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DOCKET NO. 50804

APPLICATION OF SOUTHWESTERN PUBLIC SERVICE COMPANY TO ADJUST ITS ENERGY EFFICIENCY COST RECOVERY FACTOR § PUBLIC UTILITY COMMISSION OF TEXAS

DIRECT TESTIMONY
of
JEREMY M. LOVELADY

on behalf of

SOUTHWESTERN PUBLIC SERVICE COMPANY

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GLOSSARY OF ACRONYMS AND DEFINED TERMS

<u>Acronym/Defined Term</u>	<u>Meaning</u>
AIP	Annual Incentive Program
Commission	Public Utility Commission of Texas
DSM	Demand-Side Management
EECRF	Energy Efficiency Cost Recovery Factor
EEPR	Energy Efficiency Plan and Report
EM&V	Evaluation, Measurement, and Verification
FERC	Federal Energy Regulatory Commission
kW	Kilowatt
kWh	Kilowatt-hour
MTP	Market-Transformation Program
MW	Megawatt
MWh	Megawatt-hour
Operating Companies	Northern States Power Company, a Minnesota corporation; Northern States Power Company, a Wisconsin corporation; Public Service Company of Colorado, a Colorado corporation; and SPS
PUHCA 1935	Public Utility Holding Company Act of 1935
PURA	Public Utility Regulatory Act
PY	Program Year
R&D	Research and Development
RCE	Rate Case Expense
Rule 25.181	16 Texas Administrative Code § 25.181
Rule 25.182	16 Texas Administrative Code § 25.182
Rule 25.245	16 Texas Administrative Code § 25.245

<u>Acronym/Defined Term</u>	<u>Meaning</u>
SIR	Savings-to-Investment Ratio
SOP	Standard Offer Program
SPS	Southwestern Public Service Company, a New Mexico corporation
Xcel Energy	Xcel Energy Inc.
XES	Xcel Energy Services Inc.

LIST OF ATTACHMENTS

<u>Attachment</u>	<u>Description</u>
JML-1	Calculation of SPS's 2021 Goal with Line Loss Details <i>(Filename: Attachment JML-1.xls)</i>
JML-2	Calculation of Net Benefits, Cost Effectiveness, and Performance Bonus for PY 2019 <i>(Filename: Attachment JML-2.xls)</i>
JML-3	Service Agreement between SPS and XES <i>(Filename: Non-Native Format)</i>
JML-4	Invoices and Receipts of Non-Labor Affiliate Expenses <i>(Filename: Non-Native Format)</i>
JML-5(CD)	Workpapers of Jeremy M. Lovelady <i>(Various files provided on CD)</i>

**DIRECT TESTIMONY
OF
JEREMY M. LOVELADY**

1 **I. WITNESS IDENTIFICATION AND QUALIFICATIONS**

2 **Q. Please state your name and business address.**

3 A. My name is Jeremy M. Lovelady. My business address is 1800 Larimer Street,
4 Denver, Colorado 80202.

5 **Q. On whose behalf are you testifying in this proceeding?**

6 A. I am filing testimony on behalf of Southwestern Public Service Company, a New
7 Mexico corporation (“SPS”) and wholly-owned electric utility subsidiary of Xcel
8 Energy Inc. (“Xcel Energy”). Xcel Energy is a utility holding company that owns
9 several electric and natural gas utility operating companies, a regulated natural
10 gas pipeline company, and three electric transmission companies.¹

11 **Q. By whom are you employed and in what position?**

12 A. I am employed by Xcel Energy Services Inc. (“XES”), the service company
13 subsidiary of Xcel Energy, as Senior Regulatory Analyst in the Policy and
14 Strategy group within the Customer and Innovation organization.

¹ Xcel Energy is the parent company of four wholly-owned electric utility operating companies: Northern States Power Company, a Minnesota corporation; Northern States Power Company, a Wisconsin corporation; Public Service Company of Colorado, a Colorado corporation; and SPS (“Operating Companies”). Xcel Energy’s natural gas pipeline company is WestGas InterState, Inc. Xcel Energy also has three transmission-only operating companies through its subsidiary Xcel Energy Transmission Holding Company, LLC: Xcel Energy Southwest Transmission Company, LLC; Xcel Energy Transmission Development Company, LLC; and Xcel Energy West Transmission Company, LLC, all of which are regulated by the Federal Energy Regulatory Commission (“FERC”).

3 A. As a Senior Regulatory Analyst in the Policy and Strategy group within the
4 Customer and Innovation organization, my responsibilities are to: ensure that
5 Xcel Energy's energy efficiency and demand response programs in Texas, New
6 Mexico, and Colorado adhere to regulatory requirements and policies; track and
7 report on energy efficiency achievements and financial operations for SPS;
8 prepare demand side management ("DSM") regulatory reports and filings; and
9 analyze the cost-effectiveness of energy efficiency and load management
10 programs and portfolios for SPS. I am also responsible for ensuring that proper
11 measurement and verification is being conducted for all programs.

12 Q. Please describe your educational background.

13 A. I graduated from Amarillo College with an Associates of Science degree in
14 Business Administration in 2008 and from Wayland Baptist University with a
15 Bachelor's of Applied Science degree in Business Management in 2011.

16 Q. Please describe your professional experience.

17 A. I began my career as an Associate in Xcel Energy's Customer Contact Center in
18 2008 and held several positions within the Customer Care Organization until
19 December of 2010. I became the Records Specialist for SPS's Regulatory
20 Administration Department in 2011 and was promoted to the job of Regulatory
21 Administrator in 2012. In December 2013, I accepted a Case Specialist position
22 in Regulatory Administration for SPS managing all aspects of regulatory cases.

1 In August 2016, I accepted my current position as a Senior Regulatory Analyst
2 within the Customer and Innovation Department.

3 **Q. Please describe your experience with SPS's energy efficiency programs and**
4 **previous Energy Efficiency Cost Recovery Factor ("EECRF") filings.**

5 A. I have been intimately involved with SPS's past EECRF filings. In particular, I
6 have worked on the calculation of SPS's demand and energy goals, analysis of the
7 success of SPS's energy efficiency programs, reconciliation of SPS's
8 expenditures, planning for SPS's budgets, and overall compilation of SPS's
9 Energy Efficiency Plan and Report ("EEPR") and EECRF filings.

10 **Q. Have you testified or filed testimony before any regulatory authorities?**

11 A. Yes. I have submitted pre-filed testimony on behalf of SPS in the 2018 and 2019
12 EECRF proceedings, Docket Nos. 48324 and 49495.

1 **II. ASSIGNMENT, OVERVIEW, AND SUMMARY OF**
2 **RECOMMENDATIONS**

3 **Q. What is your assignment in this proceeding?**

4 A. I have several assignments in this proceeding. I generally describe Section 39.905
5 of the Public Utility Regulatory Act (“PURA”),² the statute requiring Texas
6 utilities to reduce demand and energy consumption by offering energy efficiency
7 programs to eligible customer classes,³ and provide an overview of 16 Tex.
8 Admin. Code §§ 25.181-182 (“Rule 25.181” and “Rule 25.182,” respectively),
9 the Public Utility Commission of Texas’s (“Commission”) rule implementing the
10 statutory energy efficiency mandate. I also:

- 11 (1) describe the relief sought by SPS in this proceeding and the
12 specific costs included in SPS’s EECRF, as authorized by Rule
13 25.181;
- 14 (2) present and discuss the calculation of the demand and energy
15 efficiency goals that SPS seeks to achieve in Program Year (“PY”)
16 2021;
- 17 (3) quantify the demand and energy amounts associated with industrial
18 customers who have opted out of SPS’s 2021 PY energy efficiency
19 programs in accordance with Rule 25.181(u);
- 20 (4) explain that the costs that SPS seeks to recover through the EECRF
21 are reasonable and consistent with Rule 25.182;
- 22 (5) explain that SPS’s affiliate expenses incurred from XES are
23 reasonable and appropriate for recovery under PURA Section
24 36.058;
- 25 (6) discuss SPS’s Low-Income program expenditures pursuant to Rule
26 25.181(p);

² PURA is codified at Tex. Util. Code Ann. §§ 11.001–66.016.

³ PURA § 39.905.

- (7) discuss SPS's Evaluation, Measurement, and Verification ("EM&V") costs; and
 - (8) discuss the calculation of SPS's performance bonus for 2019 pursuant to Rule 25.182(e).

I also introduce SPS's other witnesses, J. Derek Shockley, Richard M. Luth and Jeremiah W. Cunningham, and I explain the scope of their testimony.

What does Mr. Shockley discuss in his testimony?

Mr. Shockley describes the energy efficiency programs that SPS will offer in PY 2021. He projects the costs of those programs and demonstrates those costs are reasonable. He also sponsors SPS's 2020 Amended EEPR. In addition, Mr. Shockley provides the estimated useful life for each measure in each program, discusses SPS's relationship with energy efficiency service providers, and discusses SPS's energy and demand savings achievements for PY 2019.

What topics does Mr. Luth discuss in his testimony?

Mr. Luth: (1) supports the allocation of costs among rate classes eligible to participate in the energy efficiency programs whose costs are recovered through the EECRF; (2) supports the forecasted PY 2021 billing determinants and the proposed EECRF rate design; (3) demonstrates SPS's compliance with the customer cost caps imposed by Rule 25.182(d)(7); (4) discusses SPS's net over-recovery of EECRF revenues for PY 2019; and (5) sponsors the EECRF tariff rider for PY 2021.

1 **Q. What does Mr. Cunningham address in his testimony?**

2 **A.** Mr. Cunningham describes and supports the reasonableness of SPS's rate case
3 expenses ("RCEs") incurred in preparing, prosecuting, and settling Docket No.
4 49495, its 2019 EECRF application. In particular, he describes the nature and
5 scope of SPS's filing in Docket No. 49495; describes the basis for the RCEs
6 addressed in this docket; and supports the reasonableness of the RCEs being
7 reviewed.

8 **Q. Please summarize the recommendations in your testimony.**

9 **A.** I recommend the Commission find that for PY 2021:

- 10 (1) the programs proposed by SPS are cost-effective;
- 11 (2) the performance bonus earned in 2019 meets the requirements of
12 Rule 25.182(e);
- 13 (3) the affiliate costs are reasonable as set forth under PURA § 36.058;
- 14 (4) the administrative and research and development ("R&D") costs
15 are lower than the caps set forth in Rule 25.181(g);
- 16 (5) the incentives forecasted to be paid are lower than the cap in Rule
17 25.181(f); and
- 18 (6) SPS reasonably anticipates achieving the required demand and
19 energy savings reductions.

20 Based on those findings, I recommend the Commission allow SPS to implement
21 an EECRF rider sufficient to recover \$5,109,615 during PY 2021. That amount
22 includes:

- 1 • SPS's forecasted energy efficiency costs in PY 2021 (including forecasted
2 incentives, R&D, and administrative costs) of \$4,446,560;⁴
- 3 • Projected EM&V expenses for PY 2020 in the amount of \$34,265;
- 4 • \$446,860 net over-recovery, including interest,⁵ of PY 2019 energy
5 efficiency costs;
- 6 • \$26,815 of rate case expenses incurred in Docket No. 49495, SPS's 2019
7 EECRF proceeding; and
- 8 • SPS's performance bonus of \$1,068,832 earned in accordance with Rule
9 25.182(e).

10 **Q. Were Attachments JML-1, JML-2, JML-4, and JML-5(CD) prepared by you
11 or under your direct supervision and control?**

12 A. Yes.

13 **Q. Is Attachment JML-3 a true and correct copy of the documents you
14 represent them to be?**

15 A. Yes.

⁴ \$4,042,696 incentives + \$158,764 program-specific administrative costs + \$205,100 general administrative costs + \$40,000 R&D.

⁵ \$447,241 in net over-recovery + \$19,619 in interest.

1 **III. SUMMARY OF STATUTORY AND RULE-BASED ENERGY**
2 **EFFICIENCY REQUIREMENTS**

3 **Q.** Please provide a brief summary of the energy efficiency requirements in
4 PURA § 39.905.

5 A. PURA § 39.905 requires electric utilities in Texas to offer and administer energy
6 efficiency incentive programs in a market-neutral, non-discriminatory manner.
7 To that end, each utility must provide, through market-based Standard Offer
8 Programs (“SOP”), targeted Market-Transformation Programs (“MTP”), or self-
9 delivered programs, incentives sufficient for:

10 retail electric providers and competitive energy service providers
11 to acquire additional cost-effective energy efficiency, subject to
12 cost ceilings established by the commission, for the utility’s
13 residential and commercial customers, equivalent to:

14 (A) not less than:

15 (i) 30 % of the electric utility’s annual growth in
16 demand of residential and commercial customers by
17 December 31 of each year beginning with the 2013
18 calendar year; and

19 (ii) the amount of energy efficiency to be acquired for
20 the utility’s residential and commercial customers
21 for the most recent preceding year[.]⁶

22 The Legislature further directed the Commission to adopt rules and procedures to
23 ensure that utilities achieve the goals set forth in PURA § 39.905, including:

- 24
- 25 • establishing an EECRF to ensure timely and reasonable cost recovery for
26 utility energy efficiency expenditures;
 - 27 • establishing an incentive under PURA § 36.204 to reward utilities that
28 exceed the minimum energy efficiency goals set forth in PURA § 39.905;

6 PURA § 39.905(a)(3)

- 1 • ensuring that the costs associated with energy efficiency programs and any
2 shareholder bonus awarded for exceptional performance are borne by the
3 customer classes that receive the services under the program; and
4 • ensuring that energy efficiency programs are evaluated, measured, and
5 verified using a framework established by the Commission that promotes
6 effective program design and consistent and streamlined reporting.

7 **Q. Does PURA § 39.905 apply to SPS?**

8 A. Yes. Although Chapter 39 of PURA does not apply to SPS for the most part, a
9 few sections of that chapter have been made applicable to SPS through PURA
10 § 39.402, which applies specifically to SPS. PURA § 39.402(a) expressly
11 requires SPS to comply with PURA § 39.905.

12 **Q. Has the Commission adopted rules implementing the legislative mandates in
13 PURA § 39.905?**

14 A. Yes. Rules 25.181 and 25.182 set forth the framework for utilities' energy
15 efficiency programs, including not only the methods to calculate energy and
16 demand reductions, but also the EECRF mechanism by which utilities can apply
17 to recover costs incurred for energy efficiency programs.

18 **Q. Please summarize the process by which utilities can apply for recovery of
19 energy efficiency costs through the EECRF.**

20 A. Rule 25.182(d) requires a utility to establish an EECRF to timely recover the
21 reasonable costs of providing a portfolio of energy efficiency programs. For a
22 utility that does not recover energy efficiency costs through base rates, the
23 EECRF shall be calculated to recover four things:

- 24 1. the utility's forecasted annual energy efficiency program
25 expenditures;

- 1 2. the preceding year's over- or under-recovery that includes EECRF
2 expenses incurred by the utility in the prior year's EECRF
3 proceeding, including EECRF proceedings expenses;
4
5 3. any performance bonus earned under Rule 25.182(e); and
6
7 4. any EM&V costs allocated to the utility by the Commission.

8
9 A utility that does not offer customer choice, such as SPS, must file its application
10 for an EECRF no later than May 1 of each year. The presiding officer must then
11 set a procedural schedule that will allow the Commission to issue a final order
12 before January 1 of the following year, which is when the new EECRF will take
13 effect.

14 **Q. Does Rule 25.182 prescribe the contents of the application to establish the**
15 **utility's EECRF?**

16 A. Yes. Rule 25.182(d)(10) states that "a utility's application to establish or adjust
17 an EECRF shall include the utility's most recent energy efficiency plan and
18 report, consistent with §25.181(l) and §25.183(d) of this title, as well as testimony
19 and schedules, in Excel format with formulas intact". For both the prior
20 program year and the program year for which the proposed EECRF will be
21 collected, the utility must set forth thirteen categories of information, to the extent
22 they are applicable. In Table JML-1 below, I set forth these thirteen categories
23 and identify where each element of required information is found in SPS's
24 testimony and attachments:

Table JML-1

Rule 25.182(d)(10) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(10)(A)	The utility's forecasted energy efficiency costs.	<i>See:</i> Direct Testimony of J. Derek Shockley at Section IV; Attachment JDS-1 at Section IV; and Direct Testimony of Richard M. Luth at Section IV; Attachment RML-2.
25.182(d)(10)(B)	The actual base rate recovery of energy efficiency costs, adjusted for changes in load and usage subsequent to the last base rate proceeding, with supporting calculations.	SPS does not currently recover energy efficiency costs in base rates. <i>See:</i> Direct Testimony of J. Derek Shockley at Section IV; and Direct Testimony of Richard M. Luth at Section IV.
25.182(d)(10)(C)	The energy efficiency performance bonus that it calculates to have earned for the prior year.	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section IX; and Direct Testimony of Richard M. Luth at Section IV.
25.182(d)(10)(D)	Any adjustment for past over- or under-recovery of energy efficiency revenues, including interest.	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section II; and Direct Testimony of J. Derek Shockley at Attachment JDS-1 at Section XII; and Direct Testimony of Richard M. Luth at Section IV and Attachment RML-2.

