

BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF COLORADO

DOCKET NO. 09A-772E

IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF
COLORADO APPROVING ITS 2010 RENEWABLE ENERGY STANDARD
COMPLIANCE PLAN.

**ANSWER TESTIMONY AND EXHIBITS OF WILLIAM J. DALTON
STAFF OF THE COLORADO PUBLIC UTILITIES COMMISSION**

NOTICE OF CONFIDENTIALITY: PORTIONS OF THIS TESTIMONY AND/OR
EXHIBITS ARE CONFIDENTIAL AND HAVE BEEN FILED UNDER SEAL
PURSUANT TO 4 CCR 723-16, RULES RELATING TO THE CLAIM OF
CONFIDENTIALITY OF INFORMATION SUBMITTED TO THE COLORADO
PUBLIC UTILITIES COMMISSION

February 4, 2010

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AFFIDAVIT

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I. IDENTIFICATION OF WITNESS AND PURPOSE OF TESTIMONY

Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.

A. My name is William J. Dalton and my business address is 1560 Broadway Suite 250, Denver, CO 80202.

Q. BY WHOM ARE YOU EMPLOYED AND IN WHAT CAPACITY?

A. I am employed by the Colorado Public Utilities Commission
(Commission) as a Professional Engineer.

Q. HAVE YOU PREPARED A STATEMENT OF YOUR EXPERIENCE AND QUALIFICATIONS?

A. Yes. It is attached as Appendix A to this testimony.

Q. ARE YOU GENERALLY FAMILIAR WITH THE FILINGS IN DOCKET NO. 09A-772E?

A. Yes.

1 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY?**

2 **A.** The purpose of my testimony is to provide Staff’s analysis of the 2010
3 Renewable Energy Standard Compliance Plan (the “2010 RES Plan”)
4 proposed by Public Service Company of Colorado (the “Company”, or
5 “PSCo”). I also provide Staff’s recommendations on whether the
6 Commission should approve PSCo’s 2010 RES Plan.

7
8 **Q. CAN YOU SUMMARIZE YOUR RECOMMENDATIONS?**

9 **A.** Staff has completed a review and assessment of Public Service’s 2010
10 RES Plan. Staff recommends that the Commission accept Public
11 Service’s 2010 RES Plan conditioned on the following recommendations:

- 12 1. Deny the Company’s waiver request on Commission Rule 3660
13 (b)(I), to charge ratepayers an interest rate on the RESA account
14 balance based the Company’s Weighted Average Cost of Capital.
15 2. Recommend partial waiver of Commission Rule 3658 (c), to allow
16 for Standard Rebate and SO-REC contracts for terms other than
17 20-years as required and restricted to Government customers that
18 require such changes.

- 1 3. Recommend that the Commission use the Company’s alternative
2 case scenario in which carbon tax is deferred to 2014 for
3 incremental cost determination.
- 4 4. Reject the Company’s proposed use of “avoided capacity” charges
5 in determination of eligible energy incremental costs.
- 6 5. Recommend that the Company use Windsource premiums for
7 renewable energy additionality, as agreed in Docket No. 08A-
8 260E, approved by the Commission in Decision No. R09-0111,
9 and not use these premiums to fund Commission approved RES
10 and ERP acquisitions.
- 11 6. Reject the Company’s proposal to double count RECs for specific
12 Windsource customers and compliance purposes.
- 13 7. Recommend the Company reserve RESA funds for possible early
14 commercial operation of the Greater Sandhill I central solar
15 facility.

1 **II. COLORADO RENEWABLE ENERGY STANDARDS**

2
3 **Q. HAS STAFF PERFORMED A REVIEW OF THE COMPANY’S**
4 **COMPLIANCE PLAN BASED ON THE REQUIREMENTS IN THE**
5 **COMMISSION’S RULES, 4 CCR 723-3-3650, *et seq.*?**

6 **A.** Yes.

7
8 **Q. WHAT DID THAT REVIEW SHOW?**

9 **A.** The Company’s RES Compliance plan will result in continued meeting or
10 exceeding existing compliance requirements. As provided in **Exhibits**
11 **WJD – 1, WJD – 2 and WJD – 3**, although the Company has obtained
12 sufficient RECs for compliance purposes, the less costly central solar has
13 been below what is required.

14
15 **III. SOLAR REQUIREMENT OF THE RES**

16
17 **Q. IS PSCO BORROWING FORWARD SOLAR RECS IN ITS 2010**
18 **COMPLIANCE PLAN TO MEET THE 2010 SOLAR ENERGY**
19 **REQUIREMENTS?**

1 **A.** Yes. PSCo’s 2010 RES Plan relies on “borrowing forward” to meet the
2 Central Solar requirement for 2010. PSCo projects borrowing forward
3 17,517 S-RECs from 2011.¹ This compares to the 2009 RES Plan where
4 PSCo borrowed forward 10,381 S-RECs from 2010. Staff attributes the
5 increase in year over year S-REC borrowing to the Company’s
6 disproportionate acquisition of On-Site Solar Resources since 2008,
7 specifically the small on-site systems (<10 kW), see **Exhibits WJD–1** and
8 **WJD–2**. Staff notes that Commission Rule 3654 (k), 4 CCR 723-3,
9 allows for such borrowing forward; however the borrowing provision
10 expires with the 2010 Compliance year.

11
12 **Q. WHAT IS PSCO’S PLAN FOR CENTRAL SOLAR ENERGY**
13 **ADDITIONS?**

14 **A.** PSCo released a RFP in January 2008 for approximately 60,000 MWh of
15 S-RECs (approximately 25 MW AC) from new or existing non-On-Site
16 solar facilities starting in the 2009 - 2012 timeframe. The January 2008
17 RFP process resulted in a contract with Greater Sandhill I, LLC to
18 construct, own and operate a 19.2 MW DC (16.1 MW AC) photovoltaic
19 facility in the San Luis Valley.

20

¹ PSCO 2010 RES Compliance Plan, October 27, 2009, Volume 2, Table 4-2, page 3 of 4, row 15.

1 The project's expected generation is 48,004 MWh, and with the Colorado
2 in-state bonus of 25 percent, represents approximately 60,000 first year S-
3 RECs. The developer, Greater Sandhill I, LLC has targeted a December
4 31, 2010 commercial operation date. The Company believes that the solar
5 power from this project will cost approximately 33 percent less than the
6 solar power generated by the SunE Alamosa I facility in the San Luis
7 Valley.

8
9 The Company submitted the Greater Sandhill I contract to the
10 Commission for approval as an application in Docket 09A-253E and the
11 contract was approved by the Commission in Decision No. C09-0477.

12
13 **Q. DOES STAFF HAVE ANY CONCERNS WITH THE GREATER**
14 **SANDHILL I CONTRACT?**

15 **A.** Staff's only concern is the expected commercial operation date of
16 December 31, 2010. Similar to Staff's concern regarding the December
17 31, 2009 commercial operation date of the Northern Colorado Wind I and
18 II (NCW I and II), Staff believes that Sandhill will obtain commercial
19 operation of the facility months prior to December 31, 2010 and this
20 contract allows for payment based on early completion. However, the

1 RESA budget doesn't show any incurred or accrued 2010 costs being paid
2 in 2010 arising from the Sandhill contract. If the Company budgets
3 spending for on-site resources that may or may not be completed, then the
4 Company should budget for early commercial operation of this central
5 solar facility. This RESA budget oversight, with no costs until next year,
6 mirrors the Company's position during the 2009 RES Compliance Plan
7 hearing, which avoids acknowledging that the NCW I and II projects
8 could achieve early commercial operations and incur RESA costs during
9 2009. The NCW projects did achieve commercial operations six months
10 prior to the December 31, 2009 date, and incurred costs that the Company
11 recovered through the ECA and RESA, including an estimated \$3.6
12 Million in incremental costs.² This modeling oversight contributed to the
13 Company exceeding its 2009 RESA budget.

14
15 The Solar Energy Purchase Agreement with Sandhill allows for three
16 separate partial completion declarations on June 30, 2010, August 31,
17 2010 and October 31, 2010. Sandhill, upon achieving these partial
18 completions, each with 5 MW operational capacity will be sold to the
19 Company at agreed to pricing along with any test energy at one-half the

² PSCo 2010 RES Compliance Plan, Errata January 26, 2010, Volume 2, Table 7-5, columns C and D.

