between 0-500 kWh) and that any surcharge be applied to electricity consumption in the Tier 2 only (usage over 500 kWh).<sup>79</sup>

78. SWEEP argues that this approach benefits lower consumption households that tend to be lower income households with smaller homes, fewer appliances, and less use of central air conditioning. These lower consumption households, on average, have relatively little or no consumption in Tier 2 in the summer and would see little or no impact from an RDA mechanism that included such an adjustment. The method described by SWEEP and other parties is based on an approach proposed by Tucson Electric Power (TEP) and is known as the Tucson Model.<sup>80</sup>

79. Vote Solar also argues in favor of the Tucson Model, explaining that the approach aligns with the goal of the current Residential Customer Class's inverted block rate structure, which is to reflect the increased costs associated with higher summer use in the second tier (or tail block). This structure provides lower-use customers with a more affordable rate in the first

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<sup>79</sup> Hearing Exhibit 200, Geller Answer p.19.

<sup>80</sup> The mechanism is described in detail in J. Migden-Ostrander and R. Sedano. "Decoupling Design: Customizing Revenue Regulation to Your State's Priorities." Regulatory Assistance Project. Nov. 2016. <http://www.raponline.org/wp-content/uploads/2016/11/rap-sedano-migdenostrander-decoupling-design-customizing-revenue-regulation-state-priorities-2016-november.pdf>

tier or block.<sup>81</sup> Vote Solar states the Tucson model can magnify benefits for lower-use customers and protect those same customers from penalties (*i.e.*, rate increases), thus providing some protection for low-income customers from potential harms of an RDA mechanism.

80. Vote Solar opines that the Tucson Model is also designed to keep high-users from being advantaged by increased usage of electricity. Vote Solar states that because most of the consumption of lower use customers will fall in the first tier, with very little consumption in the second tier, the decoupling mechanism should apply any decrease in rates (*i.e.*, RDA credits) to the first tier and any increase in rates (*i.e.*, RDA charges) to the second tier. Vote Solar recommends moderating the potential impacts of the decoupling mechanism in the period of 2017 through 2021 by applying the calculated decoupling adjustment to the sales in the non-summer months plus the appropriate summer tier—tier 1 for RDA credits and tier 2 (the tail block) for RDA charges.

81. WRA also advocates for adjusting the RDA in order to magnify rather than dilute the intended energy conservation price signal currently present in the residential tiered rate structure. WRA states a surcharge should be applied to Tier 2 of Schedule R and that any credits, should be applied to the lower price tiers, such as Tier 1 of Schedule R.<sup>82</sup>

82. In response, Public Service through Mr. Wishart's Rebuttal Testimony, argues that based on calculations of the impacts of the proposed Tucson Model, the results are small enough that it does not justify the added complexity. He calculates that the difference between the Company's proposal and the Tucson Model amounts to a 0.3 percent to a 0.5 percent change in overall residential rates with an RDA adjustment of \$20 million, which Public Service notes is in

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<sup>81</sup> Hearing Exhibit 800, Gilliam Answer p. 14.

<sup>82</sup> Hearing Exhibit 1000, Farnsworth Answer p. 21.

the upper range of forecasted adjustments. According to the Company's analysis, the Tucson Model would increase the decoupling charge for high-usage customers from 0.217¢/kWh to 0.274¢/kWh, while increasing the credit for low-usage customers from 0.217¢/kWh to 0.256¢/kWh.<sup>83</sup>

83. The undersigned is persuaded by the arguments set forth by SWEEP, WRA, and Vote Solar concerning the implementation of the Tucson Model for the RDA. As SWEEP points out in its SOP, the Tucson Model would benefit lower consumption households. Since the Commission has approved tiered rates with two blocks in the summer months, the Commission already supports the concept of charging different amounts for a unit of electricity use depending on factors such as time of consumption and total amount of consumption in order to change behavior. The ALJ agrees that applying decoupling adjustments in this manner would slightly increase the price differential between the two blocks and thereby further a policy goal the Commission has already endorsed.