Rule 25.182(d)(10) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(10)(E)	Information concerning the calculation of billing determinants for the preceding year and for the year in which the EECRF is expected to be in effect.	<i>See:</i> Direct Testimony of Richard M. Luth at Section VI and Attachment RML-2.
25.182(d)(10)(F)	The direct assignment and allocation of energy efficiency costs to the utility's eligible rate classes, including any portion of energy efficiency costs included in base rates, provided that the utility's actual EECRF expenditures by rate class may deviate from the projected expenditures by rate class, to the extent doing so does not exceed the cost caps in Rule 25.182(d)(7).	<i>See:</i> Direct Testimony of Richard M. Luth at Sections V and VII, and Attachment RML-2.
25.182(d)(10)(G)	Information concerning calculations related to the requirements of Rule 25.182(d)(7).	<i>See:</i> Direct Testimony of Richard M. Luth at Section VII, and Attachment RML-2.
25.182(d)(10)(H)	The incentive payments by the utility, by program, including a list of each energy efficiency administrator and/or service provider receiving more than five percent of the utility's overall incentive payments and the percentage of the utility's incentives received by these providers.	<i>See:</i> Direct Testimony of J. Derek Shockley at Attachment JDS-3(CONF).

Rule 25.182(d)(10) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(10)(I)	The utility's administrative costs, including any affiliate costs and EECRF proceeding expenses and an explanation of both.	<p><i>See:</i> Direct Testimony of Jeremy M. Lovelady at Sections VI -IX; and</p> <p>Direct Testimony of J. Derek Shockley at Attachment JDS-1 at Sections IV; and</p> <p>Direct Testimony of Jeremiah W. Cunningham at Attachment JWC-1 at Sections IV.</p>
25.182(d)(10)(J)	The actual EECRF revenues by rate class for any period for which the utility calculates an under- or over-recovery of EECRF costs.	<p><i>See:</i> Direct Testimony of Richard M. Luth at Sections IV and V, and Attachment RML-2.</p>
25.182(d)(10)(K)	The utility's bidding and engagement process for contracting with energy efficiency service providers, including a list of all energy efficiency service providers that participated in the utility programs and contractors paid with funds collected through the EECRF.	<p><i>See:</i> Direct Testimony of J. Derek Shockley at Section V, and Attachment JDS-3 (CONF).</p>
25.182(d)(10)(L)	The estimated useful life used for each measure in each program, or a link to the information if publicly available.	<p><i>See:</i> Direct Testimony of Jeremy M. Lovelady, Attachment JML-2; and</p> <p>Direct Testimony of J. Derek Shockley at Section VI, Attachment JDS-4.</p>
25.182(d)(10)(M)	Any other information that supports the determination of the EECRF.	<p><i>See:</i> Direct Testimonies of Jeremy M. Lovelady, J. Derek Shockley, Richard M. Luth, and Jeremiah W. Cunningham.</p>

1 In addition, Rule 25.182(d)(11) requires that ten more categories of
2 information be included in the application, as applicable. In Table JML-2, I
3 identify where the subsection (d)(11) items appear in SPS's testimony and
4 attachments.

5

Table JML-2

Rule 25.182(d)(11) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(11)(A)	The costs are less than or equal to the benefits of the programs as calculated in accordance with Rule 25.181(d).	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section V, and Attachment JML-2.
25.182(d)(11)(B)	The program portfolio was implemented in accordance with recommendations made by the Commission's EM&V contractor and approved by the Commission, and the EM&V contractor found no material deficiencies in the utility's administration of energy efficiency programs.	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section IV.
25.182(d)(11)(C)	If a utility is in an area in which customer choice is offered and is subject to the requirements of PURA § 39.905(f), the utility met its targeted low-income energy efficiency requirements.	Not applicable. <i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section IV; and Direct Testimony of J. Derek Shockley at Attachment JDS-1 at Section VIII.
25.182(d)(11)(D)	Existing market conditions in the utility's service territory affected its ability to implement one or more of its energy efficiency programs or affected its costs.	<i>See:</i> Direct Testimony of J. Derek Shockley at Section VII.

Rule 25.182(d)(11) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(11)(E)	The utility's costs incurred and achievements accomplished in the previous year or estimated for the year the requested EECRF will be in effect are consistent with the utility's energy efficiency program costs and achievements in previous years.	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section V; and Direct Testimony of J. Derek Shockley at Section IV; and Attachment JDS-1 at Sections III – VII.
25.182(d)(11)(F)	Changed circumstances in the utility's service area since the Commission approved the utility's budget for the implementation year that affect the ability of the utility to implement any of its energy efficiency programs or its energy efficiency costs.	<i>See:</i> Direct Testimony of J. Derek Shockley at Section VII.
25.182(d)(11)(G)	The number of energy efficiency service providers operating in the utility's service territory affects the ability of the utility to implement any of its energy efficiency programs or its energy efficiency costs.	<i>See:</i> Direct Testimony of J. Derek Shockley at Section V.
25.182(d)(11)(H)	Customer participation in the utility's prior years' energy efficiency programs affects customer participation in the utility energy efficiency programs in previous years or its proposed programs underlying its EECRF request and the extent to which program costs were expended to generate more participation or transform the market for the utility's programs.	<i>See:</i> Direct Testimony of J. Derek Shockley at Sections III, IV and VII.
25.182(d)(11)(I)	The utility's energy efficiency costs for the previous year or estimated for the year the requested EECRF will be in effect are comparable to costs in other markets with similar conditions.	<i>See:</i> Direct Testimony of J. Derek Shockley at Section IV.

Rule 25.182(d)(11) Subsection	Requirement	Location in Testimony and Attachments
25.182(d)(11)(J)	The utility has set its incentive payments with the objective of achieving its energy and demand goals at the lowest reasonable cost per program.	<i>See:</i> Direct Testimony of Jeremy M. Lovelady at Section V; and Direct Testimony of J. Derek Shockley at Sections III and IV.

1 **IV. PY 2021 DEMAND AND ENERGY EFFICIENCY GOALS**

2 **A. Calculation of Demand Savings Goal**

3 **Q. Does Rule 25.181 specify the demand reduction goal that SPS must achieve in
4 PY 2021?**

5 A. Yes. Beginning with the 2013 PY and continuing until the “trigger” in Rule
6 25.181(e)(1)(B) was reached, Rule 25.181(e)(1)(A) required SPS to meet demand
7 reduction goals equal to at least 30% of its annual growth in demand of residential
8 and commercial customers. Rule 25.181(e)(1)(B)’s trigger provides that a utility
9 shall meet Rule 25.181(e)(1)(C)’s demand reduction goal once the utility’s goal
10 under Rule 25.181(e)(1)(A) is equivalent to at least four-tenths of 1% of its
11 summer weather-adjusted peak demand for the combined residential and
12 commercial customers for the previous PY. Under Rule 25.181(e)(1)(C), once
13 Rule 25.181(e)(1)(B)’s trigger is reached and continuing thereafter, a utility shall
14 have a demand reduction goal equal to four-tenths of 1% of its summer weather-
15 adjusted peak demand for the combined residential and commercial customers for
16 the previous PY. In addition, Rule 25.181(e)(3)(B), states that the demand
17 reduction goal under Rule 25.181(e)(1)(C) is calculated by applying the
18 percentage goal to the utility’s summer weather-adjusted five-year average peak
19 demand for the combined residential and commercial customers.

20 **Q. Has SPS met the trigger described in Rule 25.181(e)(1)(B)?**

21 A. Yes, SPS met Rule 25.181(e)(1)(B)’s trigger in 2019. Thus, in accordance with
22 Rules 25.181(e)(1)(B)-(C) and 25.181(e)(3)(B), SPS calculated its demand
23 reduction goal for PY 2021 using four-tenths of 1% of its summer weather-

1 adjusted five-year average (2015-2019) peak demand for the combined residential
2 and commercial customers. This calculation yields a goal metric of 6.027
3 megawatt (“MW”).

4 **Q. Are line losses taken into account when calculating the goal?**

5 A. Yes. SPS applies demand line loss factors when calculating its retail peak shown
6 in Attachment JML-1. SPS’s line loss factors were most recently approved in
7 Docket No. 47527⁷ and are included in Attachment JML-1.

8 **Q. How many industrial customers provided notice to SPS pursuant to Rule
9 25.181(w) to opt out of SPS’s energy efficiency programs for PY 2019?**

10 A. To date, SPS has received qualifying notices from six customers, totaling 831
11 premises for PY 2021. SPS subtracts each opt-out customer premises’ annual
12 peak kilowatt (“kW”) demand contribution for the last five years from the weather
13 normalized Texas retail peak demand to determine SPS’s yearly peak demand
14 growth. Increased opt-outs, depending on their annual peak kW contribution,
15 may reduce SPS’s overall weather normalized Texas retail peak demand in
16 calculating SPS’s yearly demand reduction goal.

⁷ *Application of Southwestern Public Service Company for Authorization to Change Rates*, Docket No. 47527, Order (Dec. 10, 2018).

- 1 Q. **Does SPS believe it will meet its PY 2021 demand reduction goal?**
- 2 A. Yes. SPS projects that it will achieve 10.24 MW in demand reductions in PY
3 2021, which is greater than the minimum demand reduction goal of 6.027 MW.
4 Mr. Shockley explains why SPS expects to achieve more than the minimum goal,
5 and the calculations of these amounts appear in Table 6 of Attachment JDS-1 to
6 his direct testimony.
- 7 Q. **Does Rule 25.181 impose any additional requirements with respect to the
8 demand reduction?**
- 9 A. Yes. Rule 25.181(e)(3)(F) states that the savings achieved through programs for
10 hard-to-reach customers shall be no less than 5% of the utility's statutory demand
11 reduction goal. Therefore, at least 0.3 MW of the 2021 demand reduction goal of
12 6.027 MW must come from hard-to-reach customers ($6.027 \text{ kW} \times 5\% = 300 \text{ kW}$).
- 13 Q. **What is a "hard-to-reach" customer?**
- 14 A. Rule 25.181(c)(27) defines a "hard-to-reach" customer as a residential customer
15 with an annual household income at or below 200% of federal poverty guidelines.
- 16 Q. **Did SPS meet the requirement under Rule 25.181(e)(3)(F) for hard-to-reach
17 customers in 2019 and does it project to meet it in 2021?**
- 18 A. Yes. SPS met the requirement by achieving 0.691 MW or 13% of the 2019 goal
19 of 5.495 MW through programs for hard-to-reach customers. In 2021, SPS
20 projects to achieve 0.650 MW or 11% of the proposed goal of 6.027 MW through
21 programs for hard-to-reach customers.

- 1 **B. Calculation of Energy Savings Goal**
- 2 **Q. Does Rule 25.181 also specify the amount of energy savings that a utility must**
- 3 **achieve?**
- 4 A. Yes. Rule 25.181(e)(4) provides that a utility “shall administer a portfolio of
- 5 energy efficiency programs designed to meet an energy savings goal calculated
- 6 from its demand savings goal, using a 20% conservation load factor.” To
- 7 implement that calculation, the utility must multiply its demand reduction goal
- 8 times 8,760 (the number of hours in a year) and then multiply the product by 20%
- 9 to determine the number of megawatt-hours (“MWh”) of energy savings. Thus,
- 10 in SPS’s case, the minimum energy savings goal is the following:

$$6.027 \text{ MW} \times 8,760 \text{ h} = 52,507 \text{ MWh} \times 20\% = 10,559 \text{ MWh}$$

- 12 **Q. Does SPS believe it will meet its PY 2021 minimum energy savings goal?**
- 13 A. Yes. SPS forecasts that it will achieve energy savings of 24,682 MWh in PY
- 14 2021, which is greater than the minimum goal of 10,559 MWh, due to the mix of
- 15 energy and demand savings achievable through the programs. Some programs,
- 16 such as the Large Commercial SOP deliver high energy savings, but deliver
- 17 minimal demand savings based on the measures incented in the program.
- 18 Conversely, the Load Management SOP only provides demand savings and
- 19 minimal energy savings. In developing its programs as presented in SPS’s
- 20 Amended 2020 EEPR, provided as Attachment JDS-1 to Mr. Shockley’s direct
- 21 testimony, SPS attempted to maintain a balance of programs that will provide
- 22 eligible customers with multiple options for participation and ensure that both
- 23 energy and demand goals are met.

1 Q. **Do SPS's Low-Income PY 2021 budgeted costs meet the minimum 10%**
2 **spending requirement in Rule 25.181(p), even though SPS is not subject to**
3 **that section because it is not an unbundled transmission and distribution**
4 **utility?**

5 A. Yes. Rule 25.181(p)(1) states that each unbundled transmission and distribution
6 “utility shall ensure that annual expenditures for the targeted low-income energy
7 efficiency program are not less than 10% of the utility’s energy efficiency budget
8 for the program year.” SPS’s budgeted incentive amount for its Low-Income
9 programs in PY 2021 is \$450,000, which is greater than 10% of the total portfolio
10 budget amount of \$4,480,825 (including EM&V).

11 Q. **Did SPS's Low-Income expenditures for 2019 meet the minimum 10%**
12 **spending standard in Rule 25.181(p)?**

13 A. Yes, in 2019 SPS spent 10% of its forecasted budget on low-income programs, as
14 shown in Table 12 in Attachment JDS-1 to Mr. Shockley’s direct testimony.

15 C. **Program Modifications to Meet PY 2021 Goals**

16 Q. **Is SPS proposing any modifications or additions to its programs to meet its**
17 **PY 2021 goals?**

18 A. No.

19 Q. **Does Rule 25.182 require the utility's portfolio to reflect recommendations**
20 **from the independent EM&V evaluator?**

21 A. Yes. Rule 25.182(d)(11)(B) requires that the utility’s portfolio be implemented in
22 accordance with the recommendations made by the Commission’s EM&V
23 contractor and that there are no material deficiencies in the utility’s administration

1 of its portfolio. SPS's 2020 and 2021 program portfolios use the most recently
2 published and approved Technical Reference Manual, which is the primary source
3 for all deemed savings values.

ENERGY EFFICIENCY AND LOAD MANAGEMENT PROGRAM COST-EFFECTIVENESS

3 Q. What does Rule 25.181 require with respect to cost effectiveness of a utility's
4 energy efficiency programs?

5 A. An energy efficiency program is deemed to be cost-effective if the cost of the
6 program to the utility is less than or equal to the benefits of the program.⁸

7 Q. What costs can be included in the cost-benefit analysis?

8 A. The costs of a program include the “cost of incentives, EM&V contractor costs,
9 any shareholder bonus awarded to the utility, and actual or allocated R&D and
10 administrative costs.”⁹

11 Q. How does Rule 25.181 define benefits?

12 A. The benefits of the program consist of the present value of the demand reductions
13 and energy savings, measured in accordance with the avoided costs prescribed in
14 Rule 25.181(d), over the projected life of the measures installed under the
15 program.

16 Q. How are the avoided costs of capacity and energy that you just mentioned
17 measured?

18 A. For 2019, the avoided cost of capacity was set at \$80 per kW-year and the
19 avoided cost of energy was set at \$0.050840 per kilowatt-hour (“kWh”). For
20 2020, the avoided cost of capacity was set at \$80 per kW-year and the avoided
21 cost of energy was set at \$0.113660 per kWh. Pursuant to Rule 25.181(d)(2)(A)

⁸ Rule 25.181(d).

⁹ Rule 25.181(d)(1)

1 avoided costs of capacity and energy for 2021 will be calculated by November 15,
2 2020.

3 Q. Apart from the general guideline that the costs cannot exceed the benefits,
4 does Rule 25.181 prescribe any more specific standards to compare the costs
5 and benefits?

6 A. Yes. Subsection (f) provides that the incentive payments for each customer class
7 shall not exceed 100% of avoided costs.

8 Q. Are the incentive costs projected to be lower than the avoided costs in PY
9 2019?

10 A. Yes. SPS has forecasted an incentive budget of \$4.042 million in PY 2021, as
11 shown in Table 7 of Attachment JDS-1 to Mr. Shockley's direct testimony. In
12 contrast, Attachment JML-2 demonstrates that the total portfolio avoided cost for
13 2019 is approximately \$15.120 million. Therefore, the incentive costs are
14 projected to be lower than the avoided costs.

15 Q. Has SPS set the incentive payments with the objective of achieving its energy
16 and demand goals at the lowest reasonable cost per program?

17 A. Yes. Mr. Shockley discusses the determination of incentives in more detail.

18 Q. Why does SPS compare the forecasted 2021 incentives to the actual 2019
19 portfolio benefits?

20 A. This comparison uses the best information available at the time of this filing.
21 Portfolio benefits for 2021 are not currently known because the avoided costs for
22 2021 are unknown and the estimated useful lives for measures implemented in
23 2021 are not known. Even if avoided cost values for 2021 are expected to be less

1 than the avoided cost values in 2019, SPS has a significant margin to ensure cost
2 effectiveness.

3 **Q. Overall, was the portfolio of programs for 2019 cost effective?**

4 A. Yes. An overall program benefit-cost ratio of 1.0 or greater is considered cost-
5 effective. For 2019, SPS's portfolio of programs produced a benefit-cost ratio of
6 3.41 as shown in Attachment JML-2. Thus, in 2019, all programs were cost-
7 effective.

8 **Q. Are exceptions to the cost-effectiveness standard provided for some
9 programs?**

10 A. Yes. SPS's Low-Income Weatherization program and the Retro-Commissioning
11 MTP have different requirements. The Low-Income Weatherization program is
12 evaluated for cost-effectiveness utilizing the Savings-to-Investment Ratio
13 ("SIR"), consistent with Rule 25.181(p)(2) and the settlement in Docket No.
14 40293, a previous SPS EECRF proceeding.¹⁰ Pursuant to Rule 25.181(i), MTPs
15 such as the Retro-Commissioning MTP may demonstrate cost effectiveness over a
16 period greater than one year.