1 agreed to purchase price. Staff recommends that the Commission require
2 the Company to reserve RESA funds to pay for all three partial completion
3 declarations and resulting energy through the end of 2010. If commercial
4 operation is not achieved in 2010, the funds should be released for other
5 RESA costs.

6
7 **IV. SOLAR REC AND REBATE PAYMENTS**

8
9 **Q. WHAT IS STAFF'S OBSERVATION OF THE COMPANY'S**
10 **MANAGEMENT OF THE SMALL PROGRAM?**

11 **A.** The small program offering does have a role in helping the Company
12 achieve the RES and also develops the on-site solar industry. However,
13 Staff does not believe that the Company's past accommodation and over-
14 subscribing³ of this segment, at the expense of all other available solar
15 resources, results in cost effective acquisition of solar resources.

16
17 Since the program initiation in 2006, the Company has spent almost \$120
18 million of ratepayer's funds through November 2009 on RESA related
19 expenses including REC and rebate payments and program administration

³ PSCo witness P. Newell, Direct Testimony, page 6, line 11 to line 12.

1 (see **Exhibit WJD-4**). The largest share of spending has been related to
2 the Company's onsite solar programs (see Highly Confidential **Exhibit**
3 **WJD-5**).

4
5 **Q. IS STAFF SATISFIED WITH PSCO'S SOLAR INCENTIVES?**

6 **A.** Yes, Staff agrees with PSCo's Solar Incentives for the 2010 REC payment
7 and rebate amounts going forward. However, Staff is concerned with the
8 ongoing consequences of the Company's past actions that created
9 application bubbles in the small solar program. These bubbles lock in
10 previously offered higher REC prices. As discussed in Staff's testimony
11 in the 2009 RES Compliance Plan,⁴ the Company announced an
12 immediate change in REC price in October 2008, creating an application
13 bubble that is still being worked off. During 2009, in the Company's rate
14 case filing (Docket 09AL-299E), the Company proposed a new minimum
15 demand charge for small PV system installed after April 2010,⁵ this
16 proposal created a second application bubble, (see **Exhibit WJD-6**) which
17 locked in these applications at \$1.50 per watt REC payment, even though
18 the current queue price is only \$0.75 per watt REC payment beginning on

⁴ Docket 08A-532E, Answer Testimony of W.J. Dalton, Staff of the Colorado PUC, February 23, 2009, page 31, line 15 through Page 36, line 13.

⁵ PSCo witness S. Brocket, Direct Testimony, Docket 09AL-299E, page 36, line 18 to line 22.

1 January 25, 2010. Staff believes that the Company's actions resulted in
2 allocation of a significant portion of the 2010 RESA budget estimated at
3 \$14 to \$16 million.⁶ These actions were initiated by the Company in May
4 2009, prior to Commission consideration of the 2010 RES Plan and prior
5 to the Commission Decision on the 2009 RES Plan.
6

7 **Q. DOES STAFF HAVE CONCERNS WITH THE COMPANY'S NEW**
8 **SOLAR*REWARDS OFFERING PROPOSED IN THIS DOCKET?**

9 **A.** Yes. The tier REC pricing structure proposed by the Company should
10 assist the Company in reducing payments to customers⁷. Staff believes
11 that the Company must consider annual RESA expenditures, RESA
12 budgets and not accept all qualified applications as the Company did
13 through 2009. (See **Exhibit WJD-8.**) Staff believes that the RES rules do
14 not allow for unlimited ratepayer funded spending on renewable energy
15 resources without consideration of costs to ratepayers, compliance
16 requirements and a cost effective resource mix.
17

⁶ PSCo's Response to Staff Discovery Request CPUC 5-27, attached as **Exhibit WJD-7.**

⁷ PSCo's witness P. Newell, Direct Testimony, page 12, line 22 through page 13, line 1.

V. RETAIL RATE IMPACT

Q. DID THE COMPANY PERFORM A RETAIL RATE IMPACT CALCULATION AS REQUIRED IN RULE 3657 AND RULE 3661, 4 CCR 723-3?

A. The Company explains in its application and the direct testimony of Company witness(s) Warren and Moorman how it determined the retail rate impact calculation and the methods it used to do that calculation.

Q. WHAT IS THE PURPOSE OF RES AND NO RES PLANS?

A. The Company uses the RES and No RES Plans to determine certain incremental costs. Incremental costs are the difference in the annual Total System Costs between the RES and No RES portfolio as determined by the Company's STRATEGIST modeling software. Total System Costs are the costs associated with meeting the Company's annual load requirement (retail and wholesale loads) and the costs of all generation resources used to meet the load.⁸

Q. HOW DOES PSCO DEFINE "INCREMENTAL COSTS" IN DOING ITS RES AND NO RES PLANS?

⁸ PSCo's witness A. Warren, Direct Testimony October 27, 2009, page 5, line 6 to line 11.

1 **A.** The difference in the acquisition of resources between the RES and the No
2 RES plans is the annual incremental costs of Eligible Energy (“EE”) as
3 shown in Tables 7-1 and 7-2. “Incremental Costs” are subject to recovery
4 through the RESA.

5

6 **Q. DOES PSCO’S RESA RECOVER ALL THE COST OF EE?**

7 **A.** No, the RESA only recovers the incremental portion of the cost of EE as
8 allowed by rule.

9

10 **Q. HOW DOES PSCO RECOVER THE REMAINING COSTS?**

11 **A.** PSCo performs an additional calculation to determine the costs recovered
12 through the ECA. The difference between the Incremental Costs and the
13 Total Costs of the Eligible Energy Resources in the RES Plan are
14 calculated by spreadsheet; these are the Avoided Costs of the non-
15 renewables or what PSCo refers to in its 2010 Compliance Plan as
16 “matching non-incremental costs” recovered as an ECA cost.⁹

17

18

19

⁹ PSCo’s witness A. Warren, Direct Testimony October 27, 2009, page 5, line 17 through page 6, line 4.

1 **Q. HOW ARE THESE ECA COSTS RECOVERED?**

2 **A.** These “matching non-incremental” costs are determined annually from
3 PSCo’s RES Plan forecast and are recovered on a monthly basis from
4 ratepayers in the ECA and trued up annually as approved in Commission
5 Decision C09-1037, Docket 08A-532E.

6

7 **Q. YOU PREVIOUSLY DISCUSSED THE ECA COSTS. ARE THESE**
8 **ECA COSTS LIMITED OR RESTRICTED IN ANY WAY?**

9 **A.** No. The ECA costs are recovered in a manner similar to the existing ECA
10 cost recovery rider. The ECA has been used by PSCo to recover purchase
11 power fuel and energy costs. The ECA for the RES Plan is the avoided
12 costs of the non-renewable resources. In Table 7-4 of PSCo’s 2010
13 Application, PSCo is estimating an ECA credit in 2010 of approximately
14 6,344,258. This amount becomes a cost beginning in 2011, growing
15 exponentially to \$705,119,753 in 2020.

16

17 **Q. ARE ALL RENEWABLE ENERGY ECA COSTS INCURRED**
18 **SHOWN IN PSCO’S TABLES 7-3 AND 7-4?**

19 **A.** No. Not all the ECA costs that are attributable to eligible energy resources
20 listed in Plan Table 4-2 are presented in Tables 7-3 and 7-4. During late

1 2007, PSCo obtained commercial operation of approximately 775 MW of
2 new Wind Resources. 2008 represented the first full year of commercial
3 operation. These resources are Cedar Creek (300 MW), Logan (201 MW),
4 Peetz Table (200 MW) and Twin Buttes (75 MW). The Commission
5 approved PSCo's request in Decision No. C08-0559, Docket 07A-462E,
6 that the cost of these resources be recovered in the ECA and not the
7 RESA. The cost of these resources is estimated at \$110,568,000 for 2009
8 by the Company.¹⁰ However, the renewable energy credits generated by
9 these facilities do count toward RES compliance. These resources
10 represent 64 percent of the acquired non solar RECs for 2009 and an
11 estimated 62 percent of the acquired non solar RECs for 2010.