84. Further, the undersigned agrees with the parties that support these adjustments, which will alleviate some of the concerns expressed by OCC that a decoupling mechanism will negatively impact low-income customers. The ALJ is not persuaded by Public Service's analysis, which finds that the impact of the Tucson Model would be approximately \$0.00057 per kWh on the surcharge and \$0.00039 per kWh on the credit, assuming a \$20 million surcharge or credit.

85. Vote Solar points out in its SOP that Public Service's analysis shows that the Tucson Model could increase the decoupling credit for low-usage customers by 18 percent, while

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<sup>83</sup> Hearing Exhibit 106, Wishart Rebuttal, pp. 12-13.

increasing the decoupling charge for high-usage customers by 26 percent.<sup>84</sup> The ALJ agrees with Vote Solar that modifying the magnitude of the decoupling adjustments by 18 to 26 percent is significant, and the fact that the Tucson Model would increase the decoupling credit by 18 percent illustrates the real benefit the approach would provide to low-usage and low-income customers. The ALJ further agrees that regardless of the magnitude of the impacts, the approach would transform the decoupling mechanism from a potentially harmful new rate component for low-usage and low-income customers into a potentially beneficial new rate component.

86. The ALJ agrees with the parties, including EOC, who in its SOP argues that any customer rate impacts to a low-income user are significant, despite Public Service's argument and any decoupling mechanism should be designed to be protective of ratepayers, in particular low-income ratepayers.

87. Finally, the undersigned finds the Company's argument that the Tucson model results in unnecessary complexity without merit. The weather-normalization process proposed in this proceeding by Public Service is far more complicated than the adjustments found in the Tucson Model, showing that Public Service has no issue with adding complexity when it appears to benefit the Company. The undersigned finds that the added complexity, which Public Service did not argue was either expensive or burdensome, is minor and comes with potential benefits to customers.

88. The undersigned agrees with the proposed adjustment described by the parties in favor of the Tucson Model. For the residential class where rates include two tiers based on monthly electricity consumption in the summer (June through September), any refund in summer months should be applied to electricity consumption in the first tier only (for consumption

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<sup>84</sup> Vote Solar SOP p. 12.

between 0 and 500 kWh per month). Any surcharge will be applied to electricity consumption in the second tier only (for consumption greater than 500 kWh per month). There will be no adjustment in the eight non-summer months.

## **5. Tucson Model for RE-TOU customers**

89. SWEEP, WRA, and Vote Solar recommend the decoupling adjustments for the two summer tiers also be applied in a similar manner to residential customers served under the new RE-TOU tariff. They argue the Commission should apply decoupling bill credits to the rate for off-peak electricity consumption while applying any surcharge to the rate for on-peak consumption. They contend that if the mechanism is applied in this manner, that decoupling could help discourage on-peak consumption and encourage a greater fraction of total consumption during off-peak hours. This adjustment would slightly increase the price differential between the on-peak and off-peak rates and thereby further a rate design that the Commission has already approved on a pilot basis.

90. The undersigned agrees in part with the positions of SWEEP and Vote Solar. Further study is necessary to determine the extent to which differentiating decoupling adjustments based on the TOU time period would help maximize decoupling's benefits for low-usage and low-income customers. This further study should occur in the trial phases of the RE-TOU tariff. For a subset of the RE-TOU trial program, Public Service will apply decoupling charges for TOU rates to the On-Peak price period, while decoupling credits apply to the Off-Peak price period. Twenty percent of Trial participants should be included in this subset so the Commission can evaluate both the impacts of the RE-TOU and the decoupling mechanism on customer behavior.

## 6. True-up Mechanism

91. Public Service does not propose to true-up the fixed costs recovered through the RDA. Although the Company states that revenues collected through the decoupling adjustments will not exactly match the target recovery amounts, they feel that the potential deviations will be so small as not to warrant a true-up mechanism. Public Service states that this revenue recovery process will be similar to the Company's approved Earnings Sharing Adjustment tariff, which also does not include a true-up mechanism.