¹⁰ The SIR ratio is the ratio of the present value of a customer's estimated lifetime electricity cost savings from energy efficiency measures to the present value of the installation costs, inclusive of any incidental repairs, of those energy efficiency measures.

1 **VI. REASONABLENESS OF 2019 ENERGY EFFICIENCY PROGRAMS**
2 **COSTS**

3 **Q. What expense did SPS incur for energy efficiency programs in PY 2019?**

4 A. As shown in Table 11 of Attachment JDS-1, in PY 2019, SPS incurred
5 \$3,850,714 in program-related costs, compared to a budget of \$4,126,865.

6 **Q. Did SPS achieve its demand and energy savings goals for PY 2019?**

7 A. Yes. For 2019, SPS's Commission-established demand and energy savings goals
8 were 5.495 MW and 9,627 MWh, respectively. SPS achieved savings of 9.573
9 MW and 23,327 MWh, as shown in Table 9 of Attachment JDS-1, or 174% of the
10 demand goal and 242% of the energy goal.

11 **Q. Were the expenses incurred by SPS for PY 2019 reasonable and cost
12 effective?**

13 A. Yes. The PY 2019 EECRF expenses satisfy the cost-effectiveness standard under
14 Rule 25.181(d). As noted above, a benefit-cost ratio of 1.0 or greater is
15 considered cost-effective, and for PY 2019, the benefit-cost ratio was 3.41 as
16 shown in Attachment JML-2.

17 **Q. Did SPS comply with the cost caps for administrative costs and R&D costs
18 individually and collectively for PY 2019?**

19 A. Yes.

20 **Q. Explain further how SPS calculated the cost caps for administrative costs
21 and R&D costs individually and collectively.**

22 A. Pursuant to Rule 25.181(g) the administration cost cap "shall not exceed 15% of a
23 utility's total program costs" while the R&D cap "shall not exceed 10% of a
24 utility's total program costs for the previous program year." Therefore, SPS has

1 interpreted this portion of the rule to mean that the administrative cost cap is
2 calculated as the total administrative expenditures from PY 2019 divided by the
3 total program expenditures for PY 2019; whereas, the R&D cap is calculated as
4 the total R&D costs for PY 2019 divided by the total programs expenditures from
5 PY 2018.

6 Furthermore, Rule 25.181(g) requires that “[t]he cumulative cost of
7 administration and research and development shall not exceed 20% of a utility’s
8 total program costs.” Therefore, SPS has calculated this value by dividing the
9 total PY 2019 administrative and R&D expenditures by the total PY 2019
10 expenditures. Table JML-3 shows the administrative and R&D expenditures
11 versus the applicable PY total costs used to calculate the caps:

12 **Table JML-3: PY 2019 Cost Cap Compliance**

Cost Type	PY 2019 Costs	PY 2019 Total Costs	PY 2018 Total Costs	Percentage of Total Spend	Allowed Percentage 25.181(i)
Administration ¹¹	\$323,218	\$3,850,714	N/A	8.39%	15%
R&D	\$16,086	N/A	\$3,874,058	.42%	10%
Total Administration and R&D	\$339,304	\$3,850,714	N/A	8.81%	20%

13 **Q. For PY 2019, did the incentive payments for the portfolio exceed 100% of
14 avoided costs?**

15 **A.** No. Attachment JML-2 shows that incentive costs for PY 2019 were
16 approximately \$3.477 million. In contrast, the total estimated portfolio net benefit

¹¹ PY 2019 costs include direct program administration, general program administration, and EECRF proceeding expenses.

1 for PY 2019 was approximately \$10.688 million. Expressed as a percentage, the
2 incentive costs for PY 2019 were approximately 32% of the total benefits.

3 **Q. For PY 2019, did the incentive payments by class exceed 100% of avoided
4 costs by class?**

5 A. No. As shown in Table JML-4, incentive costs by the Commercial customer or
6 Residential customer class are well below the total avoided costs by customer
7 class.

8 **Table JML-4: PY 2019 Cost Cap Compliance**

Customer Class	Total Incentive	Total Avoided Cost
Residential	\$1,793,323.61	\$6,952,918
Commercial	\$1,683,821.79	\$8,167,644
Total	\$3,477,145.40	\$15,120,562

1 **VII. REASONABLENESS OF AFFILIATE EXPENSES**

2 **Q. Please describe PURA § 36.058.**

3 A. PURA § 36.058(a) provides that, except as provided by Subsection (b), the
4 regulatory authority may not allow as capital cost or as expense a payment from
5 an affiliate for “(1) the cost of a service, property, right, or other item; or (2)
6 interest expense.” PURA § 36.058 (b) provides that the “regulatory authority may
7 allow a payment described in Subsection (a) only to the extent that the regulatory
8 authority finds the payment is reasonable and necessary for each item or class of
9 items as determined by the commission.”

10 PURA § 36.058 (c) lists items that must be included in a finding under
11 Subsection (b). In particular, Subsection (c) requires a specific finding of the
12 reasonableness and necessity of each item or class of items allowed and a finding
13 that the price to the electric utility is not higher than the prices charged by the
14 supplying affiliate for the same item or class of items. PURA § 36.058 (d), (e),
15 and (f) provide additional direction for findings regarding an affiliate transaction.

16 **Q. In general, does SPS incur costs from an affiliate to manage its energy
17 efficiency programs?**

18 A. Yes. SPS incurs costs for services XES provides for developing and managing
19 energy efficiency and load management programs for SPS, and performing
20 regulatory compliance and performance assessments for SPS’s customer
21 programs.

1 Q. What amount of affiliate costs did SPS incur related to its programs under
2 Rule 25.181 in 2019?

3 A. In 2019, SPS incurred \$151,499.92 in affiliate expenses. Those expenses include
4 labor expenses and labor loadings as well as non-labor expenses such as travel
5 expenses unrelated to the EECRF filing.

Table JML-5

Affiliate Expenses	Total
Labor and Loading Expenses	\$142,628.95
Non-Labor Expenses	\$8,870.87
Total Affiliate Expenses	\$151,499.92

7 Q. Has SPS removed Annual Incentive Program (“AIP”) costs related to 2019
8 from the affiliate expenses listed above?

9 A. No. The amount presented in the table above does not remove AIP expenses.

10 Q. Has SPS nevertheless removed AIP expenses from the requested amount in
11 this proceeding?

12 A. Yes. Consistent with Commission precedent, SPS has removed \$3,041 in AIP
13 expenses associated with financially based measures. In total, the amount of AIP
14 included in SPS's reconciliation of PY 2019 costs is \$5,762 (Texas retail). Thus,
15 the total affiliate expense SPS seeks recovery of in this EECRF filing is
16 \$151,499.42 minus \$3,041 of AIP expense, or \$148,458.42.

1 Q. Are any of the services XES provides to SPS related to its energy efficiency
2 and load management programs duplicated elsewhere in XES or in any other
3 Xcel Energy subsidiary, such as SPS itself?

4 A. No. Within XES, none of the services provided for the energy efficiency and load
5 management programs are duplicated elsewhere. No other Xcel Energy
6 subsidiary performs these services. In addition, SPS does not perform these
7 services for itself.

8 Q. Do SPS and its Texas retail customers benefit from the services XES provides
9 for the energy efficiency and load management programs?

10 A. Yes. The portfolio management services provided by XES employees offer a
11 number of benefits to SPS, specifically through specialized expertise, economies
12 of scale and scope. In lieu of SPS employing energy efficiency program and
13 administrative support personnel, XES employs personnel to manage similar
14 energy efficiency programs for Xcel Energy's Operating Companies. In addition
15 to the economies of scale, SPS receives the benefits of the economies of scope
16 provided by XES personnel. Since XES personnel manage energy efficiency
17 program portfolios in numerous jurisdictions, they are able to transfer knowledge
18 gained in other jurisdictions to SPS's energy efficiency programs at no additional
19 charge to SPS.

20 Q. Are these costs reasonable and necessary?

21 A. Yes. These costs are reasonable because they consist primarily of reasonable
22 labor costs, and are subjected to rigorous budgeting and cost-control processes.
23 In particular, the labor costs are from XES employees, who perform duties for all

1 Operating Companies, thus, allowing SPS to avoid hiring full-time employees
2 solely for managing its energy efficiency and load-management programs.
3 Furthermore, all of the XES affiliate expenses are directly charged to SPS for its
4 energy efficiency programs, rather than allocated to SPS. Thus, the expenses
5 assigned to SPS for XES employees' services reflect work exclusively undertaken
6 for SPS's Texas energy efficiency programs.

7 **Q. Are the prices charged to SPS by XES higher than the prices charged by**
8 **XES to Xcel Energy's other affiliates?**

9 A. No. At the time Xcel Energy was formed in 2000, registered holding companies
10 such as Xcel Energy were regulated by the Securities and Exchange Commission
11 under the Public Utility Holding Company Act of 1935 ("PUHCA 1935") and
12 were permitted to form and operate service companies to provide common
13 administrative and management services, at cost, to utility operating companies
14 and affiliates within the holding company system. Although PUHCA 1935 was
15 repealed in 2005, XES continues to provide its services to SPS "at cost." The
16 FERC, under PUHCA 2005, allows the continuation of centralized service
17 companies that use the "at cost" standard for billing. The FERC allows "at cost"
18 pricing from service companies to public utilities, stating, "we will apply a
19 presumption that 'at cost' pricing of the non-power goods and services they
20 provide to public utilities within their holding company systems is reasonable."¹²

21 XES has the same obligation to charge for its services "at cost" to the other

¹² FERC Docket No. RM05-32-000, Order No. 667, ¶ 14.

1 Operating Companies. Thus, XES charges SPS and the other Operating
2 Companies the same (i.e., its costs for providing energy efficiency and other
3 services).

4 **Q. In addition to the requirements and regulations listed above, is there other**
5 **documentation to support that XES charges SPS and the other Operating**
6 **Companies the same for the services it provides?**

7 A. Yes. XES charges SPS for services it provides (including energy efficiency
8 labor) per the terms of the Service Agreement between XES and SPS. The
9 Service Agreement is a high-level agreement that describes the services provided
10 to SPS by XES (the billing and payment information, the terms of the agreement,
11 the limitation of liability and indemnification, and miscellaneous information). A
12 copy of the Service Agreement between XES and SPS is provided as Attachment
13 JML-3. XES has similar service agreements with all of the Xcel Energy
14 Operating Companies. The substance of all XES Service Agreements contents
15 are the same; only the parties to the agreements differ.

16 The Service Agreement incorporates the “at cost” pricing for XES’
17 services – thus, XES is contractually bound to charge SPS and the other Operating
18 Companies the same for the services. Thus, the charges from XES for its services
19 to SPS are no higher than the charge by XES to any other entity for the same or
20 similar service, and the costs reasonably approximate the affiliate’s cost to
21 provide the service.

1 Q. **Is there any objective evidence that supports your opinion that the costs of
2 XES are reasonable?**

3 A. Yes. As Table JML-5 above illustrates, the majority of costs are for labor of XES
4 employees. As part of SPS's most recent base rate case in Texas (Docket No.
5 49831), SPS witness Michael T. Knoll provided a study (i.e., the 2018 Willis
6 Towers Watson Compensation Study total cash compensation study) that
7 demonstrates Xcel Energy's total cash compensation is comparable to all other
8 utilities and slightly behind the compensation offered by similarly sized utilities.

9 In Table JML-6, I have replicated a table from Mr. Knoll's Direct Testimony that
10 summarizes the results of the 2018 Willis Towers Watson Compensation Study.

11 **Table JML-6**

Components of Xcel Energy Compensation	Compared to Base Salaries and Incentive Compensation of Utilities with Similar Revenues (Revenue Sample)	Compared to Base Salaries and Incentive Compensation of Utilities Across the Nation (National Sample)
Base Salary Only	Below Market by 11.8%	Below Market by 15.3%
Target Total Cash Compensation (Base Salary + Target Incentive)	Above Market by 3.1%	Below Market by 1.0%

1 Q. **Do those costs meet the requirements for affiliate expenses in PURA**
2 **§ 36.058?**

3 A. Yes. As described above, the costs SPS incurs from XES related to management
4 of its energy efficiency program portfolio are reasonable and necessary and are
5 not priced higher than the prices charged by XES for the same or similar service
6 to its other affiliates. Additionally, SPS does not provide these services for itself,
7 and the services do not duplicate services provided by other affiliates.

8 Q. **How are affiliate costs charged to SPS for the energy efficiency program?**

9 A. Affiliate costs are direct charged to work orders designed to record the costs for
10 managing the energy efficiency and load management programs.

11 Q. **Is there any cross-subsidization of energy efficiency services provided by**
12 **XES to SPS?**

13 A. No. Cross-subsidization cannot occur because SPS does not pay, through XES
14 charges, for energy efficiency program costs of other Xcel Energy Operating
15 Companies. The PY 2019 XES labor costs were not allocated to SPS, but were
16 directly charged (or direct assigned) to SPS. The direct assignment (or direct
17 charging) of the XES energy efficiency labor costs to SPS was done because the
18 XES employee(s) performed work during those hours exclusively for SPS's Texas
19 energy efficiency programs.

20 Q. **You noted above that there was \$8,870.87 in non-labor affiliate expenses.**

21 **What types of activities does that amount relate to?**

22 A. This figure accounts for travel and employee reimbursement expenses. Travel
23 costs include expenses incurred by XES employees to attend the Energy

1 Efficiency Implementation Project meetings, program administration meetings,
2 and licensing and professional fees. Employee reimbursement expenses include
3 costs for mileage for personal vehicle use and reimbursements for use of a
4 personal cell phone for business purposes. Receipts for non-labor affiliate
5 expenses are attached to my testimony as Attachment JML-4.

6 **Q. Are any of the costs for PY 2021 forecasted to be affiliate costs?**

7 A. Yes. SPS expects that of the \$205,100 in forecasted general administration costs,
8 the majority are likely to be affiliate costs. Similarly, some of the program
9 administrative costs will likely be affiliate costs.

VIII. PERFORMANCE BONUS

2 Q. Please summarize the rule provisions governing performance bonuses.

3 A. Rule 25.181(e) provides that a utility that exceeds its demand and energy
4 reduction goals at a cost that does not exceed the cost caps in Rule 25.182(d)(7)
5 "shall be awarded a performance bonus calculated in accordance with this
6 subsection." The purpose of the performance bonus is to incent the utility to
7 achieve successful energy efficiency programs by allowing the utility to receive a
8 share of the net benefits realized in meeting its demand reduction goal.

9 Q. Is SPS seeking recovery of a performance bonus in this case?

10 A. Yes. SPS exceeded its Commission-approved demand goal in PY 2019 and,
11 therefore, is eligible to recover a performance bonus in this EECRF.

12 Q. What is the calculated performance bonus SPS has earned?

13 A. The bonus is \$1,068,832. The calculation of the bonus is included as Attachment
14 JML-2.

15 Q. Did SPS request a good cause exception in arriving at its Commission-
16 approved demand goal for PY 2019?

17 A. No. The demand goal for PY 2019 complied with Rule 25.181(e)(1)(D).

18 Q. Does this conclude your prefiled direct testimony?

19 A. Yes.

AFFIDAVIT

STATE OF COLORADO)
)
COUNTY OF DENVER)

JEREMY M. LOVELADY, first being sworn on his oath, states:

I am the witness identified in the preceding prepared direct testimony. I have read the testimony and the accompanying attachments and am familiar with their contents. Based upon my personal knowledge, the facts stated in the testimony are true. In addition, in my judgment and based upon my professional experience, the opinions and conclusions stated in the testimony are true, valid, and accurate.



Jeremy M. Lovelady
JEREMY M. LOVELADY

Subscribed and sworn to before me this 27 day of April, 2020 by JEREMY M. LOVELADY.



Lori Kristen Howell
Notary Public, State of Colorado

My Commission Expires: 3-27-24

LORI KRISTEN HOWELL Notary Public State of Colorado Notary ID # 20204011760 My Commission Expires 03-27-2024
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CERTIFICATE OF SERVICE

I certify that on May 1, 2020, this instrument was filed with the Public Utility Commission of Texas, and a true and correct copy of it was served on the Staff of the Public Utility Commission of Texas by hand delivery, Federal Express, regular first class mail, certified mail, or facsimile transmission.