12
13 **Q. WHY IS THE DISTINCTION BETWEEN RECOVERY OF**
14 **CERTAIN RENEWABLE ENERGY COSTS FROM RESA**
15 **REVENUE AND RECOVERY IN THE ECA SO IMPORTANT?**

16 **A.** It is important because the renewable energy costs projected by the
17 Company (see Column F of Table 7-4) for obtaining renewable energy
18 that complies with and exceeds compliance with the RES, are not
19 exclusively recovered from RESA revenue or listed as ECA costs. In
20 response to Staff Discovery Request CPUC 4-17 (see **Exhibit WJD-9**),

¹⁰ PSCo's response to Staff Discovery Request CPUC 4-17, attached as **Exhibit WJD-9**.

1 the Company identified wind energy costs for 2009 of \$147,431,000 and
2 2010 of \$155,462,000 that are not included in Tables 7-3 and 7-4. These
3 costs are not limited by the two (2) percent maximum retail rate impact.
4 Further, sunk renewable energy resources that are considered in both the
5 RES and No-RES portfolio, such as the 2007 wind resources mentioned
6 above, are recovered through other recovery mechanisms such as the ECA
7 and the annual cost of these resources are not included in Tables 7-3 or 7-
8 4.

9
10 **VI. ON-GOING INCREMENTAL COSTS**

11
12 **Q. DOES STAFF HAVE CONCERNS WITH THE COMPANY'S**
13 **CALCULATION OF THE ON-GOING INCREMENTAL COSTS?**

14 **A.** Yes. Staff believes that the Company is over-estimating the incremental
15 cost for the resources. The Company is including a \$ 20 per ton carbon
16 cost in modeling of contracted resources, even though there currently is no
17 Federally mandated carbon cost requirement, nor a Commission order
18 authorizing the Company to collect from ratepayers a \$ 20 per ton carbon
19 cost.¹¹ This creates a situation where the Company is including costs that
20

¹¹ PSCo's Discovery Response CPUC 4-22, provided as **Exhibit WJD – 10**.

1 do not exist. Allocating modeled incremental costs on nonexistent cost
2 assumptions result in systemically overestimated modeled costs for both
3 the RES and No RES portfolios.
4

5 The Company acknowledges that there are no carbon costs in 2010 and
6 has provided an Alternative Cost Portfolio (Application Tables 7-2 and 7-
7 4) with carbon costs beginning in 2014. Second, the Company is now
8 including an avoided capacity cost of \$4/kW per month capacity credit
9 that does not exist in the RES portfolio. Staff is not aware of any current
10 renewable energy contracts that include a demand or capacity payment;
11 current contracts are for energy only (MWh). The Company has now
12 added an “avoided capacity” cost in its determination of incremental costs
13 recovered through the RESA account.
14

15 In response to Staff Discovery CPUC 4-15 (see **Exhibit WJD-11**); the
16 Company referenced Commission Decision C08-0929 in Docket 07A-
17 447E, as justification for using a capacity credit. This decision did not
18 make a finding that the Company may include these modeling parameters
19 in the RESA incremental cost determination.
20

1 For example, the Company has provided an estimated incremental cost
2 determination for SunE Alamosa that includes a \$4 per kW-month
3 capacity cost or demand charge. Staff's review of the incremental cost
4 calculation provided in Confidential Discovery Response OCC 2-15
5 reveals that the capacity cost inflates the incremental cost for this resource
6 by an estimated 13 percent through 2015. Simply stated, the Company is
7 adding capacity costs associated with the No-RES portfolio into
8 incremental costs determined in the RES portfolio.

9
10 Staff believes that incremental cost determination should be based on
11 known and actual costs at time of determination, and not on modeling
12 assumptions and guidelines used in the ERP docket that are not occurring
13 or will not occur during the five year lock down period.

14
15
16 **VII. WINDSOURCE**

17 **Q. WHY IS THERE A DISCUSSION ON WINDSOURCE IN PSCO'S**
18 **2010 RES PLAN?**

19 **A.** As a result of the Company's Application to modify the then existing
20 Windsource Program in Docket 08A-260E, and the 2009 Windsource

1 Settlement, approved by the Commission in Decision 09R-0117, the
2 Company is required to file its annual Windsource Program information
3 with its annual RES Compliance Filing.
4

5 **Q. PLEASE SUMMARIZE PSCO'S WINDSOURCE OFFERING?**

6 **A.** On February 19, 1997, the Commission issued Decision No. C97-0203 in
7 Docket No. 96A-401E approving a settlement agreement ("1997
8 Settlement") which implemented Windsource, the first wind generation on
9 the Company's system. This program allows PSCo's customers to
10 voluntarily subscribe to Windsource at a premium price.
11 Currently, instead of a separate portfolio of wind resources to support
12 Windsource, PSCo offers a program in which the voluntary subscribers
13 pay premium rates to have RECs transferred from the RES portfolio, and
14 such RECs would be retired and not used by PSCo for compliance with
15 the RES. For a customer who purchases or offsets 100 percent of their
16 electric consumption from renewable resources, the customer can claim
17 their electric energy is "100 percent renewable" or "100 percent green
18 energy."
19

1 **Q. DOES PSCO PROPOSE DOUBLE COUNTING THE**
2 **WINDSOURCE RECS?**

3 **A.** Yes. In this application the Company proposes to double count RECs for
4 certain Windsource customers and compliance purposes. Double counting
5 of Windsource RECs has never been approved by the Commission in any
6 prior Docket or any of the Windsource Settlements.

7
8 **Q. HAS THE COMMISSION CONSIDERED DOUBLE COUNTING**
9 **OF RECS FOR GREEN PROGRAMS SUCH AS WINDSOURCE?**

10 **A.** Yes. The Commission in Decision 09-1220, paragraph 13 (Docket 08R-
11 424R), rejected the Company's Rehearing, Reargument, or
12 Reconsideration for allowing double counting of RECs for voluntary
13 programs and RES compliance purposes. Staff recommends that the
14 Commission continue to disallow any double counting of RECs for
15 Windsource and compliance purposes.

16
17 **Q. WHAT ARE SOME OF THE KEY PROVISIONS FROM THE**
18 **WINDSOURCE DOCKET 08A-260E SETTLEMENT STAFF HAS**
19 **CONCERNS WITH?**

1 **A.** Staff has concerns with the two following points from the Commission
2 approved settlement in Decision No. R09-0111:

3 2. Incremental Renewable Energy Additions: Public Service
4 commits to use the premiums paid through the revised green
5 pricing program to develop renewable energy generation above
6 and beyond what the Company would otherwise have acquired as
7 part of its resource planning process.

8
9 3. Renewable Energy Portfolio Diversification: One benefit of
10 moving to a blended renewable energy product is that it allows
11 customers participating in the program to support and help
12 commercialize emerging renewable energy technologies that are
13 currently not part of, or play only a small role in, the Company's
14 resource mix.

15
16 **Q.** **COULD STAFF ELABORATE ON THESE CONCERNS?**

17 **A.** The Company's proposal to use Windsource Premiums to support the
18 planned Solar RFP and Central Solar acquisitions will not result in
19 additional resources. These resources are already included in the
20 Company's planning process. Staff believes that this type of premium
21 expenditure will not provide additionality in renewable energy
22 development.

23
24 **Q.** **WHAT IS ADDITIONALITY?**

25 **A.** Additionality is the development of renewable energy resources above or
26 beyond what PSCo develops to be compliant with existing laws,
27 Commission Rules, and other commitments. Staff recommends

1 establishing criteria to measure renewable energy resource additionality.

2 (see http://www.green-e.org/learn_dictionary.shtml)

3
4 **Q. WHAT CRITERIA DOES STAFF PROPOSE TO CONSIDER AS A**
5 **MEASURE FOR ADDITIONALITY?**

6 **A.** First, timing, the resource must be new. Second, the resource must be
7 above or beyond that provided for by RESA funds, lower carbon mandates
8 or as part of Commission approved resource plans.

9
10 Additionality is the development of renewable energy resources above or
11 beyond what PSCo develops in its regular course of business to comply
12 with Commission approved RES and low carbon energy resource plans.

13
14 For example, the Company in its resource plan proposes to increase wind
15 generation by 100 MW annually starting in 2010. The RECs generated by
16 these resources are not new—that is, they do not provide additionality,
17 because the Company is already planning to add these resources.