92. Staff states that the Company acknowledged that revenues collected or refunded through the annual decoupling adjustments would not exactly match the foregone recovery amounts. Staff takes the position that the lack of a true-up mechanism applied after annual RDA adjustment potentially could result in the Company gaining additional revenue from under-forecasting sales in order to lead to larger collections under its proposed decoupling rider.<sup>85</sup>

93. Staff argues that the lack of a true-up mechanism provides no avenue to correct for any under- or over-recoveries of approved fixed costs. Staff further argues that making sure there are no under- or over-recoveries of fixed costs is the key reason for the decoupling proposal in the first place and that a true-up mechanism better aligns the RDA with the Company's stated rationale for the mechanism. Staff therefore recommends the Commission add an annual true-up mechanism.

94. The Company reiterates its position that a true-up mechanism is unnecessary, as it would only be needed if sales volumes over the recovery period deviated from the forecast. As an example, the Company states that if actual sales deviated from forecasted volumes by negative 3 percent, the amount of under-recovery would be \$600,000. Public Service further

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<sup>85</sup> Hearing Exhibit 501, Peuquet Answer, p. 80.

argues that this is about as large as any over-recovery or under-recovery could be in the RDA mechanism and that the relatively small amount is proof that a true-up mechanism is unnecessary.<sup>86</sup>

95. In Cross-Answer Testimony, Mr. Gellar for SWEEP agrees with Staff's recommendation of including a true-up mechanism.<sup>87</sup>

96. In its SOP, Staff notes that Public Service argues that a true-up is not necessary because "the only uncertainty is associated with the volume of sales expected in the next period."<sup>88</sup> Staff argues that it is exactly that type of uncertainty that will be covered by the true-up, and that without a true-up mechanism ratepayers will be at the mercy of the accuracy of Public Service's forecasts. Therefore, Staff makes the case that there would be "no avenue to correct for any under or over-recoveries of approved fixed costs."<sup>89</sup>

97. The Company has admitted that doing a true-up for the RDA in this manner would be a simple spreadsheet calculation that would neither be a complicated task nor impose an administrative burden.<sup>90</sup>

98. The ALJ agrees with Staff and SWEEP that a true-up mechanism is likely to improve the accuracy of any RDA collection and therefore is reasonable and in the public interest. The Company is instructed to adopt a true up mechanism for any over- or under-recoveries in the RDA for the prior year, to be calculated annually.

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<sup>86</sup> Hearing Exhibit 106, Wishart Rebuttal, pp. 14-15.

<sup>87</sup> Hearing Exhibit 201, Geller Cross Answer Testimony, p. 25.

<sup>88</sup> Staff SOP at p. 28.

<sup>89</sup> *Id.* at pp. 28-29.

<sup>90</sup> Hearing Exhibit 005.



## 7. Adjustment for Customer Growth

99. Staff raises concern that the Company's proposed approach to calculating the RDA adjustment overstates the amount of kWh sales lost during the proposed five-year collection period. Staff argues that the Company's approach does not account for new or additional customers. Staff contends that customer growth results in added kWh sales and argues that these new sales should be included in any calculation of potential lost revenue.

100. Public Service opposes Staff's customer growth proposal arguing that it encroaches on traditional regulation without addressing the risks resulting from public policy initiatives. The Company argues that its decoupling proposal eliminates revenue growth or losses between rate cases attributable to weather normalized UPC of residential and small commercial customers. Public Service argues that any recovery of revenue associated with customer growth is appropriate because that revenue offsets costs for interconnecting and serving new customers and partially offsets other cost increases.

101. Public Service also argues that Staff, like OCC, is focused on total class revenue rather than on revenue per customer. Public Service suggests that additional customers add not only new sales but also bring new costs and that therefore the right metric is revenue recovery on a per customer basis.