Vicki Spark

Southwestern Public Service Company

Goal Calculation

Data converted to Meter (required for EEPR)																		
Demand Line Loss Factor	Calenda r Year	Peak Demand (MW) @ Meter				Energy Consumption (MWh) @ Meter				Growth (MW)	Average Growth (MW) ⁵	Demand Goal	Energy Goal					
		Total System		Residential & Commercial		Opt Outs	Total System		Residential & Commercial									
		Actual	Actual Weather Adjuste d	Actual	Actual Weather Adjuste d	Actual	Actual	Actual Weather Adjusted	Actual									
9.70%	2008	2,336	2,338	1,530	1,531	0	14,143,864	14,198,484	7,668,155	7,717,744	27	0	NA	NA				
	2009	2,341	2,313	1,567	1,542	46	13,920,045	13,932,332	7,371,821	7,382,989	-36	0	NA	NA				
	2010	2,318	2,332	1,541	1,549	36	14,175,553	14,110,580	7,512,089	7,452,380	18	23	NA	NA				
Energy Line Loss Factor	2011	2,278	2,252	1,607	1,581	45	14,054,830	13,730,734	7,963,150	7,639,055	23	3	NA	NA				
	2012	2,379	2,278	1,704	1,603	55	13,880,058	13,721,135	7,748,839	7,589,916	12	7	NA	NA				
	2013	2,229	2,190	1,496	1,475	73	13,994,646	13,859,306	7,764,906	7,629,565	-146	10	NA	NA				
7.88% not tied in - data provided @ Meter	2014	2,263	2,255	1,545	1,537	50	14,061,579	14,038,723	7,712,573	7,689,717	85	9	NA	NA				
	2015	2,172	2,238	1,461	1,527	47	14,032,058	14,004,866	7,621,821	7,594,628	-7	-26	-7.75	-13,576				
	2016	2,257	2,212	1,559	1,514	39	13,958,248	13,905,333	7,498,352	7,445,437	-5	-2	-0.48	-845				
	2017	2,225	2,198	1,513	1,485	43	13,844,659	13,912,071	7,358,371	7,425,783	-33	-7	-1.97	-3,446				
	2018	2,333	2,318	1,669	1,654	46	14,297,147	14,100,463	7,723,000	7,526,316	166	-12	-3.64	-6,385				
	2019	2,242	2,267	1,537	1,561	34	14,037,836	13,944,983	7,465,519	7,372,666	-80	-21	-6.33	-11,087				
	2020	NA	NA	NA	1,571	NA	NA	NA	NA	7,664,093	43	41	5.99	10,502				
	2021	NA	NA	NA	1,566	NA	NA	NA	NA	7,646,325	-5	8	2.44	4,278				
	2022	NA	NA	NA	1,565	NA	NA	NA	NA	7,637,533	-1	18	5.47	9,590				
	2023	NA	NA	NA	1,565	NA	NA	NA	NA	7,631,204	0	18	5.46	9,570				
	2024	NA	NA	NA	1,567	NA	NA	NA	NA	7,624,542	1	25	6.27	10,987				
	2025	NA	NA	NA	1,565	NA	NA	NA	NA	7,622,625	-2	-9	-2.59	-4,534				
	2026	0	0	0	0	0	0	0	0	0	0	0	0	0				
	2027	0	0	0	0	0	0	0	0	0	0	0	0	0				
	2028	0	0	0	0	0	0	0	0	0	0	0	0	0				

Southwestern Public Service Company

Goal Calculation

Updated based on "Texas Peak Demand Sales for DSM filing (03/24/2020)"

Table 4: Annual Growth in Demand and Energy Consumption (at Source)

Calendar Year		Peak Demand (MW) @ Source					Energy Consumption (MWh) @ Source				Growth (MW)	Average Growth (MW) ⁵
		Total System		Residential & Commercial		Opt-Outs	Total System		Residential & Commercial			
		Actual	Actual Weather Adjusted	Actual	Actual Weather Adjusted	Actual Weather Adjusted	Actual	Actual Weather Adjusted	Actual	Actual Weather Adjusted	Actual Weather Adjusted	Actual Weather Adjusted
2008		2,587	2,589	1,694	1,696	-	15,354,265	15,413,559	8,324,379	8,378,211	30	0
2009		2,592	2,561	1,735	1,707	51	15,111,292	15,124,630	8,002,685	8,014,809	-40	0
2010		2,567	2,582	1,707	1,716	40	15,388,666	15,318,133	8,154,957	8,090,138	19	25
2011		2,522	2,494	1,779	1,750	49	15,257,611	14,905,780	8,644,619	8,292,788	26	4
2012		2,634	2,523	1,887	1,775	61	15,067,883	14,895,359	8,411,968	8,239,445	13	7
2013		2,468	2,425	1,656	1,633	81	15,192,277	15,045,354	8,429,409	8,282,487	-162	11
2014		2,506	2,497	1,711	1,702	55	15,264,939	15,240,127	8,372,599	8,347,787	94	10
2015		2,405	2,478	1,618	1,691	52	15,232,891	15,203,372	8,274,080	8,244,560	-8	-29
2016		2,499	2,449	1,727	1,677	43	15,152,764	15,095,321	8,140,045	8,082,601	-5	-2
2017		2,464	2,434	1,675	1,645	47	15,029,455	15,102,635	7,988,084	8,061,265	-36	-7
2018		2,583	2,567	1,848	1,832	51	15,520,665	15,307,149	8,383,917	8,170,402	184	-13
2019		2,483	2,510	1,702	1,729	37	15,239,163	15,138,364	8,104,402	8,003,603	-89	-23
2020		NA	NA	-	1,740	-	NA	NA	NA	8,319,969	48	46
2021		NA	NA	-	1,735	-	NA	NA	NA	8,300,681	-5	9
2022		NA	NA	-	1,733	-	NA	NA	NA	8,291,136	-1	20
2023		NA	NA	-	1,733	-	NA	NA	NA	8,284,265	0	20
2024		NA	NA	-	1,735	-	NA	NA	NA	8,277,034	2	27
2025		NA	NA	-	1,733	-	NA	NA	NA	8,274,952	-2	-10

Southwestern Public Service Company

Goal Data

	Peak Demand at the Source				Peak Demand at the Meter				Sales at the Meter				Calculations						30% DG Energy Savings Goal (MWh)		4/1 of 1% DG Energy Savings Goal (MWh)	
	Texas Retail Peak (MW)	Normalized Texas Retail Peak (MW)	Weather		Opt Out MW	Retail Peak with LLF Applied Minus Out-Out (MW)		Annual Increase (MW)	Actual Texas Load (MWh)	Weather Texas Load (MWh)	Actual Texas Retail Sales (MWh)	Weather Texas Retail Sales (MWh)	At Meter		Five Year Average Growth (MW)	30% of Five Year Average Growth (MW)	4/10 of 1% Peak Demand (MW)	Trigger Reached?	30% DG Energy Savings Goal (MWh)		4/1 of 1% DG Energy Savings Goal (MWh)	
			Normalized	Weather		Retail Peak	Applied Minus Out-Out (MW)						Five Year Average Growth (MW)	30% of Five Year Average Growth (MW)	4/10 of 1% Peak Demand (MW)		Trigger Reached?	Energy Savings Goal (MWh)	DG Energy Savings Goal (MWh)			
2006	1,658	1,645				1,486			13,039,007	13,038,019	7,534,770	7,533,884					2	-	-	-		
2007	1,440	1,666				1,504	18		13,180,377	13,207,469	7,613,587	7,638,053					1	-	-	-		
2008	1,694	1,696				1,531	27		14,143,864	14,198,484	7,668,155	7,717,744					1	-	-	-		
2009	1,735	1,707			46	1,495	(36)		13,920,045	13,932,332	7,371,821	7,382,989					1	-	-	-		
2010	1,707	1,716				1,513	18		14,175,553	14,110,580	7,512,089	7,452,380	23	7	1,507	6,02784	1	11,965	10,561			
2011	1,779	1,750				1,536	23		14,054,830	13,730,734	7,963,150	7,639,055	3	1	1,504	6,01606	2	1,669	10,540			
2012	1,887	1,775				1,548	12		13,880,058	13,721,135	7,748,839	7,589,916	7	2	1,506	6,02302	2	3,556	10,552			
2013	1,656	1,633				1,402	(146)		13,994,646	13,859,306	7,764,906	7,629,565	10	3	1,516	6,06336	2	5,300	10,623			
2014	1,711	1,702				1,487	85		14,061,579	14,038,723	7,712,573	7,689,717	9	3	1,525	6,09846	2	4,613	10,685			
2015	1,618	1,691				1,480	(7)		14,032,058	14,004,866	7,621,821	7,594,628	(26)	(8)	1,499	5,99514	2	(13,576)	10,503			
2016	1,727	1,677				1,475	(5)		13,958,248	13,905,333	7,498,352	7,445,437	(2)	(0)	1,497	5,98871	2	(845)	10,492			
2017	1,675	1,645				1,442	(33)		13,844,659	13,912,071	7,358,371	7,425,783	(7)	(2)	1,491	5,96248	2	(3,446)	10,446			
2018	1,848	1,832				1,608	166		14,297,147	14,100,463	7,723,000	7,526,316	(12)	(4)	1,478	5,91389	2	(6,385)	10,361			
2019	1,702	1,729				1,528	(80)		14,037,836	13,944,983	7,465,519	7,372,666	(21)	(6,328)	1,457	5,82951	2	(11,087)	10,213			
2020		1,740				1,571	43				7,664,093	41	12,371	1,499	5,99446	1	21,674	10,502				
2021		1,735				1,566	(5)				7,646,325	8	2	1,507	6,02701	2	4,278	10,559				

Southwestern Public Service Company

Goal Data

Texas Retail Peak (MW)	<u>Peak Demand at the Source</u>			<u>Peak Demand at the Meter</u>			<u>Sales at the Meter</u>			<u>Calculations</u>						
	Weather Normalized Texas Retail Peak (MW)	Opt Out MW	Retail Peak with LLF Opt-Out (MW)	Annual Increase (MW)	Actual Texas Load (MWh)	Weather Normalized Texas Load (MWh)	Actual Texas Retail Sales (MWh)	Weather Normalized Texas Retail Sales (MWh)	Five Year Growth (MW)	30% of Average Growth (MW)	Five Year Average Growth (MW)	4/10 of 1% of Peak Demand (MW)	Trigger Reached?	30% DG Energy Savings Goal (MWh)	4/1 of 1% DG Energy Savings Goal (MWh)	
2022	1,733		1,565	(1)		7,637,533	18	5	1,525	6,09999	2	9,590	10,687			
2023	1,733		1,565	0		7,631,204	18	5	1,543	6,17283	2	9,570	10,815			
2024	1,735		1,567	1		7,624,542	25	7	1,568	6,27088	1	12,884	10,987			
2025	1,733		1,565	(2)		7,622,625	(9)	(3)			2	(4,534)				
2026	1,735		1,566	1		7,629,077	8	2			1	4,069				
2027	1,738		1,570	4		7,637,351	(1)	(0)			2	(644)				
2028	1,743		1,574	4		7,648,495	(0)	(0)			2	(4)				
2029	1,744		1,575	1		7,662,520	1	0			1	513				
2030	1,749		1,579	4		7,684,071	2	1			1	978				
2031	1,754		1,584	5		7,709,495	2	1			1	889				
2032	1,759		1,589	5		7,738,511	3	1			1	1,491				
2033	1,760		1,590	1		7,771,831	4	1			1	1,850				
2034	1,764		1,593	3		7,821,593	4	1			1	1,967				
2035	1,769		1,597	4		7,883,598	3	1			1	1,606				
2036	1,773		1,601	4		7,957,626	4	1			1	1,874				
2037	1,773		1,601	(0)		8,036,292	4	1			1	1,885				
2038	1,775		1,603	2		8,119,442	3	1			1	1,839				
2039	1,779		1,606	3		8,201,312	2	1			1	1,295				

Southwestern Public Service Company

Line Loss Factors

**New Loss Factors to use
in 2017 Texas Rate Case
Docket No. 47527**

Energy Loss Factors

Sales at the Generator @ Generation	1.000000	7.88%
Sales @ 115, 230 & 345 KV Level 2	1.029633	
Sales @ 69 KV Level 3	1.035919	
Sales @ Primary (33kv - 2.4kv) Level 4	1.105898	
Secondary Sales @ the Transf. Level 5	1.125047	
Sales served by secondary lines Level 6	1.128389	
Composit Factors 5 & 6 Used in billing	1.126935	

Demand Loss Factors

Sales at the Generator @ Generation	1.000000	9.70%
Sales @ 115, 230 & 345 KV Level 2	1.023667	
Sales @ 69 KV Level 3	1.030961	
Sales @ Primary (33kv - 2.4kv) Level 4	1.131015	
Secondary Sales @ the Transf. Level 5	1.161769	
Sales served by secondary lines Level 6	1.166539	
Composit Factors 5 & 6 Used in billing	1.164833	

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
1	0.00	0.00	0	0.00	0.00
2	0.00	3.08	2.06	0.00	0.00
3	0	15.42	24.67	0.00	13.36
4	34.92	40.08	34.94	41.11	40.08
5	0.00	0.00	4.11	5.14	5.14
6	0	0	0	0.00	4.11
7	7.19	10.28	10.28	10.28	10.28
8	1.03	2.06	0	1.03	0.00
9	4.11	3.08	5.14	0.00	4.11
10	14.38	17.47	0.00	0.00	18.50
11	0.00	24.67	21.58	0.00	0.00
12	26.00	177.00	240.00	221.00	151.00
13	5.14	2.06	0	0.00	11.31
14	2.05	0.00	5.14	0.00	21.58
15	18	23	0	0.00	19.00
16	0.00	0.00	0.00	0.00	0.00
17	64.00	42.00	42.00	42.00	42.00
18	0.00	0.00	0.00	0.00	0.00
19	0.00	0.00	0.00	0.00	0.00
20	0.00	26.00	26.00	28.00	33.00
21	50	37	24	25.00	24.00
22	0	0	0.00	0.00	1.03
23	0.00	0.00	0.00	0.00	0.00
24	0.00	0.00	0.00	0.00	0.00
25	0.00	0.00	2.06	2.06	1.03
26	9.24	8.22	9.25	9.25	9.25
27	5.00	84.00	94.00	0.00	76.00
28	0.00	34.00	36.00	26.00	38.00
29	12.33	13.36	15.42	15.42	13.36
30	2.05	5.14	5.14	9.25	5.14
31	0.00	7.19	5.14	3.08	5.14
32	13.35	0.00	0	0.00	0.00
33	6.16	7.19	0	0.00	21.58
34	1.00	1.00	0.00	0.00	15.00
35	0.00	0.00	0.00	0.00	0.00
36	0.00	47.28	0.00	16.44	20.56
37	41.09	41.11	39.05	39.05	44.19
38	25.68	27.75	43.17	27.75	28.78
39	32.87	37.00	50.36	49.33	37.00
40	31.84	41.11	38.03	41.11	33.92
41	45.20	42.14	0.00	44.19	45.22
42	0.00	788.00	1,131.00	1,074.00	963.00
43	40.06	42.14	57.55	40.08	46.25
44	33.9	38.03	0	37	37

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
45	2.05	0.00	1.03	4.11	1.03
46	22.60	25.69	0.00	0.00	28.78
47	51.00	46.00	0.00	24.00	24.00
48	18.83	26.72	27.75	28.78	27.75
49	47.25	51.39	69.89	61.67	56.53
50	21.57	25.69	28.78	20.56	20.56
51	131.48	136.69	117.16	106.89	112.03
52	131.48	129.50	131.55	125.39	120.25
53	48.28	54.47	60.64	0.00	63.72
54	10.27	10.28	10.28	0.00	9.25
55	0.00	726.00	866.00	695.00	732.00
56	30.82	34.94	39.05	44.19	40.08
57	25.68	26.72	25.69	27.75	26.72
58	42.11	46.25	47.28	49.33	38.03
59	88.34	0.00	134.64	0.00	126.41
60	47.25	60.64	0	0.00	62.69
61	47.00	49.00	49.00	51.00	54.00
62	35.95	34.94	84.28	39.05	42.14
63	10.27	14.39	17.47	13.36	13.36
64	14.38	15.42	19.53	14.39	13.36
65	25.68	28.78	19.53	30.83	28.78
66	0.00	0.00	19.53	20.56	18.50
67	31.84	30.83	30.83	29.80	31.86
68	0.00	32.89	27.75	34.94	32.89
69	14.00	14.00	13.00	25.00	50.00
70	67.79	68.86	65.78	66.80	70.91
71	0.00	7.19	8.22	10.28	8.22
72	34.92	35.97	32.89	34.94	33.92
73	15.41	6.17	0	0.00	0.00
74	0	0	0	0.00	9.25
75	418.07	622.82	0.00	402.88	443.99
76	10.27	12.33	0	0.00	131.55
77	0	2.06	2.06	0	7.19
78	347.00	348.00	289.00	438.00	144.00
79	59.00	73.00	73.00	73.00	73.00
80	16.44	24.67	26.72	0.00	5.14
81	35.00	34.00	35.00	0.00	42.00
82	0.00	0.00	0	0.00	0.00
83	4.11	5.14	3.08	3.08	4.11
84	0.00	0.00	0.00	0.00	0.00
85	6.16	8.22	8.22	0.00	25.69