18
19

1 **Q. HAVE THE WINDSOURCE PREMIUMS COLLECTED BY PSCO**
2 **PROVIDED FOR NEW RENEWABLE ENERGY**
3 **DEVELOPMENT?**

4 **A.** No. Staff believed that the Windsource settlement, approved by the
5 Commission in Decision No. R09-0111, Docket No. 08A-260E, would
6 result in renewable energy development additionality. Now, the Company
7 proposes to use the 2009 Windsource premiums to support a Solar*Rewards
8 RFP required by Commission Rule 3655(f) in addition to using future
9 Windsource premiums to acquire an already planned central solar under the
10 next RFP.¹²

11
12 The Company's proposed use of Windsource premiums in this manner
13 will have no impact on the development of renewable energy in Colorado.
14 The Company is planning these renewable energy acquisitions as
15 approved by the Commission in Decision No. C09-1257, Docket No. 07A-
16 447E, [Portfolio #5 from the 120 day report], with or without the
17 Windsource Premiums.

¹² http://www.green-e.org/base/re_products?cust=r#res. Decision No. R09-0413 in Docket No. 08R-424E, effective April 20, 2009, at pg.36, para. 112.

1 **Q. WHAT IS STAFF’S OBSERVATION WITH REGARD TO PSCO’S**
2 **PROPOSAL PERTAINING TO WINDSOURCE?**

3 **A.** The Company has provided no assurance that Windsource premiums
4 collected will result in the development of new renewable energy
5 resources beyond planned acquisitions. Premiums collected since 2001
6 have not been used to procure the development of new or additional
7 renewable energy on behalf of Windsource subscribers, yet the Company
8 markets the program to customers as helping to increase the development
9 of renewable energy in Colorado.¹³ The Company’s assertion that
10 premiums deposited into the RESA will provide additional new renewable
11 energy development is suspect.

12
13 **Q. WHAT ARE STAFF’S RECOMMENDATIONS REGARDING THE**
14 **WINDSOURCE PROGRAM?**

15 **A.** Staff recommends that Windsource premiums be used to support
16 true additionality.

¹³ PSCo Discovery Response CPUC 4-11, provided as **Exhibit WJD – 12.**

VIII. WAIVER REQUEST

Q. WHAT IS THE WAIVER PSCO SEEKS?

A. In her Direct Testimony in this matter, Ms. Robin Kittel sponsors the Company's request for "a change in the rate for interest payments on the RESA deferred balance to the Company's after-tax weighted average cost of capital", at an after-tax rate of return of 7.88%, stating that "This interest rate change is necessary to advance the early solar acquisitions needed for meeting compliance and advancing the solar industry in Colorado".¹⁴

Q. DID PSCO PREVIOUSLY MAKE THIS ARGUMENT IN DOCKET NO. 08R-424E.

A. Yes.

Q. DO THE NEWLY-REVISED RENEWABLE ENERGY RULES COMPENSATE PSCO ADEQUATELY FOR ITS SURPLUS OR 'NEGATIVE DEFERRED BALANCE' IN THE RESA FUND?

A. Yes. In Docket No. 08R-424E, the Commission approved the ALJ's

¹⁴ PSCo witness R. Kittel, Direct Testimony filed October 27, page 8, line 5 through 10.

1 recommended changes to the level of compensation for temporary
2 expenditures by utilities to meet their renewable energy requirements that
3 exceed the contributions by ratepayers in a particular year.
4

5 **Q. DID THE COMMISSION RECONSIDER THE NEW RULE**
6 **CHANGE?**

7 **A.** Yes. The Commission declined to make further modifications to the
8 newly-minted revisions. In fact, in Decision No. C09-0990, effective
9 September 9, 2009, the Commission specifically stated, “we decline to
10 modify the interest rate that the ALJ establishes in his proposed changes to
11 paragraph 3660(b) because we find that he reached a reasonable
12 compromise in this instance”.¹⁵ The Rule was thoroughly vetted in Docket
13 No. 08R-424E. Numerous parties intervened in that proceeding, and there
14 was ample opportunity at that time for PSCo to have submitted
15 suggestions for other ways of structuring the Rule. All parties had an
16 opportunity to consider PSCo’s suggestions at that time, but PSCo has
17 instead elected to seek a waiver of the Rule and seek a higher interest rate
18 in this docket.
19

¹⁵ Ibid.

1 **Q. WHAT DOES THE COMPANY INTEND TO DO IF THE WAIVER**
2 **IS NOT GRANTED.**

3 **A.** The Company claims it will stop its Solar*Reward program. At page 20,
4 lines 6 through 10 of her Direct Testimony in this matter, Ms. Kittel states
5 that these standard offers will remain open only “if the Commission grants
6 the waiver we request...”, and, at page 20, lines 19 through 21, that
7 “Public Service proposes and has forecasted to keep the Small and
8 Medium Programs open so long as the Company is not harmed by loaning
9 money to the RESA”.

10
11 **Q. WHAT IS THE EFFECT OF GRANTING PSCO’S REQUEST FOR**
12 **A PERMANENT WAIVER?**

13 **A.** Granting the Company’s waiver request would create another source of
14 rate-of-return revenue that the Company will be reluctant to forego. The
15 result is an unintended “incentive” that rewards the Company for
16 continuing its contributions to the RESA fund in excess of RESA
17 collections or simply rewarding the Company for continued over-
18 spending. Ratepayers would find themselves financing funds at a high
19 rate of interest indefinitely.

20

1 **Q. IS THE PROPOSED WAIVER CONSISTENT WITH THE**
2 **PRINCIPLES OF UTILITY REGULATION?**

3 **A.** No. A utility's rate of return is that rate which compensates its investors,
4 not only for the cost of the interest that funds its long-term debt, but in
5 addition, provides shareholders a return on their investment on that portion
6 of the rate base that is funded by equity, the shareholders' ownership in
7 the company's assets. However, the RESA fund is not part of PSCo's rate
8 base. As such, the Company's expenditures out of the RESA fund are
9 simply expenses on the Company's income statement, and not an
10 investment reflected on its balance sheet. Allowing the Company a return
11 on this expense would violate the regulatory practice whereby utilities are
12 allowed to pass through their expenses to ratepayers, but profit only on the
13 shareholders' investment in the utility's infrastructure.

14
15 **Q. WHAT IS STAFF'S CONCLUSION REGARDING THE WAIVER**
16 **REQUEST?**

17 **A.** There is no reason a waiver should be granted. The Commission has
18 already addressed and rejected the proposed interest rate treatment.
19 PSCo's request is merely a renewed attempt to get what it could not get in
20 the rule making docket.

IX. RECOMMENDATIONS

Q. PLEASE SUMMARIZE YOUR RECOMMENDATIONS.

A. Staff recommends the Commission:

1. Deny the Company's waiver request on Commission Rule 3660 (b)(I), to charge ratepayers an interest rate on the RESA account balance based the Company's Weighted Average Cost of Capital.
2. Recommend partial waiver of Commission Rule 3658 (c), allow for Standard Rebate and SO-REC contracts for terms other than 20-years as required for Government customers that require such changes.
3. Recommend that the Commission use the Company's alternative case, carbon tax differed to 2014 for incremental cost determination.
4. The Commission should reject the Company's proposed use of "avoided capacity" charges in determination of eligible energy incremental costs.
5. Recommend that the Company use Windsource premiums for renewable energy additionality, as agreed to in Docket No.

1 08A-260E, approved by the Commission in Decision No. R09-
2 0111.

- 3 6. Reject the Company's proposal to double count RECs for
4 specific Windsource customers and compliance purposes.
5 7. Recommend the Company reserve RESA funds for possible
6 early commercial operation of Greater Sandhill I central solar
7 facility.

8
9 **Q. DOES THIS CONCLUDE YOUR TESTIMONY AT THIS TIME?**

10 **A. Yes.**

APPENDIX A

STATEMENT OF QUALIFICATIONS

OF

WILLIAM J. DALTON, P.E.

I am a graduate of the State University of New York at Buffalo with a Bachelor of Science Degree in Chemical Engineering. I have a Masters in Business Administration Degree from Canisius College (Buffalo, NY). I am licensed Professional Engineer in Colorado and New York. I am a Certified Energy Manager and a Certified Sustainable Development Professional, as issued by the Association of Energy Engineers.

I joined the Colorado Public Utilities Commission in January 2007 as a Professional Engineer. In my present position, I have responsibility to analyze and make recommendations to the Commission on Renewable Energy Standards Programs, and to review and evaluate applications filed by regulated utilities to ensure compliance with generally accepted Rules and practices of the Commission. To date, I have provided testimony in Commission Docket Nos. 06S-656G, 07A-108EG, 07A-356E, 07A-462E, 08A-260E, 08A-346E, 08A-470E, 08A-532E, 09A-015E and 09A-156E.