102. Public Service projects an additional 10,000 to 18,000 per year during the period 2017 through 2021.<sup>91</sup>

103. The undersigned disagrees with Public Service's characterization of Staff's concern and argument. Staff's concern is narrower than the OCC's, arguing that new customers

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<sup>91</sup> Hearing Exhibit 300, Fernandez Answer, Attachment RAF-8.

bring new consumption and that the additional kWh sales should therefore mitigate or at least influence the amount of revenue that Public Service may under-recover in any given year in which the RDA is in effect. Further, the undersigned is convinced by Staff's demonstration that the Company's proposed approach to calculating the RDA adjustment could result in recovery for the residential class above fixed costs. This results because the Company's mechanism multiplies any change in use per customer by the increased number of customers in the current year, which Public Service forecasts will increase in each year that the RDA mechanism is proposed to be in effect.

104. Public Service admits in its response to Staff that it benefits from customer growth because that growth results in additional revenue. Public Service then goes further to suggest that using the UPC approach favored by the Company (*i.e.*, one that does not account for customer growth) could result in even greater revenue. "It is true that the Company could still benefit from net revenue gains from customer growth, but growth in UPC provides greater net revenue" and that "allowing the Company to retain the incremental net revenue attributable to customer growth is very reasonable."<sup>92</sup>

105. Public Service also argues that this increase in revenue is necessary to "defray the costs of interconnecting and serving new customers and partially offset other cost increases."<sup>93</sup> Yet at no time did Public Service present any evidence as to what the actual costs are for interconnecting and serving new customers. Nor did Public Service show that the increased revenues, based upon these added costs, would not be a windfall for the Company.

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<sup>92</sup> Hearing Exhibit 105, Brockett Rebuttal, p. 37.

<sup>93</sup> Public Service SOP, p. 27.

106. Public Service argues that the RDA mechanism is necessary because the Company is not recovering its approved fixed costs. The focus of any RDA mechanism should be on providing the Company an improved opportunity to recover its fixed costs. Allowing the Company to retain any net revenue above what is necessary for fixed cost recovery is beyond the intent of the proposed RDA and unreasonable. Therefore, Public Service will use the customer growth approach put forward by Staff in calculating the annual RDA amount.

## **8. Additional Issues**

107. Public Service and Intervenors also raise issues on the implementation and operation of an RDA. Some of these issues are addressed here.

### **a. Implementation Date**

108. Public Service seeks approval to implement the RDA starting in 2017. The Company takes the position that it can use the residential and small commercial use per customer figures approved in its 2013 Phase I rate case. Public Service argues that the RDA was originally proposed in the 2013 Phase I rate case and waiting until the proposed 2017 Phase I rate case could cause significant decline in use per customer making the need for the RDA greater.

109. The Company also agrees with intervenors that the 2013 customer data on which it proposes to base the RDA calculation is “stale”.<sup>94</sup> In its rebuttal case, the Company states that it is “certainly not a proponent of using stale historic test year (“HTY”) data to develop base rates in Phase I rate proceedings” and that in an ideal world it would not be using stale 2013 HTY data to assess rates in 2017.<sup>95</sup>

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<sup>94</sup> Hearing Transcript February 21, 2017, pp. 96-97.

<sup>95</sup> Hearing Exhibit 105, Brockett Rebuttal, p. 44.

110. The following Intervenors do not specifically address this issue, Vote Solar, WRA, EOC, SWEEP, and CEO.

111. The OCC recommends that any RDA mechanism not be put in place before the conclusion of the anticipated 2017 Phase I rate case. The OCC argues that the data from the 2013 Phase I rate case is dated.<sup>96</sup>

112. Staff also recommends that the implementation of any RDA mechanism be delayed until the completion of the 2017 Phase I rate case. Staff argues that Public Service has described the data from the 2013 Phase I rate case as “stale.”<sup>97</sup>

113. The arguments of the OCC and Staff are persuasive that implementation of the RDA should start after the anticipated 2017 Phase I rate case. It makes logical sense to begin this new program which Public Service describes as a “fundamental change”<sup>98</sup> with the most up to date and accurate data. To take this step without updated information, especially when there is an anticipated Phase I rate case on the horizon would not be just or reasonable.