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
86	7.19	12.33	6.17	0.00	6.17
87	15.41	13.36	14.39	14.39	14.39
88	13.35	18.50	13.36	17.47	15.42
89	33.90	34.94	34.94	32.89	44.19
90	45.20	22.61	58.58	49.33	47.28
91	0.00	0.00	0.00	0.00	0.00
92	82.18	33.92	27.75	32.89	39.05
93	0.00	43.17	0.00	25.69	29.80
94	0.00	42.14	53.44	10.28	11.31
95	22.60	24.67	30.83	0.00	30.83
96	0.00	14.49	3.08	33.92	37.00
97	33.90	34.94	34.94	34.94	31.86
98	0.00	1.00	0.00	0.00	0.00
99	0.00	595.00	669.00	673.00	599.00
100	0.00	28.78	29.8	29.80	27.75
101	18.49	20.56	19.53	19.53	23.64
102	271.00	256	303.00	249.00	222.00
103	145.46	175.20	273.75	194.66	189.11
104	11.30	14.39	14.39	11.31	17.47
105	0.00	0.00	0.00	0.00	0.00
106	32.87	58.58	45.22	67.83	50.36
107	36.98	37	0	374.10	374.10
108	95.53	74.00	0.00	0.00	142.86
109	26.71	26.72	29.80	27.75	25.69
110	26.71	28.78	38.03	28.78	31.86
111	228.04	218.91	0.00	234.33	188.08
112	29.79	20.56	22.61	22.61	23.64
113	16.44	18.50	22.61	23.64	18.50
114	48.28	40.08	43.17	0.00	40.08
115	15.41	15.42	18.50	15.42	12.33
116	25.68	31.86	29.8	26.72	27.75
117	687.00	427.00	503.00	0.00	636.00
118	18.49	18.50	20.56	20.56	18.50
119	19.52	23.64	37	30.83	28.78
120	0.00	7.19	12.33	0.00	18.50
121	60.60	63.72	52.42	52.42	59.61
122	0.00	0.00	5.00	5.00	5.00
123	0.00	0.00	5.14	4.11	7.19
124	1.03	1.03	1.03	1.03	0.00
125	6.16	6.17	6.17	0.00	3.08
126	23.63	15.42	0	0.00	26.72

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
127	15.41	13.36	13.36	0.00	14.39
128	0.00	5.14	0	0.00	10.28
129	0.00	0.00	0.00	0.00	12.33
130	30.82	2.06	0	0.00	35.97
131	9.24	9.25	1.03	9.25	9.25
132	40.00	41.00	48	48.00	52.00
133	211.00	0	0.00	0.00	0.00
134	29.00	30.00	32.00	32.00	34.00
135	919.00	991.00	969.00	880.00	522.00
136	0.00	0.00	0.00	0.00	0.00
137	0.00	0.00	0.00	0.00	3.08
138	0	0	2.06	2.06	3.08
139	11.30	12.33	12.33	12.33	15.42
140	0.00	0.00	0.00	0.00	9.25
141	55.47	67.83	55.50	58.58	60.64
142	0.00	13.36	12.33	12.33	12.33
143	0.00	0.00	0.00	0.00	0.00
144	898.00	736.00	923.00	1,164.00	1,077.00
145	50.33	51.39	80.16	53.44	48.3
146	85.26	76.05	78.11	90.44	77.08
147	60.60	57.55	62.69	47.28	48.30
148	66.77	0.00	57.55	0.00	56.53
149	22.26	18.50	22.61	25.69	24.67
150	50.33	49.33	64.75	52.42	46.25
151	96.00	114.00	114.00	102.00	114.00
152	0.00	0.00	9.25	8.22	10.28
153	4.11	12.33	0.00	0.00	3.08
154	127.37	98.66	95.58	105.86	111.00
155	69.85	63.72	67.83	55.50	63.72
156	13.00	17.00	15.00	17.00	15
157	21.57	19.53	30.83	19.53	19.53
158	31.00	39.00	30.00	35.00	37.00
159	30.82	28.78	39.05	33.92	37.00
160	347.00	346.00	347.00	342.00	213.00
161	0.00	0.00	47.28	0.00	49.33
162	309.00	331.00	368.00	346.00	324.00
163	27.73	38.03	34.94	1.03	50.36
164	4.11	3.08	0.00	0.00	13.36
165	0.00	0.00	0	0.00	28.78
166	7.19	9.25	0	0.00	14.39
167	23.63	23.64	26.72	26.72	0.00

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
168	90.39	116.14	83.25	82.22	94.55
169	11.00	13.00	12.00	13.00	0.00
170	25.68	28.78	29.80	27.75	26.72
171	13.35	12.33	0.00	0.00	14.39
172	0.00	31.86	23.64	27.75	26.72
173	84.23	94.55	21.58	0.00	80.16
174	57.52	76.05	0.00	0.00	77.08
175	64.71	61.67	0.00	0.00	71.94
176	22.60	40.08	25.69	33.92	33.92
177	186.00	202.00	271.00	201.00	194.00
178	0.00	169.00	0.00	0.00	157.00
179	28.76	32.89	52.42	0.00	39.05
180	0.00	20.56	0.00	26.72	0.00
181	0.00	99.69	111.00	108.94	115.11
182	1.03	6.17	7.19	8.22	3.08
183	0.00	21.58	31.86	32.89	29.80
184	1.03	1.03	9.25	9.25	32.89
185	52.39	59.61	65.78	0.00	0.00
186	9.24	10.28	6.17	6.17	5.14
187	18.49	19.53	11.31	11.31	11.31
188	9.24	4.11	0.00	0.00	19.53
189	5.14	5.14	4.11	3.08	6.17
190	78.07	0.00	98.66	0.00	72.97
191	2.05	0.00	0.00	0.00	16.44
192	7.19	8.22	0.00	0.00	12.33
193	3	11	14.00	14.00	42.00
194	197.00	210.00	216.00	216.00	218.00
195	0.00	0.00	0.00	0.00	0.00
196	0.00	0.00	0.00	0.00	0.00
197	0	0	0	0.00	0.00
198	26	27	27	28	29
199	0.00	0.00	0.00	0.00	0.00
200	0.00	0.00	0.00	0.00	0.00
201	40	58	58	32.00	47.00
202	0	13.36	12.33	16.44	15.42
203	20.00	20.00	20.00	22.00	21.00
204	7.00	0.00	0.00	0.00	7.00
205	0.00	0.00	0.00	0.00	0.00
206	0.00	2.06	2.06	4.11	5.14
207	64.71	58.58	55.5	58.58	67.83
208	7.19	11.31	11.31	11.31	11.31

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
209	0.00	0.00	0.00	0.00	0.00
210	100.66	93.53	0.00	0.00	111.00
211	38	43	38	40.00	40.00
212	10.27	10.28	0	0.00	26.72
213	14.38	12.33	13.36	13.36	13.36
214	10.27	10.28	0	0.00	19.53
215	0.00	0.00	0.00	0.00	0.00
216	68.82	71.94	0	0.00	0.00
217	0.00	1.03	13.36	15.42	15.42
218	0.00	0.00	22.61	41.11	42.14
219	36.98	31.86	26.72	25.69	29.80
220	27.73	33.92	33.92	27.75	0.00
221	31.84	35.97	0.00	0.00	0.00
222	46.22	54.47	60.64	56.53	46.25
223	0.00	523.00	615.00	628.00	523.00
224	25.68	26.72	24.67	0.00	29.80
225	0.00	257.11	426.32	473.60	320.66
226	50.33	76.05	0.00	0.00	67.83
227	235.23	0.00	164.44	150.05	164.44
228	46.22	45.22	59.61	48.30	45.22
229	25.68	29.80	39.05	25.69	29.80
230	28.76	32.89	29.80	31.86	31.86
231	36.00	0.00	31.00	69.00	58.00
232	44.17	51.39	54.47	0.00	55.50
233	7.19	9.25	0.00	0.00	7.19
234	0.00	0.00	0.00	0.00	23.64
235	0.00	0.00	41.11	54.47	49.33
236	29.79	28.78	24.67	0.00	23.64
237	62.00	63.00	64.00	65.00	42.00
238	27.73	50.36	54.47	48.30	55.50
239	36.98	41.11	40.08	31.86	37.00
240	40.06	42.14	57.55	0.00	52.42
241	18.00	20.00	19.00	20.00	19.00
242	0.00	23.64	11.31	0.00	18.50
243	0.00	0.00	0.00	0.00	4.11
244	0.00	5.14	3.08	10.28	12.33
245	3.08	27.75	24.67	47.28	53.44
246	3.08	2.06	2.06	3.08	2.06
247	3.08	3.08	3.08	3.08	2.06
248	3.08	4.11	5.14	0.00	8.22
249	103	98	94	96	91

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
250	4.11	0.00	0	0.00	6.17
251	4.11	3.08	2.06	0.00	2.06
252	2.05	3.08	0	0.00	0.00
253	3.08	1.03	0	1.03	1.03
254	0	0	0.00	12.33	9.25
255	16.44	16.44	30.83	0.00	37.00
256	0	0	0.00	0.00	0.00
257	0.00	0.00	0	0.00	0.00
258	0	0	0	0	0
259	0	0	0	0	0
260	145.00	125.00	0.00	0.00	0.00
261	41	32	40	33	37
262	0.00	0.00	0	0.00	0.00
263	63.00	63.00	62.00	66.00	69.00
264	440	428	446	480.00	551.00
265	0.00	0.00	0.00	0.00	0.00
266	0.00	0.00	0.00	0.00	0.00
267	0.00	0.00	0.00	0.00	0.00
268	0	112	121	134.00	164.00
269	102	96	104	112.00	101.00
270	3.08	5.14	4.11	3.08	4.11
271	0.00	0.00	0.00	0.00	0.00
272	6.16	3.08	2.06	2.06	5.14
273	5.14	6.17	3.08	0.00	4.11
274	0.00	0.00	10.28	17.47	13.36
275	65.74	43.17	40.08	45.22	44.19
276	15.41	12.33	11.31	11.31	14.39
277	0.00	38.03	23.64	26.72	24.67
278	52.39	51.39	52.42	62.69	70.91
279	58.55	64.75	68.86	62.69	66.80
280	35.95	31.86	0.00	35.97	35.97
281	12.33	15.42	18.50	0.00	25.69
282	3.08	8.22	0.00	0.00	11.31
283	42.11	0.00	40.08	39.05	41.11
284	25.68	28.78	26.72	28.78	25.69
285	23.63	20.56	24.67	28.78	24.67
286	20.54	22.61	31.86	23.64	21.58
287	46.22	51.39	48.30	57.55	45.22
288	14.00	13.00	15.00	15.00	16.00
289	15.41	12.33	18.50	18.50	16.44
290	406.00	458.00	464.00	467.00	500.00

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
291	68.82	76.05	77.08	0.00	57.55
292	38.01	47.28	65.78	44.19	54.47
293	23.63	25.69	27.75	28.78	24.67
294	0.00	221.00	302.00	331.00	258.00
295	55.47	31.86	51.39	34.94	31.86
296	11.30	13.36	12.33	30.83	0.00
297	45.20	48.30	80.16	52.42	63.72
298	14.38	11.31	0.00	0.00	14.39
299	23.63	28.78	28.78	28.78	25.69
300	24.65	26.72	30.83	26.72	26.72
301	21.40	24.67	27.75	29.80	28.78
302	28.76	39.05	0.00	0.00	34.94
303	0.00	0.00	0.00	0.00	29.80
304	0.00	31.86	0.00	0.00	29.80
305	21.57	27.75	35.97	29.80	27.75
306	25.68	27.75	45.22	26.72	24.67
307	0.00	37.00	61.67	54.47	43.17
308	151.00	191.16	2.06	183.97	162.38
309	35.95	70.91	50.36	52.42	61.67
310	43.14	46.25	69.89	57.55	52.42
311	28.76	30.83	27.75	30.83	30.83
312	102.72	98.66	0.00	0.00	118.19
313	0.00	0.00	0.00	0.00	0.00
314	0.00	24.67	16.44	17.47	0.00
315	36.98	40.08	40.08	35.97	35.97
316	6.16	9.25	6.17	5.14	15.42
317	0.00	1.03	0.00	1.03	1.03
318	6.16	5.14	5.14	5.14	5.14
319	3.08	0.00	0.00	0.00	8.22
320	44	51	48	51.00	56.00
321	0.00	0	0.00	0.00	0.00
322	9.24	9.25	7.19	9.25	8.22
323	53.00	53.00	0.00	53.00	53.00
324	0	0	0	4.11	2.06
325	101.00	90.00	0.00	0.00	94.00
326	0.00	5.14	4.11	6.17	6.17
327	0	0	0.00	0.00	0
328	0.00	0	0	0.00	0
329	0.00	0	0.00	0.00	0.00
330	33	34	32	29	16.00
331	91	93	90	92	92

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
332	0	0	0	0	0
333	0.00	0.00	0.00	0.00	0.00
334	0.00	0.00	0.00	0.00	0.00
335	11.3	0	0	0	0
336	0.00	21.58	17.47	12.33	6.17
337	13.35	13.36	0	0.00	11.31
338	5.00	24.00	10.00	12.00	17.00
339	79.00	79.00	76.00	0	79.00
340	145.00	131.00	128	0.00	122.00
341	0.00	0.00	0.00	0.00	5.14
342	17.46	15.42	14.39	17.47	14.39
343	5.14	5.14	0.00	0.00	5.14
344	6	12	13	0.00	12.00
345	16.44	17.47	0.00	0.00	42.14
346	24.65	22.61	20.56	20.56	20.56
347	50.33	49.33	0.00	0.00	0.00
348	0.00	0.00	0.00	0.00	0.00
349	0.00	31.86	25.69	32.89	23.64
350	0.00	38.03	19.53	17.47	18.50
351	38.01	38.03	28.78	30.83	33.92
352	30.82	26.72	24.67	29.80	28.78
353	0.00	0.00	0.00	0.00	5.14
354	36.80	35.97	58.58	57.55	41.11
355	34.92	39.05	50.36	0.00	44.19
356	35.95	35.97	56.53	41.11	33.92
357	298	288	307	274.00	216.00
358	3.08	9.25	0.00	0.00	23.64
359	0.00	9.25	0.00	0.00	19.53
360	71.90	87.36	77.08	79.14	69.89
361	69.85	65.78	109.97	81.19	90.44
362	0.00	0.00	0.00	0.00	0.00
363	41.09	39.05	55.5	43.17	43.17
364	54.44	51.39	57.55	57.55	65.78
365	44.17	42.14	19.53	41.11	46.25
366	28.76	28.78	37.00	30.83	25.69
367	21.57	22.61	28.78	48.30	44.19
368	14.38	15.42	15.42	12.33	12.33
369	51.36	53.44	77.08	61.67	51.39
370	30.82	25.69	30.83	30.83	26.72
371	24.65	28.78	27.75	29.80	32.89
372	0.00	0.00	0.00	0.00	0.00

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
373	16.44	17.47	22.61	16.44	21.58
374	29.79	37.00	50.36	32.89	39.05
375	1.03	1.03	2.06	0.00	0.00
376	14.38	14.39	13.36	12.33	14.39
377	0.00	0.00	0.00	0.00	0.00
378	0.00	31.86	28.78	28.78	28.78
379	88.34	89.41	0	0.00	0.00
380	0.00	0.00	0.00	0.00	0.00
381	0.00	11.31	0	0.00	29.80
382	1.03	6.17	6.17	7.19	2.06
383	0.00	4.11	5.14	0.00	5.14
384	0	3.08	4.11	3.08	7.19
385	23.63	23.64	16.44	16.44	21.58
386	1.03	1.03	1.03	0.00	0.00
387	4.11	2.06	4.11	0.00	3.08
388	11.3	11.31	0	0	17.47
389	10.27	0.00	0.00	0.00	14.39
390	30.82	25.69	22.61	20.56	0
391	0	0	0	0.00	0.00
392	0.00	0	0	0.00	0.00
393	0	0	0	0.00	0.00
394	0.00	0.00	0.00	0.00	0.00
395	0	0	0	0.00	0.00
396	41	46	0	59.00	57.00
397	0	0	0	0.00	0.00
398	25.68	28.78	0	24.67	24.67
399	18.49	19.53	21.58	26.72	24.67
400	0.00	0.00	0.00	0.00	0.00
401	0	0	0	0.00	0.00
402	0.00	54.00	53.00	53.00	80.00
403	22.60	24.67	24.67	30.83	23.64
404	8.22	38.03	35.97	40.08	42.14
405	0.00	0.00	0.00	0.00	0.00
406	28.00	28.00	29.00	29.00	2.00
407	3.08	3.08	3.08	3.08	3.08
408	51.36	53.44	35.97	42.14	45.22
409	40.06	4.11	47.28	62.69	43.17
410	0.00	24.67	11.31	0.00	14.39
411	0	127.44	70.91	71.94	69.89
412	32.87	34.94	46.25	40.08	35.97
413	0.00	4.11	0.00	0.00	4.11

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
414	122.00	153.00	103.00	0.00	173.00
415	0.00	35.97	30.83	33.92	34.94
416	9.24	19.53	0.00	0.00	14.39
417	100.66	87.36	127.44	88.39	40.08
418	84.23	88.39	161.36	93.53	123.33
419	35.95	37.00	48.30	44.19	33.92
420	10.27	12.33	0.00	0.00	13.36
421	10.27	13.36	0.00	0.00	15.42
422	51.36	59.61	78.11	56.53	59.61
423	0.00	14.39	0.00	0.00	12.33
424	21.00	22	21	35.00	39.00
425	11.30	16.44	0	0.00	18.50
426	64.71	66.80	0.00	0.00	79.14
427	18.49	20.56	22.61	22.61	22.61
428	80.12	68.86	78.11	78.11	78.11
429	657.00	1059	1305	1,415.00	1,223.00
430	47.25	5.14	45.22	0.00	53.44
431	55.47	67.83	77.08	68.86	0.00
432	30.82	33.92	0.00	0.00	30.83
433	9.24	9.25	19.53	9.25	13.36
434	53.41	44.19	56.53	0.00	44.19
435	24.65	24.67	23.64	0.00	25.69
436	199.49	257.22	254.07	211.08	158.27
437	1,771.00	2,074.00	2,176.00	2,104.00	1,963.00
438	0.00	0.00	0	0.00	18.50
439	0.00	29.80	28.78	0.00	0.00
440	58.55	70.91	60.64	64.75	68.86
441	24.65	32.89	32.89	32.89	37.00
442	32.87	39.05	35.97	38.02	42.14
443	14.38	13.36	12.33	14.39	16.44
444	52.39	50.36	0.00	0.00	59.61
445	1.03	0.00	1.03	0.00	1.03
446	5.14	5.14	0.00	0.00	7.19
447	30.82	41.11	0.00	0.00	47.28
448	9.24	32.89	10.28	0.00	43.17
449	45.20	64.75	49.33	0.00	53.44
450	15.41	18.50	17.47	0.00	24.67
451	453.00	547.00	585.00	823.00	383.00
452	103.00	116.00	108.00	116.00	104.00
453	0.00	412.00	0.00	443.00	438.00
454	0.00	0.00	0.00	0.00	0.00