My professional experience includes project, consulting, and development engineering roles in regulated industries, primarily in the areas of public utility and nuclear waste remediation.

Prior to joining the Colorado Public Utilities Commission, I worked at Xcel Energy for 6 years, most recently as a Generation Modeling Analyst. In this role, I was involved in evaluation of multiple cost impacts to Xcel Energy generation and resource portfolio using various modeling software. Initially at Xcel Energy, I was a Technical Consultant, providing technical expertise on new product offerings and customer implementation requirements.

Prior to joining Xcel Energy, my responsibilities included Project Engineering, process design supervision and oversight for waste retrieval and treatment system design for Department of Energy (DOE) facilities. I prepared and presented project documentation, status reports, technical evaluations and updates to management, client, subcontractors and vendors, state regulatory agencies, the DOE and Nuclear Regulatory Commission (NRC). I ensured compliance with environmental regulations and contract requirements. I provided resolution, costing, justification, and program changes as required.

As a consulting engineer, I managed assignments involving process development, design and evaluations, environmental compliance and market studies. I evaluated and made recommendations to improve client operations, process analysis, material flow, equipment and facility layouts. I determined capital and operating costs, designed process operations and materials handling systems. I have performed the following responsibilities: mass and energy balances, material and equipment selection/assessment, environmental permitting and compliance.

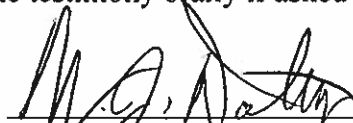
BEFORE THE PUBLIC UTILITIES COMMISSION
OF THE STATE OF COLORADO

DOCKET NO. 09A-772E

RE: IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF COLORADO
APPROVING ITS 2010 RENEWABLE ENERGY STANDARD COMPLIANCE PLAN.

AFFIDAVIT OF WILLIAM J. DALTON
STAFF OF THE COLORADO PUBLIC UTILITIES COMMISSION

I, William J. Dalton, being duly sworn, state that the attached testimony was prepared by me or under my supervision, control, and direction; that the testimony is true and correct to the best of my information, knowledge and belief; and that I would give the same testimony orally if asked under oath.



William J. Dalton

Subscribed and sworn to before me in the County of Denver, State of Colorado, this 4th day of

February 2010.



NOTARY PUBLIC

My Commission expires:

7/10/13

EXHIBIT –WJD-1 (1 PAGE)
EXHIBIT –WJD-2 (1 PAGE)
EXHIBIT –WJD-3 (1 PAGE)
EXHIBIT –WJD-4 (1 PAGE)
HIGHLY CONFIDENTIAL EXHIBIT –WJD-5 (1 PAGE)
EXHIBIT –WJD-6 (1 PAGE)
EXHIBIT –WJD-7 (1 PAGE)
EXHIBIT –WJD-8 (1 PAGE)
EXHIBIT –WJD-9 (1 PAGE)
EXHIBIT –WJD-10 (1 PAGE)
EXHIBIT –WJD-11 (1 PAGE)
EXHIBIT –WJD-12 (1 PAGE)

2007 REC SUMMARY							
	Pre-2007 Carry Forward	2007 Acquisitions	25% In State Bonus	2007 Actual	2007 Requirement	Actual as % Requirement	2007 Surplus Carry Forward
RECS	2,440,344	1,558,156	924,784	4,923,284	842,577	584%	4,080,707
Non-Solar	2,432,510	1,536,891	921,509	4,890,910	808,874	605%	4,082,036
Solar	7,834	21,265	3,275	32,374	33,703	96%	(1,329)
On-Site	4,083	6,851	2,734	13,668	16,852	81%	(3,184)
S-REC	3,751	14,414	541	18,706	16,851	111%	1,855

Source: 2007 RES Compliance Report - Attachment III REC COMPLIANCE SUMMARY

2008 REC SUMMARY							
	Pre-2008 Carry Forward	2008 Acquisitions	25% In State Bonus	2008 Actual	2008 Requirement	Actual as % Requirement	2008 Surplus Carry Forward
RECS	3,174,191	2,971,515	742,879	7,608,576	1,413,435	538%	6,191,953
Non-Solar	3,172,707	2,919,966	729,992	7,542,284	1,356,898	556%	6,185,382
Solar	1,484	51,549	13,259	66,292	56,537	117%	6,571
On-Site	0	33,971	8,493	42,464	28,269	150%	11,011
S-REC	1,484	17,578	4,766	23,828	28,268	84%	(4,440)

Source: 2008 RES Compliance Report - Attachment 3 REC COMPLIANCE SUMMARY

2009 REC SUMMARY							
	Pre-2009 Carry Forward	2009 Acquisitions	25% In State Bonus	2009 Actual	2009 Requirement	Actual as % Requirement	2009 Surplus Carry Forward
RECS	4,984,614	2,895,054	1,911,582	9,791,250	1,377,342	711%	8,404,350
Non-Solar	4,984,614	2,830,883	1,895,539	9,711,036	1,322,248	734%	8,388,788
Solar	(4,524)	64,791	16,043	80,214	55,094	146%	15,562
On-Site	4,764	46,886	11,722	58,608	27,547	213%	25,943
S-REC	(4,524)	17,285	4,321	21,606	27,547	78%	(10,381)

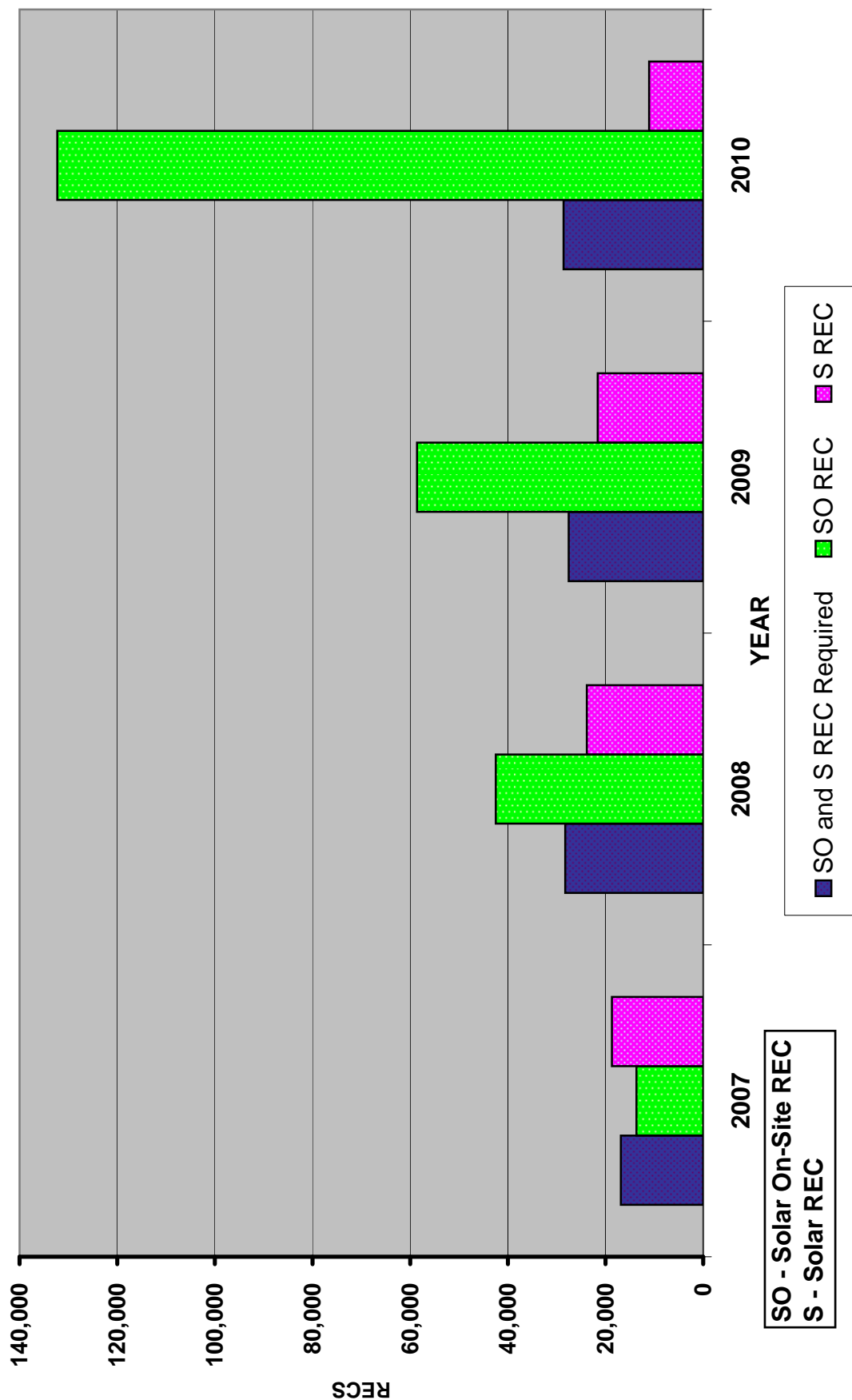
Source: 2010 RES Compliance Plan - Table 4-2 REC COMPLIANCE SUMMARY