**b. ROE**

114. Many parties have raised the issue of whether and to what extent the adoption of an RDA impacts the Company’s risk of recovering its authorized costs and therefore should influence Public Service’s authorized ROE. No party recommends that the ROE be adjusted in this proceeding but some do recommend various actions to be taken concerning the ROE.

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<sup>96</sup> Hearing Exhibit 300, Fernandez Answer Testimony p. 41.

<sup>97</sup> Staff SOP, pp. 24-25.

<sup>98</sup> Hearing Exhibit 101, Jackson Direct, p.12, l. 118-19.

115. Public Service argues that the above captioned proceeding “is not the appropriate proceeding to determine: whether decoupling reduces risk; whether an ROE or equity ratio adjustment is appropriate; or the amount of such adjustment.”<sup>99</sup> In addition, Public Service argues that there was no evidence presented in this proceeding to support a reduction in their ROE.<sup>100</sup>

116. The EOC recommends that this Decision state that the adoption of the RDA is expected to lead to “a reduction of ROE to be approved in the next rate case, and leave the specific reduction amount to the Company and parties in the forthcoming rate case.”<sup>101</sup>

117. The OCC recommends that this Decision state that the adoption of an RDA will reduce the risk to Public Service but not adjust the ROE in this rate case. The OCC argued in testimony that the implementation of an RDA could lead to the reduction of the ROE by 25 to 50 basis points.<sup>102</sup>

118. Staff recommends that this Decision state that any RDA shifts recovery risk from Public Service to ratepayers and order Public Service to account for this in the upcoming Phase I rate case.<sup>103</sup>

119. Sweep does not recommend a modification of the ROE based on the adoption of an RDA. In addition, Sweep does not believe that this Decision should call for a reduction in the ROE based only on the adoption of an RDA.<sup>104</sup>

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<sup>99</sup> Public Service SOP, p. 35.

<sup>100</sup> *Id* at p. 36.

<sup>101</sup> EOC SOP, p. 12.

<sup>102</sup> Hearing Exhibit 300, Fernandez Answer Testimony p. 34.

<sup>103</sup> Staff SOP, p. 25.

<sup>104</sup> Sweep SOP, p. 13.

120. An assessment of the effect of the adoption of an RDA on Public Service's ROE was not at issue in this proceeding and the undersigned ALJ believes that any statement concerning the ROE is beyond the scope of this proceeding. Any discussion of the effect or lack of effect of an RDA on the ROE is an issue for the anticipated upcoming Phase I rate case.<sup>105</sup>

**c. DSM Disincentive Offset**

121. Staff argues that under the approach recommended by Public Service, the Company could fall short of its DSM goals but then collect a higher decoupling amount compared to if it had achieved 100 percent of its goal.<sup>106</sup> To reduce the potential for the Company to make up the difference through a higher RDA collection, Staff proposes subtracting the DSM offset from the annual RDA amount using a prorated method.

122. Public Service agrees to Staff's proposal in its Rebuttal Testimony.<sup>107</sup>

123. The proposal of Staff to subtract a prorated portion of the DSM disincentive offset from the annual decoupling adjustment shall be adopted.

**d. Customer Education**

124. In rebuttal testimony, Public Service<sup>108</sup> agrees to implement a customer education plan as the OCC and CEO suggested.<sup>109</sup>

125. The issues in this case were complex and the adoption of an RDA will change ratepayers' bills. Public Service shall work with SWEEP, OCC, EOC, and other interested

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<sup>105</sup> Although not crucial in the determination of delaying the implementation of the RDA, the potential of an adjustment of the ROE is yet another reason to wait to implement the RDA until after the upcoming Phase I rate case.

<sup>106</sup> Staff SOP, p. 30.

<sup>107</sup> Hearing Exhibit 105, Brockett Rebuttal Testimony p.71, l. 10-13.