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
455	0.00	0.00	0.00	0.00	0.00
456	0.00	0.00	0.00	0.00	0.00
457	49.00	50	54.00	0.00	54.00
458	22.00	22.00	0.00	26	29.00
459	0	0	0	0.00	0.00
460	20.83	21.00	22.00	23.00	26.00
461	3.08	26.72	25.69	0.00	19.53
462	108.00	108	76.00	0.00	140.00
463	10.27	22.61	21.58	21.58	22.61
464	1.03	21.58	31.86	0.00	48.30
465	99.00	105.00	107	117.00	110.00
466	0.00	4.11	4.11	0.00	5.14
467	66.00	58.00	51.00	53.00	51.00
468	67.00	72.00	84.00	73.00	65.00
469	0.00	1.03	1.03	16.44	18.50
470	44.17	46.25	45.22	37.00	28.78
471	0.00	0.00	19.53	24.67	31.86
472	49.31	68.86	68.86	66.80	55.50
473	0.00	39.05	48.30	33.92	46.25
474	0.00	177.00	563.00	493.00	422.00
475	29.79	32.89	32.89	31.86	29.80
476	82.18	89.41	113.05	86.33	94.55
477	27.73	28.78	26.72	26.72	29.80
478	23.63	26.72	34.94	31.86	23.64
479	54.44	61.67	66.80	67.83	54.47
480	56.50	51.39	77.08	0.00	88.39
481	0.00	49.33	0.00	0.00	52.42
482	39.03	44.19	67.83	43.17	49.33
483	0.00	11.00	0.00	0.00	11.00
484	41.09	45.22	0.00	44.19	40.08
485	31.84	48.3	55.5	0.00	53.44
486	78.00	75.00	0.00	0.00	0.00
487	36.00	35.00	39.00	38.00	29.00
488	35.95	37.00	57.55	45.22	39.05
489	30.82	29.80	38.03	28.78	25.69
490	46.22	43.17	50.36	46.25	35.97
491	0.00	0.00	35.97	37.00	38.03
492	2.05	6.17	14.39	18.50	25.69
493	0.00	18.50	17.47	19.53	18.50
494	15.41	17.47	29.80	17.47	17.47
495	22.60	26.72	40.08	24.67	29.80

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
496	20.54	23.64	26.72	0.00	28.78
497	0.00	1.03	1.03	0.00	1.03
498	28.76	34.94	28.78	41.11	33.92
499	0.00	0.00	0.00	2.06	0.00
500	0.00	0.00	4.11	4.11	3.08
501	35.95	33.92	34.94	33.92	34.94
502	9.24	14.39	0.00	0.00	16.44
503	15.41	17.47	0.00	0.00	23.64
504	6.16	13.36	0.00	0	15.42
505	2.05	0.00	0.00	0.00	11.31
506	17.46	22.61	22.61	0.00	18.50
507	10.00	14.00	12	0.00	14.00
508	8.00	10.00	17.00	28.00	24.00
509	0.00	0.00	0.00	0.00	0.00
510	0.00	0.00	0.00	0.00	0.00
511	0.00	0.00	0.00	0.00	0.00
512	307.00	307.00	0.00	0.00	0.00
513	15.00	36.00	33.00	38.00	41.00
514	21.00	21.00	23	21.00	24.00
515	0.00	0.00	0.00	0.00	0.00
516	0.00	0.00	0.00	0.00	0.00
517	177.00	166.00	188.00	0.00	324.00
518	0.00	98.00	77.00	84.00	46.00
519	6.16	0.00	7.19	10.28	11.31
520	29.79	0.00	25.69	27.75	26.72
521	0.00	0.00	3.08	2.06	1.03
522	3.08	12.33	13.36	13.36	4.11
523	0.00	0.00	10.28	22.61	29.80
524	118.00	128.00	179.00	0.00	155.00
525	0.00	20.56	17.47	17.47	25.69
526	40.00	50.00	40.00	43	40
527	3.08	5.14	11.31	6.17	4.11
528	10.27	0.00	79.14	0.00	9.25
529	0.00	12.33	13.36	13.36	15.42
530	0.00	37.00	19.53	19.53	19.53
531	52.39	53.44	72.97	50.36	51.39
532	25.68	26.72	29.8	28.78	23.64
533	22.60	24.67	0.00	26.72	30.83
534	38.01	43.17	38.03	41.11	49.33
535	0.00	30.83	19.53	20.56	23.64
536	0.00	2.06	0.00	9.25	10.28

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
537	0.00	0.00	0.00	0.00	0.00
538	0.00	0	0.00	0.00	4.11
539	31.84	30.83	31.86	31.86	33.92
540	10.27	12.33	11.31	11.31	11.31
541	89.37	100.72	100.72	89.41	69.89
542	0	0	0.00	0.00	0.00
543	26.71	28.78	30.83	31.86	26.72
544	25.68	0.00	0.00	26.72	22.61
545	65.74	79.14	74.00	0.00	78.11
546	7.19	13.36	0.00	0.00	5.55
547	20.54	23.64	30.83	21.58	19.53
548	23.63	26.72	28.78	24.67	24.67
549	12.33	13.36	15.42	0.00	17.47
550	42.11	38.03	49.33	49.33	39.05
551	25.68	27.75	31.86	26.72	29.80
552	366.00	0.00	410.00	397.00	288.00
553	76.01	71.94	0.00	0.00	0.00
554	19.52	17.47	18.50	19.53	20.56
555	22.60	2.06	0.00	0.00	13.36
556	0.00	328.00	397.00	327.00	286.00
557	41.09	49.33	0.00	0.00	44.19
558	24.65	28.78	32.89	25.69	29.80
559	34.92	33.92	55.50	46.25	44.19
560	57.52	55.5	0	0.00	65.78
561	47.25	57.55	49.33	0.00	56.53
562	0.00	1	0.00	2.00	2.00
563	40.06	38.03	41.11	39.05	38.03
564	24.65	26.72	0.00	0.00	30.83
565	16.44	18.50	23.64	22.61	28.78
566	20.54	22.61	27.75	24.67	22.61
567	17.46	17.47	17.47	0.00	19.53
568	431.00	381.00	416.00	369.00	320.00
569	127.37	116.14	0	132.58	0
570	46.22	47.28	63.72	47.28	59.61
571	44.17	45.22	47.28	55.50	42.14
572	327.44	345.13	350.16	351.19	144.91
573	26.71	34.94	31.86	43.17	33.92
574	41.09	43.17	44.19	29.80	21.58
575	0.00	39.00	43.00	0.00	39.00
576	45.20	74.00	44.19	0.00	44.19
577	58.55	57.55	66.80	64.75	60.64

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
578	20.00	20.00	0.00	18.00	16.00
579	35.00	37.00	8.00	37.00	35.00
580	64.00	55.00	49.00	61.00	58.00
581	36.00	36.00	2.00	39.00	34.00
582	25.68	26.72	25.69	29.80	25.69
583	55.47	25.69	31.86	0.00	35.97
584	22.60	29.80	27.75	26.72	28.78
585	57.52	58.58	0.00	0.00	49.33
586	124.29	120.05	114.08	0.00	198.36
587	28.76	23.64	27.75	27.75	26.72
588	58.00	78.00	84.00	69.00	42.00
589	28.76	33.92	34.94	41.11	42.14
590	80.12	125.39	0.00	0.00	117.16
591	23.63	34.94	26.72	33.92	30.83
592	73.00	0.00	121.00	0.00	123.00
593	27.00	31.00	34.00	0.00	33.00
594	16.44	26.72	22.61	30.83	40.08
595	0.00	1.03	1.03	1.03	1.03
596	100.66	93.53	0.00	0.00	0.00
597	52.39	83.25	60.64	78.11	71.94
598	30.82	26.72	0.00	27.75	29.80
599	28.76	29.80	25.69	26.72	27.75
600	38.00	35.00	9.00	36.00	36.00
601	43.14	50.36	53.44	51.39	55.50
602	22.60	19.53	19.53	19.53	19.53
603	35.00	34.00	32.00	34.00	38.00
604	0.00	0.00	0.00	0.00	0.00
605	0.00	0.00	0.00	0.00	0.00
606	59.58	51.39	46.25	0.00	47.28
607	0.00	0.00	0.00	0.00	0.00
608	16.44	18.50	0.00	0.00	18.50
609	23.63	26.72	0.00	29.80	32.89
610	90.39	0	0.00	0.00	158.27
611	0.00	0.00	0	0.00	40.08
612	14.38	9.25	0.00	10.28	13.36
613	30.82	34.94	0.00	34.94	0.00
614	43.14	43.17	0.00	0.00	46.25
615	122.24	101.75	0.00	0.00	111.00
616	25.68	24.67	0.00	24.67	35.97
617	31.84	35.97	0.00	0.00	39.05
618	0.00	97.64	0.00	0.00	92.50

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
619	16.44	16.44	0.00	0.00	19.53
620	21.57	24.67	0.00	0.00	0.00
621	18.49	20.56	19.53	17.47	18.50
622	29.79	30.83	41.11	0.00	38.03
623	67.79	70.91	0.00	0.00	68.86
624	28.76	25.69	40.08	25.69	26.72
625	107.86	0	0.00	0.00	161.36
626	99.64	103.80	0.00	0.00	0.00
627	26.71	32.89	27.75	27.75	25.69
628	97.58	102.78	0.00	0.00	118.19
629	66.77	68.86	0.00	0.00	122.30
630	0	0	0.00	0.00	44.19
631	0.00	1.03	1.03	1.03	1.03
632	0.00	1.03	2.06	2.06	2.06
633	52.39	61.67	0.00	0.00	57.55
634	22.60	19.53	42.14	43.17	66.80
635	42.11	41.11	0.00	41.11	46.25
636	70.88	79.14	0.00	0.00	87.36
637	30.82	30.83	0.00	30.83	26.72
638	71.90	33.92	32.89	0.00	33.92
639	28.76	26.72	28.78	28.78	27.75
640	35.95	0	0.00	0.00	72.97
641	0.00	0	0.00	0.00	0.00
642	33.90	34.94	47.28	39.05	41.11
643	5.14	6.17	6.17	0.00	7.19
644	10.27	11.31	13.36	25.69	11.31
645	78.07	89.41	0	0.00	97.64
646	0	27.75	0.00	28.78	0.00
647	3.08	2.06	3.08	2.06	3.08
648	0.00	27.75	0.00	0.00	38.03
649	25.68	32.89	49.33	33.92	35.97
650	87.31	100.72	0.00	0.00	95.58
651	76.01	88.39	127.44	104.83	96.61
652	33.90	32.89	33.92	31.86	40.08
653	90.39	86.33	98.66	85.30	91.47
654	107.86	29.80	0.00	93.53	78.11
655	100.66	20.56	0	81.19	90.44
656	30.82	15.42	11.31	9.25	50.36
657	97.58	92.50	71.94	0.00	90.44
658	30.82	31.86	0.00	0.00	46.25
659	0.00	0.00	0.00	0.00	0.00

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
660	0.00	136.69	94.55	114.08	120.25
661	82.18	82.22	97.64	0.00	99.69
662	36.98	40.08	49.33	39.05	41.11
663	0.00	56.53	40.08	37.00	39.05
664	0.00	65.78	70.91	0	43.17
665	3.00	0.00	0.00	0.00	18.00
666	0.00	51.00	37.00	45.00	44.00
667	0.00	88.39	63.72	57.55	84.28
668	90.00	93.00	0.00	0.00	95.00
669	0.00	276.00	204.00	256.00	210.00
670	9.00	7	0	0.00	0.00
671	44.00	51.00	0.00	0.00	51.00
672	96.00	98.00	99.00	0.00	97.00
673	7.00	7	11	0.00	14.00
674	48.00	42.00	0.00	0.00	73.00
675	0.00	54.00	42.00	40.00	41.00
676	0.00	0.00	0.00	0.00	10.00
677	10.00	10.00	13	0.00	12.00
678	44.17	39.05	40.08	43.17	39.05
679	0.00	20.56	21.58	0.00	26.72
680	101.69	112.03	115.11	0.00	103.80
681	0.00	0.00	5.00	0.00	10.00
682	23.00	75.00	24.00	26.00	23.00
683	0.00	0.00	0	0.00	1.03
684	0.00	0.00	0.00	0.00	0.00
685	0.00	0.00	0.00	0.00	0.00
686	0.00	0.00	0.00	0.00	0.00
687	0.00	20.00	19	0.00	19.00
688	81.00	87.00	79.00	0.00	59.00
689	6.16	7.19	0.00	0.00	5.14
690	0.00	0.00	0.00	0.00	0.00
691	80.12	0.00	119.22	0.00	0.00
692	9.00	11.00	13.00	10.00	11.00
693	8.00	11.00	13.00	11.00	11.00
694	9.00	11.00	13.00	10.00	11.00
695	12.00	11.00	11.00	11.00	10.00
696	15.00	0.00	0.00	0.00	0.00
697	35.00	42.00	54.00	40.00	37.00
698	27.00	29.00	30.00	29.00	31.00
699	82.00	100.00	97.00	94.00	100.00
700	1.00	47.00	47.00	60.00	54

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
701	0.00	0.00	0.00	0.00	0.00
702	45.00	47.00	47.00	47.00	41.00
703	16.00	21.00	28.00	19.00	24.00
704	11.00	12.00	11.00	0.00	13.00
705	24.00	26.00	35.00	32.00	29.00
706	0.00	0.00	0.00	0.00	0.00
707	0.00	0.00	0.00	0.00	11.00
708	28.00	30.00	39.00	32.00	0.00
709	0.00	0.00	0.00	0.00	0.00
710	367	380	425.00	389.00	300.00
711	43.14	32.89	31.86	0.00	31.86
712	20.00	19.00	16.00	47.00	0.00
713	36.98	35.97	34.94	35.97	29.80
714	0.00	0.00	0.00	0.00	0.00
715	19.52	22.61	0	0.00	44.19
716	81.15	77.08	92.50	0.00	91.47
717	0.00	12.00	11.00	11.00	15.00
718	0.00	0.00	0.00	0.00	2.06
719	49.31	49.33	51.39	51.39	51.39
720	175.65	180.88	0.00	0.00	158.27
721	103.75	106.89	107.91	0.00	101.75
722	41.09	0.00	35.97	31.86	41.11
723	10.27	11.31	14.39	11.31	12.33
724	19.52	18.50	23.64	18.50	19.53
725	50.33	59.61	0	50.36	0.00
726	267	283.00	276.00	0.00	261.00
727	11.30	12.33	13.36	13.36	13.36
728	80.00	84.00	120.00	0.00	100.00
729	56.50	62.69	63.72	0.00	69.89
730	45.20	51.39	51.39	0.00	43.17
731	0.00	20.56	18.50	0.00	26.72
732	6.16	20.56	18.50	0.00	33.92
733	1.03	47.28	57.55	45.22	66.80
734	0.00	41.11	39.05	0.00	64.75
735	0.00	45.22	43.17	43.17	52.42
736	64.71	62.69	83.25	0.00	74.00
737	82.18	0.00	112.03	0.00	104.83
738	0.00	51.00	56.00	59.00	58.00
739	70.00	69.00	67.00	62.00	62.00
740	11.30	14.39	14.39	0.00	22.61
741	13.35	15.42	14.39	0.00	23.64