2010 REC SUMMARY							
	Pre-2010 Carry Forward	2010 Acquisitions	25% In State Bonus	2010 Actual	2010 Requirement	Actual as % Requirement	2010 Surplus Carry Forward
RECS	8,404,350	3,666,715	901,120	12,972,185	1,430,210	907%	11,541,975
Non-Solar	8,388,788	3,564,481	875,560	12,828,829	1,373,002	934%	11,455,827
Solar	15,562	102,234	25,560	143,356	57,208	251%	86,148
On-Site	25,943	85,060	21,266	132,269	28,604	462%	103,665
S-REC	(10,381)	17,174	4,294	11,087	28,604	39%	(17,517)

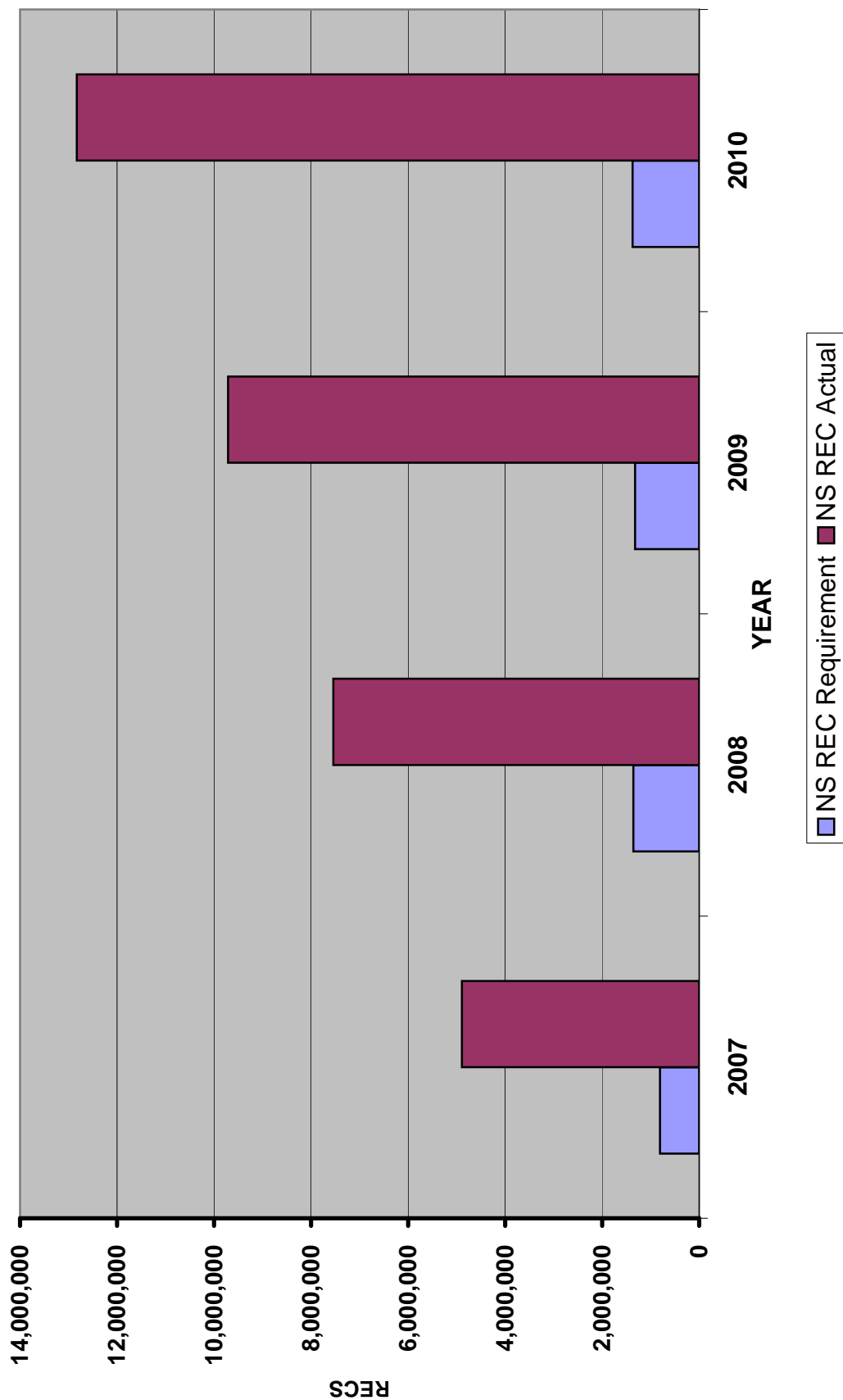
Source: 2010 RES Compliance Plan - Table 4-2 REC COMPLIANCE SUMMARY