<sup>108</sup> *Id* p.71, l. 17-19.

<sup>109</sup> The EOC also stated support of education outreach in its SOP.

persons to create a customer outreach program that explains what decoupling is and how it will affect ratepayers.

**e. Frequency of Rate Cases**

126. Staff<sup>110</sup> recommends that Public Service be ordered to file a new rate case “at least every three years.”<sup>111</sup>

127. Public Service countered this proposal in its Rebuttal testimony agreeing to file a new rate case every four years.<sup>112</sup>

128. With the adjustments made to the proposed RDA, the undersigned ALJ does not see the need to require predetermined rate case filings. Rate cases are expensive and their costs are borne by the ratepayers. It is in the ratepayers’ interest that they are filed only when necessary and not based upon a perceived need years earlier.

**f. WRA’s Recommendations**

129. WRA recommends the Commission, as part of this proceeding, require Public Service to open a competitive solicitation for non-wire alternatives to utility distribution grid investments; explore new Performance-Based Incentives (PBI); and requests the Commission open a new investigatory proceeding to evaluate whether and how new PBI mechanisms could be used to better align the Company’s financial incentives with the public interest.<sup>113</sup>

130. These requests are beyond the scope of the issues in this proceeding and therefore shall not be adopted.

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<sup>110</sup> The EOC also supports a requirement of a rate case filing every three years, SOP, p. 15.

<sup>111</sup> Hearing Exhibit 501, Peuquet Answer Testimony p. 10, l. 14-15.

<sup>112</sup> Hearing Exhibit 105, Brockett Rebuttal Testimony p.71, l. 14-16.

<sup>113</sup> WRA SOP, pp. 20-22.

**g. Monthly Revenue Adjustment**

131. Public Service proposes an annual revenue adjustment.

132. WRA recommends the Commission adopt a monthly calculation and implementation of any RDA mechanism. WRA suggest that full decoupling based on a monthly adjustment will be more beneficial to customers than an annual mechanism because in warm periods high use will reduce rates.<sup>114</sup>

133. Public Service argues it cannot implement the monthly RDA proposed by WRA due to limitations of the Company's monthly billing cycle. Public Service also contends that a monthly RDA calculation could results in "unnecessary swings up and down with monthly changes in average use per customer" that would be "moderated" by adopting the Company's proposed annual calculation method.<sup>115</sup>

134. SWEEP recommends the Commission adopt an annual adjustment stating that they are more common and "tend to smooth out variation that can occur from month-to-month."<sup>116</sup>

135. The undersigned agrees with SWEEP and Public Service that the approach of an annual RDA calculation may lead to less volatility, therefore that approach will be adopted.

**h. Required Reports**

136. Staff recommends that Public Service be required to provide empirical evidence that shows that any implemented RDA is fulfilling the public policies that were the rationale for its implementation.<sup>117</sup> The EOC also supports annual reporting by Public Service.<sup>118</sup>

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<sup>114</sup> Hearing Exhibit 1000, Farnsworth Answer, p. 11.

<sup>115</sup> Hearing Exhibit 106, Wishart Rebuttal, p. 4.

<sup>116</sup> SWEEP SOP, p. 11.

<sup>117</sup> Staff Statement of Position , p. 29.

<sup>118</sup> EOC Statement of Position, p. 16-17.



137. The Minnesota PUC in adopting an RDA ordered a series of reports to be produced annually. These reports were as follows:

1. Total over- or under-collection of allowed revenues by customer class or group.
2. Total collection of prior deferred revenue.
3. Calculations of the RDM<sup>119</sup> deferral amounts.
4. The number of customer complaints.
5. The amount of revenues stabilized and how the stabilization impacted Xcel's overall risk profile.
6. A comparison of how revenues under traditional regulation would have differed from those collected under partial and full decoupling.<sup>120</sup>

Public Service shall be required to provide the reports listed above to the Commission each year of the pilot program. In addition, the Company should file a final report within six months of all RDA Riders and associated true-ups during this RDA Pilot, as recommended by Staff. This report should analyze and provide conclusions concerning any and all the impacts the authorized RDA had on:

1. residential;
2. the Company's fixed cost recovery;
3. the Company's administrative costs to oversee it;
4. the impacts on Colorado public policy goals regarding energy efficiency, conservation, and distributed generation.