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
742	94.50	94.55	0.00	89.41	0.00
743	0.00	0.00	0.00	0.00	0.00
744	0.00	0.00	0	0.00	0.00
745	53.41	0.00	65.78	0.00	62.69
746	62.66	67.83	0.00	0.00	88.39
747	87.31	94.55	103.80	0.00	128.47
748	0	0	0.00	0.00	112.03
749	26.00	41.00	35	24.00	25.00
750	27.73	28.78	47.28	39.05	35.97
751	50.33	52.42	58.58	51.39	57.55
752	51.36	47.28	52.42	53.44	67.83
753	119.15	146.97	0.00	0.00	0.00
754	55.47	56.53	0.00	0.00	0.00
755	46.22	58.58	0.00	49.33	0.00
756	23.63	27.75	38.03	31.86	27.75
757	67.79	61.67	57.55	0.00	63.72
758	0.00	15.42	14.39	0.00	18.50
759	21.57	21.58	22.61	0.00	21.58
760	0.00	23.64	24.67	24.67	25.69
761	16.44	14.39	14.39	0.00	16.44
762	17.46	19.53	19.53	0.00	25.69
763	0.00	0.00	0.00	0.00	0.00
764	0.00	0.00	0.00	0.00	0.00
765	50.00	50.00	62	60.00	60.00
766	56.00	56.00	56.00	64.00	68.00
767	0.00	38.03	39.05	39.05	55.50
768	76.01	82.22	82.22	0.00	59.61
769	582.00	671.00	371.00	371.00	375.00
770	13.35	14.39	9.25	16.44	0.00
771	29.79	20.56	31.86	30.83	27.75
772	3.08	3.08	0.00	0.00	5.14
773	27.73	40.08	41.11	0.00	38.03
774	28.00	31.00	27.00	0.00	28.00
775	4.11	7.19	0.00	6.17	5.14
776	2.05	0.00	10.28	10.28	10.28
777	1.03	1.03	3.08	3.08	7.19
778	51.36	59.61	53.44	54.47	56.53
779	81.15	66.80	64.75	54.47	66.80
780	18.49	13.36	18.5	18.50	17.47
781	42.00	31.00	30.00	54.00	35.00
782	56.50	56.53	60.64	64.75	75.03

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
783	17.46	22.61	22.61	0.00	34.94
784	39.03	47.28	39.05	0.00	40.08
785	15.41	15.42	16.44	19.53	15.42
786	22.60	20.56	47.28	24.67	23.64
787	3.08	3.08	0.00	0.00	3.08
788	0.00	0.00	0	0.00	0.00
789	38.01	44.19	32.89	32.89	46.25
790	16.44	19.53	25.69	16.44	19.53
791	12.33	12.33	13.36	0.00	13.36
792	10.27	12.33	14.39	12.33	11.31
793	15.41	17.47	20.56	20.56	19.53
794	38.01	25.69	30.83	33.92	23.64
795	12.00	13.00	15.00	11.00	12.00
796	10.00	11.00	15.00	10.00	13.00
797	0.00	0.00	8.00	0.00	1.00
798	0.00	1.03	21.58	1.03	42.14
799	32.87	18.50	18.50	0.00	55.50
800	12.33	14.39	0.00	13.36	16.44
801	3.08	3.08	15.42	2.06	14.39
802	296	261.00	270	270.00	292.00
803	0.00	0.00	13	13.00	15.00
804	54.44	53.44	111.00	54.47	55.50
805	53.00	53.00	54.00	53.00	53.00
806	29.00	87.00	44.00	55.00	54.00
807	95.53	119.22	137.72	129.50	98.66
808	0.00	0.00	30.83	43.17	34.94
809	26.71	20.56	21.58	0.00	28.78
810	19.52	21.58	24.67	0.00	23.64
811	28.76	23.64	24.67	21.58	21.58
812	19.52	19.53	21.58	21.58	18.50
813	21.57	26.72	22.61	24.67	21.58
814	24.65	21.58	0	0.00	24.67
815	45.00	46.00	0.00	25.00	20.00
816	0.00	26.00	29.00	33.00	32.00
817	0.00	18.50	27.75	27.75	29.80
818	0.00	9	6.00	216.00	258.00
819	0.00	0.00	0.00	0.00	0
820	25.68	26.72	28.78	0.00	32.89
821	6.16	5.14	13.36	13.36	14.39
822	0.00	0.00	0.00	0.00	0
823	18.49	24.67	26.72	22.61	29.8

Southwestern Public Service Company

Opt Out Info

Premise Number	Annual Peak kWh Opt-Out Contribution				
	2019	2018	2017	2016	2015
824	27.73	28.78	37	31.86	25.69
825	0.00	0.00	0.00	0.00	0
826	32.87	35.97	43.17	39.05	0
827	140.73	139.77	0.00	111.00	0
828	118.00	118.00	114.00	131.00	0
829	47.25	48.3	0	0	0
830	0.00	0.00	0.00	0	0
831	91.42	0	0.00	0	0
Totals	33,655.52	40,860.18	38,092.89	34,576.27	42,208.56
	33.65552	40.86018	38.09289	34.57627	42.20856

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Bonus and Cost-effectiveness Calculator

Version v10.0
updated 2/3/2020

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

Insert or Verify Data in Blue Cells	Fixed Inputs per PUC Rule	2013	2014	2015	2016	2017	2018	2019	2020
Avoided Cost per kW	\$ 80.00	\$80.00	\$80.00	\$80.00	\$80.00	\$80.00	\$80.00	\$80.00	\$80.00
Avoided Cost per kWh	\$ 0.050840	\$0.104000	\$0.046190	\$0.053210	\$0.050880	\$0.039890	\$0.037570	\$0.050840	\$0.113660
Utility Specific Discount Rate (WACC)	7.88%								
Inflation Rate	2.0%								
Maximum % Net Benefits for Bonus	10.0%								

PUC Goals	kW	kWh	
2019 Goals	5,495	9,627,240	updated

Cost-effectiveness Input		
Bonus Collected in 2019 = Bonus Earned in 2017	\$ 580,941	updated
Bonus Input		
Bonus to add to current total program costs for new bonus	\$ 580,941	

Please Note: The bonus included in the cost-effectiveness analysis is the bonus *collected* for the program year, not the bonus earned. For example, for PY2019 cost-effectiveness, the *bonus collected* (= 2017 bonus earned) should be included in cell B14 of this tab.

As a result, this bonus will not match the bonus calculated in the Step 4 Bonus Calculator Tab which is the *bonus earned* for PY2019.

Due to the rule change, a bonus must also be included as a program cost for the purposes of calculating the new bonus. We are using the same bonus that is used for cost-effectiveness.

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

Instructions		Select from drop-down	Manually Enter Data (It's ok to cut and paste in these cells)				Automatic Or Manual
	Program (list custom measure here if necessary)	Measure (Select from Drop Down Menu)	# Installations	kW	kWh	Incentives	Estimated Useful Life
WHITE CELLS: Enter Data	Commercial SOP	N/A	73.0	623.0	3,142,792	\$ 231,417.85	NA
GREY CELLS: Sub-Totals or Blanks	C-DXAC	Comm Split System/Single Packaged Heat Pumps and Air Conditioners	2.00	53.48	53,671	\$ 15,522.57	15.0
BLUE CELLS: Optional Data Entry	C-BLED	Comm Lamps and Fixtures: Integral LED Lamps	\$ 22.00	\$ 75.12	\$ 431,401.00	\$ 30,370.90	9.0
GREEN CELLS: Automatic Calculation	C-LED	Comm Lamps and Fixtures: Light Emitting Diode	44.0	490.93	2,636,918	\$ 184,077.39	15.0
Max of 16 programs	C-LightCtrl	Comm Lighting Controls: Occupancy Sensor	5.0	3.5	20,802	\$ 1,446.99	10.0
<i>measure max = 103</i>		Retro-Commissioning MTP	N/A	-	1,214.22	6,552,892.98	\$ 868,781.23
	DX AC Split	Comm Split System/Single Packaged Heat Pumps and Air Conditioners	16.31	51,525	\$ 9,957.32	15.0	
	PTAC	Comm Packaged Terminal Air Conditioners, Heat Pumps	1.92	2,037	\$ 679.93	15.0	
	VRF AC Air Cooled	Variable Refrigerant Flow Systems	5.83	43,091	\$ 5,699.06	15.0	
	Windows	Comm Window Film	5.95	11,909	\$ 2,836.07	10.0	
	Roof	Comm Energy Star Roofs	4.27	8,531	\$ 2,032.37	15.0	
	Integrated-ballast LED Lamps	Comm Lamps and Fixtures: Integral LED Lamps	33.96	177,877	\$ 22,108.54	9.0	
	Light Emitting Diode (LED) Fixtures	Comm Lamps and Fixtures: Light Emitting Diode	718.34	3,659,316	\$ 516,230.73	15.0	
	Light Emitting Diode (LED) Tubes	Comm Lamps and Fixtures: Light Emitting Diode	427.64	2,598,607	\$ 309,237.22	15.0	
<i>measure max = 40</i>		Load Management SOP	N/A	7.0	3,417.0	27,312	\$ 170,850.00
	Nonresidential Load Curtailment		7.00	3,417.00	27,312	\$ 170,850.00	1.0
<i>measure max = 40</i>		Small Commercial MTP	N/A	53.0	315.5	1,420,641	\$ 400,000.00
	C-BLED	Comm Lamps and Fixtures: Integral LED Lamps	19.00	75.72	297,536	\$ 83,071.86	9.0
	C-LED	Comm Lamps and Fixtures: Light Emitting Diode	33.00	239.55	1,122,109	\$ 316,650.05	15.0
	C-LightCtrl	Comm Lighting Controls: Occupancy Sensor	1.00	0.23	996	\$ 278.08	10.0
<i>measure max = 40</i>		Home Lighting MTP (Commercial Portion)	N/A	-	415.2	1,702,497	\$ 12,772.71
	LED		415.23	1,702,497	\$ 12,772.71	9.0	
<i>measure max = 40</i>		Residential SOP	N/A	887.0	898.5	2,134,339	\$ 567,783.39
	R-AirInf	Res Air Infiltration	142.00	161.05	328,179	\$ 95,395.77	11.0
	R-CeilingsIns	Res Ceiling Insulation	371.00	594.34	1,468,876	\$ 381,694.24	25.0
	R-CentAC	Res Central AC	38.0	53.86	67,551	\$ 27,049.26	18.0
	R-CentHP	Res Central Heat Pump	21.0	38.1	121,587	\$ 28,303.50	15.0
	R-DuctEff	Res Duct Efficiency Improvement	93.0	30.2	84,503	\$ 20,514.78	18.0
	R-LED 16 EUL	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure)	92.0	1.7	6,756	\$ 1,391.49	16.0
	R-LED 20 EUL	Res Energy Star Omni-Directional LED Lamps (20,000 year Rated Measure)	36.0	0.3	1,096	\$ 228.06	20.0
	R-LFShwrhd	Res Low-Flow Showerheads	94.0	19.0	55,792	\$ 13,206.29	10.0
<i>measure max = 40</i>		Smart Thermostats MTP Pilot	N/A	26.0	-	36,322	\$ 1,300.00
	R-SmtTstat	ENERGY STAR Connected Thermostats	26.00	-	36,322	\$ 1,300.00	11.0
<i>measure max = 40</i>		Refrigerator Recycling MTP	N/A	353.0	50.5	398,184	\$ 54,700.00
	Refrigerator Recycling	Res Refrigerator/Freezer Recycling	353.00	50.48	398,184	\$ 54,700.00	8.0
<i>measure max = 40</i>		Hard-to-Reach SOP	N/A	922.0	691.0	1,531,446	\$ 496,979.66
	R-AirInf	Res Air Infiltration	175.00	160.27	298,868	\$ 107,661.50	11.0
	R-CeilingsIns	Res Ceiling Insulation	365.00	480.38	1,108,730	\$ 351,436.47	25.0
	R-DuctEff	Res Duct Efficiency Improvement	130.00	32.08	68,078	\$ 22,662.42	18.0
	R-LED	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure)	129.00	2.60	9,312	\$ 2,347.11	16.0
	R-LED	Res Energy Star Omni-Directional LED Lamps (20,000 year Rated Measure)	34.00	0.39	1,351	\$ 346.08	20.0
	R-LFShwrhd	Res Low-Flow Showerheads	89.00	15.33	45,107	\$ 12,526.08	10.0
<i>measure max = 40</i>		Low-Income Weatherization	N/A	229.0	265.0	730,512	\$ 420,915.77
	10LED	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure)	33.00	1.32	4,164	\$ 3,381.68	16.0
	12LED	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure)	1.00	0.01	31	\$ 38.18	16.0

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

Automatic Calculations for Cost-effectiveness and Bonus											
Total Admin for Bonus (Excluding Bonus; including cost paid for EECRF)	Total Admin for CE (Including Bonus; excluding cost paid for EECRF)	Total Program Cost for Bonus (Excluding Bonus; including cost paid for EECRF)	Total Program Cost for CE (Including Bonus; excluding cost paid for EECRF)	PV (Avoided Capacity Cost)	PV (Avoided Energy Cost)	PV Avd Capacity Cost * kW	PV Avoided Energy Cost * kWh	Total Avoided Cost	Net Benefits	Ben-Cost Ratio	
\$ 43,150	\$ 84,567	\$ 274,568	\$ 315,985	\$ 2,723	\$ 1,731	\$ 472,957	\$ 1,507,788	\$ 1,980,745	\$ 1,664,760	6.27	
\$ 2,894	\$ 5,672	\$ 18,417	\$ 21,195	\$ 789	\$ 0.501	\$ 42,199	\$ 26,913	\$ 69,113	\$ 47,918	3.26	
\$ 5,663	\$ 11,098	\$ 36,034	\$ 41,469	\$ 550	\$ 0.349	\$ 41,297	\$ 150,717	\$ 192,015	\$ 150,545	4.63	
\$ 34,323	\$ 67,267	\$ 218,401	\$ 251,345	\$ 789	\$ 0.501	\$ 387,376	\$ 1,322,286	\$ 1,709,663	\$ 1,458,318	6.80	
\$ 270	\$ 529	\$ 1,717	\$ 1,976	\$ 595	\$ 0.378	\$ 2,084	\$ 7,871	\$ 9,955	\$ 7,980	5.04	
\$ 51,591	\$ 190,423	\$ 920,373	\$ 1,059,204	\$ 5,880	\$ 4	\$ 948,823	\$ 3,257,440	\$ 4,206,263	\$ 3,147,059	3.97	
\$ 591	\$ 2,182	\$ 10,549	\$ 12,140	\$ 789	\$ 0.501	\$ 12,870	\$ 25,837	\$ 38,707	\$ 26,567	3.19	
\$ 40	\$ 149	\$ 720	\$ 829	\$ 789	\$ 0.501	\$ 1,515	\$ 1,021	\$ 2,536	\$ 1,708	3.06	
\$ 338	\$ 1,249	\$ 6,037	\$ 6,948	\$ 789	\$ 0.501	\$ 4,600	\$ 21,608	\$ 26,208	\$ 19,260	3.77	
\$ 168	\$ 622	\$ 3,004	\$ 3,458	\$ 595	\$ 0.378	\$ 3,543	\$ 4,506	\$ 8,049	\$ 4,591	2.33	
\$ 121	\$ 445	\$ 2,153	\$ 2,478	\$ 789	\$ 0.501	\$ 3,369	\$ 4,278	\$ 7,647	\$ 5,169	3.09	
\$ 1,313	\$ 4,846	\$ 23,421	\$ 26,954	\$ 550	\$ 0.349	\$ 18,670	\$ 62,144	\$ 80,814	\$ 53,860	3.00	
\$ 30,656	\$ 113,150	\$ 546,886	\$ 629,380	\$ 789	\$ 0.501	\$ 566,818	\$ 1,834,969	\$ 2,401,787	\$ 1,772,407	3.82	
\$ 18,364	\$ 67,780	\$ 327,601	\$ 377,017	\$ 789	\$ 0.501	\$ 337,439	\$ 1,303,075	\$ 1,640,514	\$ 1,263,497	4.35	
\$ 31,706	\$ 62,260	\$ 202,556	\$ 233,110	\$ 76	\$ 0	\$ 258,461	\$ 1,313	\$ 259,773	\$ 26,663	1.11	
\$ 31,706	\$ 62,260	\$ 202,556	\$ 233,110	\$ 76	\$ 0.048	\$ 258,461	\$ 1,313	\$ 259,773	\$ 26,663	1.11	
\$ 23,896	\$ 87,838	\$ 423,896	\$ 487,838	\$ 1,934	\$ 1	\$ 230,785	\$ 667,009	\$ 897,794	\$ 409,956	1.84	
\$ 4,963	\$ 18,242	\$ 88,035	\$ 101,314	\$ 549,75	\$ 0.349	\$ 41,627	\$ 103,949	\$ 145,576	\$ 44,262	1.44	
\$ 18,917	\$ 69,535	\$ 335,567	\$ 386,185	\$ 789,07	\$ 0.501	\$ 189,021	\$ 562,683	\$ 751,704	\$ 365,519	1.95	
\$ 17	\$ 61	\$ 295	\$ 339	\$ 595,43	\$ 0.378	\$ 137	\$ 377	\$ 514	\$ 175	1.52	
\$ 8,968	\$ 12,247	\$ 21,740	\$ 25,020	\$ 550	\$ 0	\$ 228,272	\$ 594,796	\$ 823,068	\$ 798,049	32.90	
\$ 8,968	\$ 12,247	\$ 21,740	\$ 25,020	\$ 549,75	\$ 0.349	\$ 228,272	\$ 594,796	\$ 823,068	\$ 798,049	32.90	
\$ 61,286	\$ 156,177	\$ 629,069	\$ 723,960	\$ 6,590	\$ 4	\$ 841,638	\$ 1,281,002	\$ 2,122,640	\$ 1,398,680	2.93	
\$ 10,297	\$ 26,240	\$ 105,693	\$ 121,636	\$ 638,61	\$ 0.406	\$ 102,847	\$ 133,187	\$ 236,035	\$ 114,399	1.94	
\$ 41,200	\$ 104,990	\$ 422,894	\$ 486,684	\$ 1045,94	\$ 0.665	\$ 621,642	\$ 976,353	\$ 1,597,994	\$ 1,111,310	3.28	
\$ 2,920	\$ 7,440	\$ 29,969	\$ 34,490	\$ 881,72	\$ 0.560	\$ 47,487	\$ 37,851	\$ 85,338	\$ 50,849	2.47	
\$ 3,055	\$ 7,785	\$ 31,359	\$ 36,089	\$ 789,07	\$ 0.501	\$ 30,099	\$ 60,970	\$ 91,069	\$ 54,980	2.52	
\$ 2,214	\$ 5,643	\$ 22,729	\$ 26,158	\$ 881,72	\$ 0.560	\$ 26,592	\$ 47,350	\$ 73,942	\$ 47,784	2.83	
\$ 150	\$ 383	\$ 1,542	\$ 1,774	\$ 821,70	\$ 0.522	\$ 1,411	\$ 3,528	\$ 4,939	\$ 3,164	2.78	
\$ 25	\$ 63	\$ 253	\$ 291	\$ 935,38	\$ 0.594	\$ 267	\$ 651	\$ 918	\$ 627	3.16	
\$ 1,425	\$ 3,633	\$ 14,632	\$ 16,839	\$ 595,43	\$ 0.378	\$ 11,294	\$ 21,111	\$ 32,405	\$ 15,566	1.92	
\$ 2,502	\$ 3,075	\$ 3,802	\$ 4,375	\$ 639	\$ 0	\$ -	\$ 14,741	\$ 14,741	\$ 10,365	3.37	
\$ 2,502	\$ 3,075	\$ 3,802	\$ 4,375	\$ 638,61	\$ 0.406	\$ -	\$ 14,741	\$ 14,741	\$ 10,365	3.37	
\$ 15,999	\$ 26,663	\$ 70,699	\$ 81,363	\$ 501	\$ 0	\$ 25,312	\$ 126,888	\$ 152,200	\$ 70,837	1.87	
\$ 15,999	\$ 26,663	\$ 70,699	\$ 81,363	\$ 501	\$ 0.319	\$ 25,312	\$ 126,888	\$ 152,200	\$ 70,837	1.87	
\$ 57,062	\$ 140,635	\$ 554,042	\$ 637,615	\$ 4,919	\$ 3	\$ 644,700	\$ 919,138	\$ 1,563,838	\$ 926,223	2.45	
\$ 12,361	\$ 30,466	\$ 120,023	\$ 138,128	\$ 639	\$ 0.406	\$ 102,352	\$ 121,292	\$ 223,644	\$ 85,516	1.62	
\$ 40,351	\$ 99,450	\$ 391,788	\$ 450,886	\$ 1,046	\$ 0.665	\$ 502,444	\$ 736,965	\$ 1,239,409	\$ 788,523	2.75	
\$ 2,602	\$ 6,413	\$ 25,264	\$ 29,075	\$ 882	\$ 0.560	\$ 28,282	\$ 38,146	\$ 66,429	\$ 37,353	2.28	
\$ 269	\$ 664	\$ 2,617	\$ 3,011	\$ 822	\$ 0.522	\$ 2,132	\$ 4,863	\$ 6,995	\$ 3,984	2.32	
\$ 40	\$ 98	\$ 386	\$ 444	\$ 935	\$ 0.594	\$ 365	\$ 803	\$ 1,168	\$ 724	2.63	
\$ 1,438	\$ 3,545	\$ 13,964	\$ 16,071	\$ 595	\$ 0.378	\$ 9,126	\$ 17,068	\$ 26,194	\$ 10,123	1.63	
\$ 24,920	\$ 92,171	\$ 445,836	\$ 513,087	\$ 5,689	\$ 4	\$ 215,110	\$ 369,777	\$ 584,888	\$ 71,800	1.14	
\$ 200	\$ 741	\$ 3,582	\$ 4,122	\$ 822	\$ 0.522	\$ 1,087	\$ 2,174	\$ 3,261	\$ (861)	0.79	
\$ 2	\$ 8	\$ 40	\$ 47	\$ 822	\$ 0.522	\$ 8	\$ 16	\$ 24	\$ (22)	0.52	