COLOR KEY : Below Requirement
 At or Above Requirement

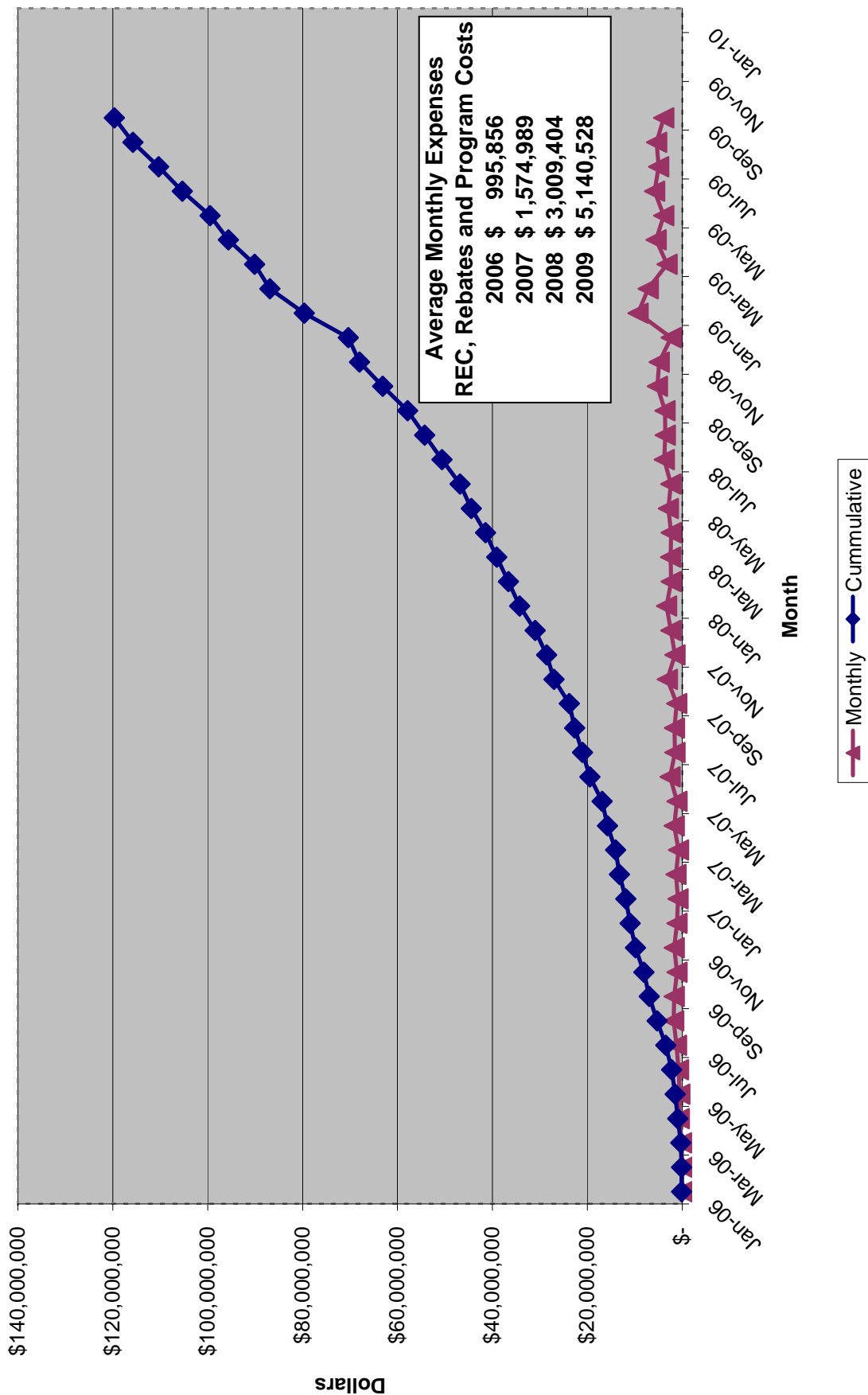
PSCO SOLAR REC REQUIREMENTS AND ACTUAL



PSCO NON SOLAR REC



PSCo RESA SPENDING THROUGH NOVEMBER 2009



BEFORE THE PUBLIC UTILITIES COMMISSION

STATE OF COLORADO

Docket No. 09A-772E

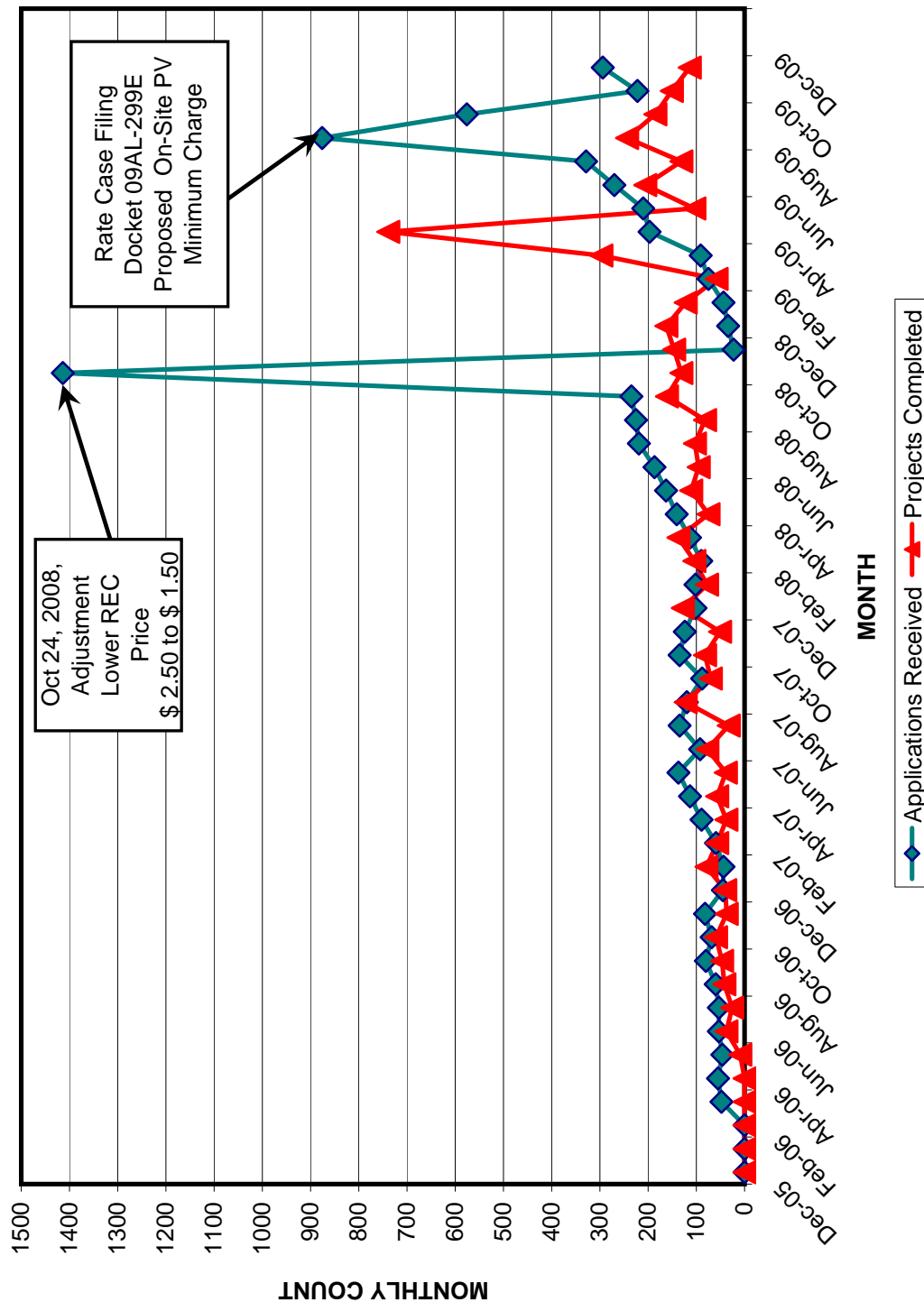
IN THE MATTER OF THE APPLICATION OF PUBLIC SERVICE COMPANY OF
COLORADO FOR APPROVAL OF ITS 2010 RENEWABLE ENERGY STANDARD
COMPLIANCE PLAN

HIGHLY CONFIDENTIAL EXHIBIT WJD-5
(1 Page)

NOTICE OF CONFIDENTIALITY: THIS EXHIBIT IS HIGHLY
CONFIDENTIAL AND HAS BEEN FILED UNDER SEAL PURSUANT TO 4
CCR 723-1100, RULES RELATING TO THE CLAIM OF CONFIDENTIALITY
OF INFORMATION SUBMITTED TO THE COLORADO PUBLIC UTILITIES
COMMISSION.

February 4, 2010

PSCO SOLAR*REWARDS THROUGH NOVEMBER 2009 < 10 kW SYSTEMS



Source Docket 06S-016E Monthly Reports:

In the Matter of the Application of Public)	Fifth Set of Discovery Requests
Service Company of Colorado for an Order)	Of the CPUC Staff - Dalton
Approving its 2010 Renewable Energy Standard)	Served On Public Service Company
Compliance Plan)	
Docket No. 09A-772E		December 30, 2009

DISCOVERY REQUEST NO. CPUC5-27:

Referencing the Direct Testimony of PSCo Witness P. Newell

Page 4, line 1. "Installed at higher price." How many on-site applications were received in 2009 before the September 21, 2009 cut-off and at the \$ 1.50 per REC price? What impact do these applications have on 2010 RESA spending?