**E. Small Commercial Decoupling**

**1. Objections and Recommendations**

138. Public Service proposes to implement an RDA mechanism for small commercial customers that take service on the Schedule C tariff to recover fixed costs for those customers.

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<sup>119</sup> RDA for the purposes of this Decision.

<sup>120</sup> Hearing Exhibit 400, Attachment CW-6, p. 80.

Public Service states that the small commercial RDA is “very similar” to the Residential RDA. The Company proposes to have the small commercial RDA in effect from 2017 through 2021.

139. Similar to the residential RDA, Public Service proposes to calculate an actual use per small commercial customer for the current year and to subtract that from the UPC for the baseline year. The Company would then multiply the change in UPC by the number of small commercial customers in the actual year to derive a total change in sales. Finally, the Company multiplies the total change in sales by the fixed cost rate in the Company’s last Phase I electric rate case. The proposed mechanism is based on weather-normalized use per small commercial customer and subtracts the small commercial class’s share of the DSM offset from the revenue adjustment for any given year in which there is a surcharge.<sup>121</sup>

140. The Company forecasts an RDA credit for small commercial customers in 2017, 2018, and 2019. Starting in 2020, the Company projects that small commercial customers will be assessed an RDA surcharge of \$130,584 that grows to \$575,162 in 2021.<sup>122</sup>

141. Public Service’s forecasts show that the average monthly use per small commercial customers is essentially flat from 2016 through 2021. The Company shows an average annual change of 0.1 percent between 2015 and 2021, with an expected average monthly use per customer of 994 kWh in 2021, compared to the 2016 weather-normalized average monthly use per customer of 994 kWh.<sup>123</sup>

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<sup>121</sup> Hearing Exhibit 101, Jackson Direct, p. 28.

<sup>122</sup> Hearing Exhibit 104, Wishart Supplemental Direct, p. 24.

<sup>123</sup> Hearing Exhibit 103, Marks Direct, p. 21.

## 2. Positions of the Parties

142. SWEEP supports the proposed small commercial RDA, arguing it removes financial disincentives for Public Service to promote greater energy efficiency and distributed renewable energy by customers in these classes.<sup>124</sup> SWEEP also suggests that the small commercial RDA will reduce the lost fixed cost recovery from reduced sales for customers on Schedule C.<sup>125</sup> Further, SWEEP recommends adopting the small commercial RDA and opines that revenue decoupling can result in higher levels of energy efficiency savings and increased investment in on-site generation.

143. CEO asserts that the small commercial RDA can be an effective tool to eliminate the throughput incentive with benefits for Public Service and its customers.

144. EOC does not oppose the implementation of an RDA mechanism for small commercial customers. EOC suggests that there is no clear need for a decoupling mechanism and argues that absent such a clear need, the Commission should adopt a range of ratepayer protections. EOC also recommends directing the Company to propose higher DSM energy savings goals, as well as increase participation in DSM programs for low-income customers in the Company's next Strategic Issues proceeding.<sup>126</sup>

145. Staff and OCC oppose implementing an RDA mechanism for small commercial customers.

146. OCC argues that evidence of changes in customer energy use presented by Public Service does not support the Company's claim that declining average UPC is a rationale that

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<sup>124</sup> Hearing Exhibit 200, Geller Direct, p. 22.

<sup>125</sup> Hearing Exhibit 200, Geller Direct, p. 4.