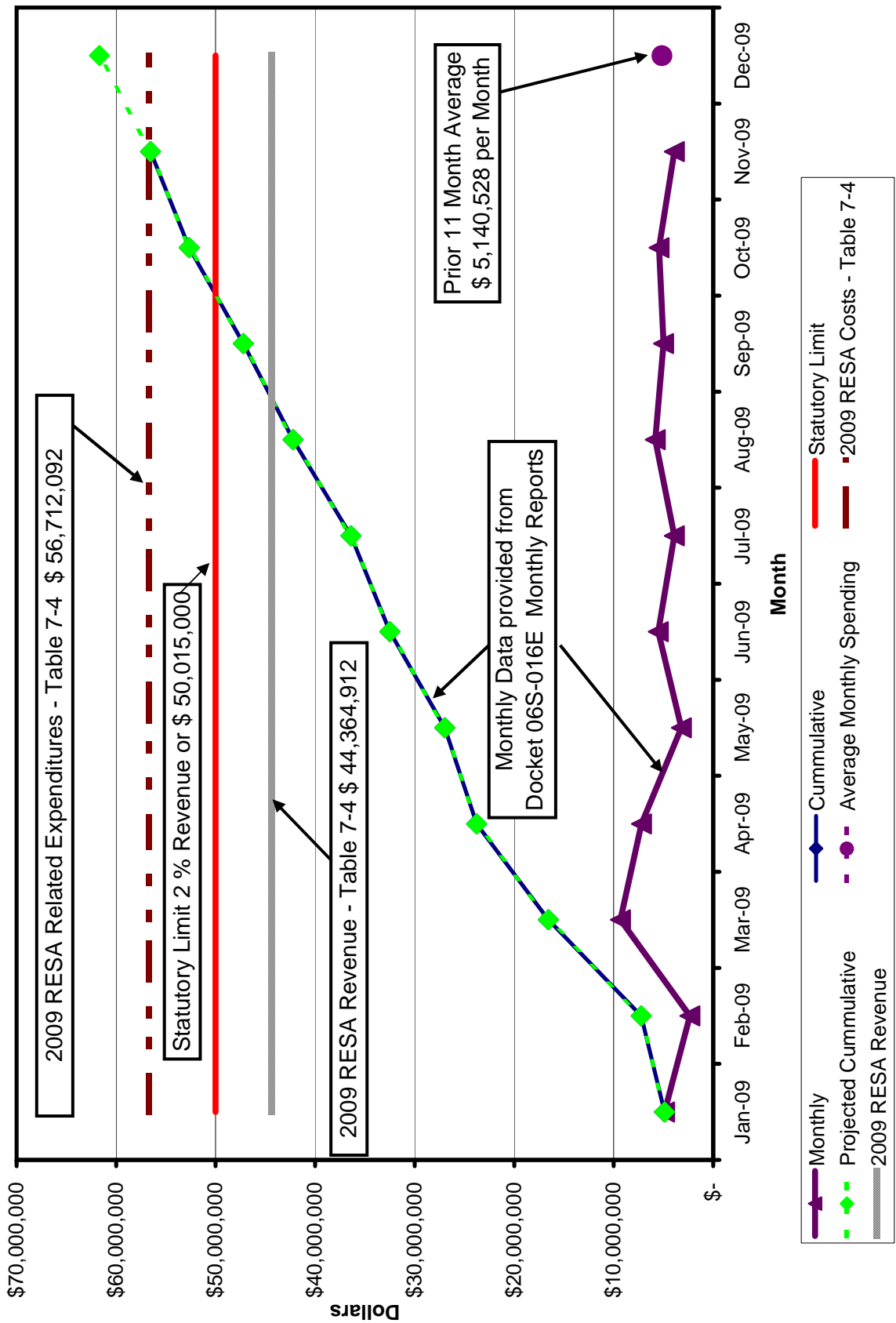
RESPONSE:

2,496 applications are recorded as having been received between 1-01-09 and 09-21-09. Of those, 785 are already completed and the costs accounted for. The potential cost impact of those remaining is between \$14 and \$16 million dollars in upfront payments.

Sponsor: Pam Newell

Response Date: January 13, 2010

PSCo 2009 RESA SPENDING



In the Matter of the Application of Public Service Company of Colorado for an Order Approving its 2010 Renewable Energy Standard Compliance Plan))))	Fourth Set of Discovery Requests Of the CPUC Staff Served On Public Service Company
Docket No. 09A-772E		December 23, 2009

DISCOVERY REQUEST NO. CPUC4-17:

Regarding Application Volume 1, section 7, page 9. “Wind Energy Costs.” Please provide total expected costs and specific wind resource identified in Table 4-3, row 34 “Total Wind” that matched exactly the expected 4,066,763 Wind RECs whose costs are provided for in Tables 7-3 and 7-4. What is the expected cost for each of the listed wind resources for 2009 and 2010? Which Wind resource cost in Table 4-3, row 21 thru 31 is not included in Tables 7-3 and 7-4 Column D?

RESPONSE:

Wind Facility Name	Forecast Cost \$000		Included in RES Tables 7-3 & 7-4 Column D
	2009	2010	
Ponnequin II-VI	\$5,034	\$5,507	Yes
Cedar Creek	\$47,785	\$47,785	No
Colorado Green	\$18,093	\$18,413	No
Foote Creek III	\$4,864	\$4,950	No
Logan	\$26,528	\$27,057	No
Northern Colorado Wind I	\$4,781	\$10,130	No
Northern Colorado Wind II	\$789	\$1,779	No
Peetz Table	\$26,035	\$26,554	No
Ponnequin I	\$678	\$695	Yes
Ridgecrest	\$4,079	\$4,148	Yes
Spring Canyon	\$8,336	\$8,336	No
Twin Buttes	\$10,220	\$10,458	No

Sponsor: Robin Kittel

Response Date: February 1, 2010

In the Matter of the Application of Public)	Fourth Set of Discovery Requests
Service Company of Colorado for an Order)	Of the CPUC Staff
Approving its 2010 Renewable Energy Standard)	Served On Public Service Company
Compliance Plan)	
Docket No. 09A-772E		December 23, 2009

DISCOVERY REQUEST NO. CPUC4-22:

Regarding Application Volume 1, section 8, page 2, “Periodically the incremental costs of the non on-site solar Eligible Energy Resources are trued up by multiplying the actual generation of Eligible Energy Resources by the incremental costs....” Is the incremental cost determined for each resource? How often is the incremental cost determined?

Please provide copies of calculations to determine incremental costs. Is the \$ 20 per ton Carbon adder included in incremental cost determination?

RESPONSE:

The incremental cost will be determined for each Eligible Energy Resource and will be determined in the Compliance Plan on an annual basis if the Company requests the cost to be locked-in for a five year period. For resources where the Company requests the costs to be locked-in for a five year period an annual re-determination of incremental cost will not be provided until the five year period expires. The assumptions for the development of the incremental cost for each resource are consistent with the methodology approved in the latest resource plan and is expected to include the cost of carbon. The cost of carbon in the most recent resource plan was \$20/ton. See Table 7-5 for the incremental cost calculations.

Sponsor: Jim Hill

Response Date: January 25, 2010

In the Matter of the Application of Public)	Fourth Set of Discovery Requests
Service Company of Colorado for an Order)	Of the CPUC Staff
Approving its 2010 Renewable Energy Standard)	Served On Public Service Company
Compliance Plan)	
Docket No. 09A-772E		December 23, 2009

DISCOVERY REQUEST NO. CPUC4-15:

Regarding Application Volume 1, section 7, pages 7 and 8, “[t]o that end, the incremental costs include a simple calculation of the accredited peak capacity of these Eligible Energy Resources times \$4.00/kW-mo. This capacity value is the same value agreed to for the beginning of the resource acquisition period.” Please provide assumptions, calculations and basis for using values and definition of acquisition period.

RESPONSE:

Please refer to Decision C008-0929, page 89, paragraph 292, item b) for the basis to use a \$4/kW-mo capacity credit.

The Wind and Solar accredited capacities are based on the Wind and Solar values determined in the Wind and Solar ELCC (Effective Load Carrying Capability) studies filed with the Commission. The CRP resource acquisition period as defined in Volume 1 of the CRP is 2008-2015.

See Attachment CPUC4-15 for the capacity credit calculation.

Sponsor: Jim Hill

Response Date: January 25, 2010

VAL: SET UP DETAILS:

<On Xcel Energy Letterhead >

<Title: Windsource Colorado Residential>

< Letter Type Code: TBD Something like MKx00?>

<Month, Day, Year>

<Name>

<Address>

<City State ZIP>

Dear <Name>,

Thank you for becoming part of the Windsource® family. It's because of you that this program has become the nation's number one voluntary renewable energy program¹. **None of this would be possible without your commitment and contribution.**

Your commitment to the program leads to real environmental and economic benefits for your community:

- Renewable energy takes advantage of an abundant, inexhaustible natural resource and produces no greenhouse gas emissions or waste.
- Wind energy creates jobs, increased property tax revenue for rural communities, and steady income for landowners who can still use their land for farming and ranching.
- Windsource also contributes to our future energy needs by providing a domestic energy source that is key to the future of our nation.

We are happy to answer any questions you may have about Windsource at **1-800-895-4999**. For additional details about your Windsource Colorado program please see the back of this letter or visit us online at xcelenergy.com/windsource.

Once again, thank you for supporting Windsource.

Sincerely,
Steve Mudd

Windsource Product Portfolio Manager
Xcel Energy

The Green-e Program certifies that Windsource meets the minimum environmental and consumer protection standards established by the non-profit Center for Resource Solutions. For more information on Green-e certification requirements log on to www.green-e.org.

¹ Source: National Renewable Energy Laboratory, 2009 Utility Green Power Program Rankings.