<sup>126</sup> EOC SOP, p.4.

supports implementing an RDA mechanism for small commercial customers. OCC argues that the Company's forecast shows that it will collect fully its fixed costs from small commercial customers in 2017, 2018, and 2019—the first three years of the proposed five-year term of the revenue decoupling mechanism. OCC continues arguing that based on the Company's own projection, it will only under earn for two of the five years for the proposed tenure of the RDA and, thus, it is just as likely that over earnings will result from this rate class over the proposed five-year term of the RDA mechanism. Finally, OCC projects that small commercial rate class annual fixed cost revenues are actually anticipated to increase in each of the five years of the proposed RDA mechanism.<sup>127</sup>

147. Public Service argues that decoupling is necessary to reduce impacts from energy efficiency and customer adoption of on-site solar and to ensure that the Company has an opportunity to recover its Commission approved fixed costs.

148. Public Service claims that its IVVO investments, which are not yet approved by the Commission, will reduce electricity consumption for residential and small commercial customers by 1.4 percent per year.<sup>128</sup> Despite that projection, Public Service fails to demonstrate an actual decline in use per small commercial customer during the period it proposes to have the small commercial RDA in effect. To the contrary, the Company states that, "Average monthly use per customer for the C rate class is projected to be relatively flat from 2015 to 2021." The Company's testimony forecasts average small commercial customer use of 994 kWh per month in 2016 and the identical use in 2021 with average an annual growth rate of 0.1 percent during that period.<sup>129</sup>

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<sup>127</sup> Hearing Exhibit 301, England Direct, p. 28.

<sup>128</sup> Hearing Exhibit 101, Jackson Direct, p. 34.

<sup>129</sup> Hearing Exhibit 103, Marks Direct, pp. 21-22.

149. Several parties including SWEEP and CEO support the implementation of a small commercial RDA mechanism on the presumption that removing the throughput incentive for those customers will result in higher levels of energy savings from the DSM program or increased adoption of on-site generation.

150. The undersigned agrees with the OCC that Public Service has failed to show that average use per small commercial customers will decline between 2017 and 2021. Further, as OCC concludes, the evidence that implementing an RDA mechanism for small commercial customers will result in higher levels of energy efficient savings or greater investment in on-site generation is speculative and unpersuasive.

151. The Company's proposal to implement a revenue decoupling adjustment mechanism for small commercial (Schedule C) customers shall be denied.

#### **IV. ORDER**

##### **A. The Commission Orders That:**

1. The Motion for Admission *Pro Hac Vice* of Ron H. Moss (Motion) filed on February 14, 2017, by Public Service Company of Colorado (Public Service) is granted.

2. The Application for Authorization to Implement a Revenue Decoupling Adjustment Mechanism filed on July 13, 2016, by Public Service is granted consistent with the discussion above.

3. This Recommended Decision shall be effective on the day it becomes the Decision of the Commission, if that is the case, and is entered as of the date above.

4. As provided by § 40-6-106, C.R.S., copies of this Recommended Decision shall be served upon the parties, who may file exceptions to it.

5. Responses to exceptions shall be due within seven calendar days from the filing of exceptions.

6. If no exceptions are filed within 20 days after service or within any extended period of time authorized, or unless the recommended decision is stayed by the Commission upon its own motion, the recommended decision shall become the decision of the Commission and subject to the provisions of § 40-6-114, C.R.S.

7. If a party seeks to amend, modify, annul, or reverse a basic finding of fact in its exceptions, that party must request and pay for a transcript to be filed, or the parties may stipulate to portions of the transcript according to the procedure stated in § 40-6-113, C.R.S. If no transcript or stipulation is filed, the Commission is bound by the facts set out by the administrative law judge; and the parties cannot challenge these facts. This will limit what the Commission can review if exceptions are filed.

8. If exceptions to this Recommended Decision are filed, they shall not exceed 30 pages in length, unless the Commission for good cause shown permits this limit to be exceeded.

(S E A L)



THE PUBLIC UTILITIES COMMISSION  
OF THE STATE OF COLORADO

ROBERT I. GARVEY

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Administrative Law Judge

ATTEST: A TRUE COPY

A handwritten signature in cursive script that reads "Doug Dean".

Doug Dean,  
Director