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Additional Analysis (Do Not Include in Filing)									
<i>Estimated Max Bonus (10% NB)</i>	Load Factor	% of Total Avoided Costs from kW	% of Total Avoided Costs from kWh	Total \$/Installation	Total Annual \$/kW	Total Annual \$/kWh	Total Avoided Cost/kW	Total Avoided Cost/kWh	Total Incentive Paid as % of Total Avoided Cost
\$ 166,476	58%				\$ 441				
\$ 4,792	11%	61%	39%	\$ 10,597	\$ 344	\$ 0.3431	\$ 1,292	\$ 1.29	22%
\$ 15,055	66%	22%	78%	\$ 1,885	\$ 480	\$ 0.0835	\$ 2,556	\$ 0.45	16%
\$ 145,832	61%	23%	77%	\$ 5,712	\$ 445	\$ 0.0828	\$ 3,482	\$ 0.65	11%
\$ 798	68%	21%	79%	\$ 395	\$ 491	\$ 0.0825	\$ 2,844	\$ 0.48	15%
\$ 314,706	62%				\$ 758				
\$ 2,657	36%	33%	67%	#DIV/0!	\$ 647	\$ 0.2047	\$ 2,373	\$ 0.75	26%
\$ 171	12%	60%	40%	#DIV/0!	\$ 375	\$ 0.3536	\$ 1,321	\$ 1.25	27%
\$ 1,926	84%	18%	82%	#DIV/0!	\$ 1,036	\$ 0.1401	\$ 4,495	\$ 0.61	22%
\$ 459	23%	44%	56%	#DIV/0!	\$ 505	\$ 0.2523	\$ 1,353	\$ 0.68	35%
\$ 517	23%	44%	56%	#DIV/0!	\$ 504	\$ 0.2524	\$ 1,791	\$ 0.90	27%
\$ 5,386	60%	23%	77%	#DIV/0!	\$ 690	\$ 0.1317	\$ 2,380	\$ 0.45	27%
\$ 177,241	58%	24%	76%	#DIV/0!	\$ 761	\$ 0.1495	\$ 3,344	\$ 0.66	21%
\$ 126,350	69%	21%	79%	#DIV/0!	\$ 766	\$ 0.1261	\$ 3,836	\$ 0.63	19%
\$ 2,666	0%				\$ 59				
\$ 2,666	0%	99%	1%	\$ 33,301	\$ 59	\$ 7.4164	\$ 76	\$ 9.51	66%
\$ 40,996	51%				\$ 1,344				
\$ 4,426	45%	29%	71%	\$ 5,332	\$ 1,163	\$ 0.2959	\$ 1,923	\$ 0.49	57%
\$ 36,552	53%	25%	75%	\$ 11,703	\$ 1,401	\$ 0.2991	\$ 3,138	\$ 0.67	42%
\$ 17	49%	27%	73%	\$ 339	\$ 1,281	\$ 0.2959	\$ 2,234	\$ 0.52	54%
\$ 79,805	47%				\$ 52				
\$ 79,805	47%	28%	72%	#DIV/0!	\$ 52	\$ 0.0128	\$ 1,982	\$ 0.48	2%
\$ 139,868	27%				\$ 700				
\$ 11,440	23%	44%	56%	\$ 857	\$ 656	\$ 0.3221	\$ 1,466	\$ 0.72	40%
\$ 111,131	28%	39%	61%	\$ 1,312	\$ 712	\$ 0.2879	\$ 2,689	\$ 1.09	24%
\$ 5,085	14%	56%	44%	\$ 908	\$ 556	\$ 0.4436	\$ 1,585	\$ 1.26	32%
\$ 5,498	36%	33%	67%	\$ 1,719	\$ 822	\$ 0.2579	\$ 2,387	\$ 0.75	31%
\$ 4,778	32%	36%	64%	\$ 281	\$ 754	\$ 0.2690	\$ 2,452	\$ 0.88	28%
\$ 316	45%	29%	71%	\$ 19	\$ 898	\$ 0.2282	\$ 2,876	\$ 0.73	28%
\$ 63	44%	29%	71%	\$ 8	\$ 887	\$ 0.2306	\$ 3,221	\$ 0.84	25%
\$ 1,557	34%	35%	65%	\$ 179	\$ 771	\$ 0.2623	\$ 1,708	\$ 0.58	41%
\$ 1,037									
\$ 1,037	#DIV/0!	0%	100%	\$ 168	#DIV/0!	\$ 0.1047	#DIV/0!	\$ 0.41	9%
\$ 7,084									
\$ 7,084	90%	17%	83%	\$ 230	\$ 1,401	\$ 0.1776	\$ 3,015	\$ 0.38	36%
\$ 92,622									
\$ 8,552	21%	46%	54%	\$ 789	\$ 749	\$ 0.4016	\$ 1,395	\$ 0.75	48%
\$ 78,852	26%	41%	59%	\$ 1,235	\$ 816	\$ 0.3534	\$ 2,580	\$ 1.12	28%
\$ 3,735	24%	43%	57%	\$ 224	\$ 788	\$ 0.3711	\$ 2,071	\$ 0.98	34%
\$ 398	41%	30%	70%	\$ 23	\$ 1,008	\$ 0.2810	\$ 2,696	\$ 0.75	34%
\$ 72	40%	31%	69%	\$ 13	\$ 989	\$ 0.2856	\$ 2,994	\$ 0.86	30%
\$ 1,012	34%	35%	65%	\$ 181	\$ 911	\$ 0.3096	\$ 1,709	\$ 0.58	48%
\$ 7,180									
\$ (86)	36%	33%	67%	\$ 125	\$ 2,707	\$ 0.8603	\$ 2,465	\$ 0.78	104%
\$ (2)	35%	34%	66%	\$ 47	\$ 4,044	\$ 1.3254	\$ 2,415	\$ 0.79	158%

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

7LED	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure)	25.00	0.53	1,687	\$ 2,378.22	16.0
ATT	Res Ceiling Insulation	30.00	26.66	24,201	\$ 34,659.74	25.0
HP	Res Central Heat Pump	71.00	231.78	695,429	\$ 362,570.11	15.0
PIPE	Res Water Heater Pipe Insulation	1.00	0.01	50	\$ 19.09	13.0
SLR	Res Faucet Aerators	33.00	4.69	4,950	\$ 5,543.74	10.0
STE	site visit	35.00	-	-	\$ 12,325.00	1.0
<i>(Measure count = 40)</i>						
Home Lighting MTP (Residential Portion)		N/A	-	1,683.4	\$ 5,650,639	\$ 251,644.79
LED weighted EUL			0.26	860	\$ 114.00	4.4
LED weighted EUL			4.15	13,943	\$ 1,768.90	4.7
LED weighted EUL			192.20	645,151	\$ 31,744.49	5.2
LED weighted EUL			342.72	1,150,381	\$ 70,319.00	5.5
LED weighted EUL			19.63	65,884	\$ 4,630.78	5.8
LED weighted EUL			450.31	1,511,524	\$ 52,545.45	6.1
LED weighted EUL			22.25	74,701	\$ 3,782.43	6.3
LED weighted EUL			2.14	7,182	\$ 468.35	7.1
LED weighted EUL			193.99	651,154	\$ 23,730.53	7.3
LED weighted EUL			1.66	5,579	\$ 290.70	7.3
LED weighted EUL			1.26	4,230	\$ 220.40	7.9
LED weighted EUL			54.78	183,876	\$ 8,066.93	8.0
LED weighted EUL			4.95	16,618	\$ 820.80	9.0
LED weighted EUL			185.10	621,298	\$ 24,078.23	9.1
LED weighted EUL			1.70	5,716	\$ 219.45	9.3
LED weighted EUL			63.89	214,456	\$ 11,438.00	16.0
LED weighted EUL			16.79	56,363	\$ 3,778.15	16.0
LED weighted EUL			37.40	125,530	\$ 4,081.20	20.0
LED weighted EUL			86.97	291,925	\$ 9,378.88	20.0
LED weighted EUL			1.27	4,268	\$ 168.15	20.0
Portfolio Total			2,550	9,573	\$ 23,327,578	\$ 3,477,145
<i>(Measure count = 40)</i>						

cash incentives check
ag P3 \$ **3,170,636**
\$ 306,509.06

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

\$	141	\$	521	\$	2,519	\$	2,899	\$	822	\$	0.522	\$	438	\$	881	\$	1,319	\$	(1,580)	0.45		
\$	2,052	\$	7,590	\$	36,712	\$	42,249	\$	1,046	\$	0.665	\$	27,889	\$	16,086	\$	43,975	\$	1,726	1.04		
\$	21,466	\$	79,395	\$	384,036	\$	441,965	\$	789	\$	0.501	\$	182,890	\$	348,724	\$	531,614	\$	89,648	1.20		
\$	1	\$	4	\$	20	\$	23	\$	718	\$	0.456	\$	6	\$	23	\$	29	\$	6	1.26		
\$	328	\$	1,214	\$	5,872	\$	6,758	\$	595	\$	0.378	\$	2,792	\$	1,873	\$	4,665	\$	(2,093)	0.69		
\$	730	\$	2,699	\$	13,055	\$	15,024	\$	76	\$	0.048	\$	-	\$	-	\$	-	\$	(15,024)	0.00		
\$	53,071	\$	99,036	\$	304,716	\$	350,680	\$	11,040	\$	7	\$	802,584	\$	1,712,028	\$	2,514,611	\$	2,163,931	7.17		
\$	24	\$	45	\$	138	\$	159	\$	300	\$	0.191	\$	77	\$	164	\$	241	\$	82	1.52		
\$	373	\$	696	\$	2,142	\$	2,465	\$	323	\$	0.205	\$	1,342	\$	2,864	\$	4,206	\$	1,741	1.71		
\$	6,695	\$	12,493	\$	38,439	\$	44,238	\$	352	\$	0.223	\$	67,571	\$	144,139	\$	211,709	\$	167,472	4.79		
\$	14,830	\$	27,674	\$	85,149	\$	97,993	\$	365	\$	0.232	\$	125,226	\$	267,125	\$	392,351	\$	294,357	4.00		
\$	977	\$	1,822	\$	5,607	\$	6,453	\$	386	\$	0.245	\$	7,577	\$	16,162	\$	23,739	\$	17,285	3.68		
\$	11,082	\$	20,679	\$	63,627	\$	73,225	\$	402	\$	0.256	\$	181,101	\$	386,314	\$	567,415	\$	494,190	7.75		
\$	798	\$	1,489	\$	4,580	\$	5,271	\$	410	\$	0.261	\$	9,133	\$	19,482	\$	28,615	\$	23,344	5.43		
\$	99	\$	184	\$	567	\$	653	\$	455	\$	0.289	\$	973	\$	2,076	\$	3,048	\$	2,396	4.67		
\$	5,005	\$	9,339	\$	28,735	\$	33,070	\$	466	\$	0.296	\$	90,395	\$	192,826	\$	283,222	\$	250,152	8.56		
\$	61	\$	114	\$	352	\$	405	\$	466	\$	0.296	\$	775	\$	1,653	\$	2,428	\$	2,023	5.99		
\$	46	\$	87	\$	267	\$	307	\$	496	\$	0.316	\$	626	\$	1,335	\$	1,960	\$	1,653	6.38		
\$	1,701	\$	3,175	\$	9,768	\$	11,242	\$	502	\$	0.319	\$	27,509	\$	58,681	\$	86,190	\$	74,949	7.67		
\$	173	\$	323	\$	994	\$	1,144	\$	548	\$	0.349	\$	2,715	\$	5,792	\$	8,507	\$	7,363	7.44		
\$	5,078	\$	9,476	\$	29,156	\$	33,554	\$	555	\$	0.353	\$	102,792	\$	219,269	\$	322,061	\$	288,507	9.60		
\$	46	\$	86	\$	266	\$	306	\$	562	\$	0.357	\$	957	\$	2,041	\$	2,998	\$	2,692	9.80		
\$	2,412	\$	4,501	\$	13,850	\$	15,939	\$	822	\$	0.522	\$	52,498	\$	111,986	\$	164,485	\$	148,545	10.32		
\$	797	\$	1,487	\$	4,575	\$	5,265	\$	822	\$	0.522	\$	13,798	\$	29,432	\$	43,230	\$	37,965	8.21		
\$	861	\$	1,606	\$	4,942	\$	5,687	\$	935	\$	0.594	\$	34,981	\$	74,619	\$	109,600	\$	103,913	19.27		
\$	1,978	\$	3,691	\$	11,357	\$	13,070	\$	935	\$	0.594	\$	81,349	\$	173,530	\$	254,880	\$	241,810	19.50		
\$	35	\$	66	\$	204	\$	234	\$	935	\$	0.594	\$	1,189	\$	2,537	\$	3,727	\$	3,492	15.90		
\$	374,152	\$	955,093	\$	3,851,297	\$	4,432,238								\$ 4,668,642	\$	10,451,921	\$	15,120,563	\$	10,688,324	3.41

\$ 3,851,297 \$ 4,432,238
Double-check: should = \$0 \$ diff is tied to home lighting -- will be updated

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

\$ (158)	36%	33%	67%	\$ 116	\$ 4,726	\$ 1,4932	\$ 2,474	\$ 0.78	180%
\$ 173	10%	63%	37%	\$ 1,408	\$ 1,377	\$ 1,5169	\$ 1,649	\$ 1.82	79%
\$ 8,965	34%	34%	66%	\$ 6,225	\$ 1,657	\$ 0.5522	\$ 2,294	\$ 0.76	68%
\$ 1	64%	22%	78%	\$ 23	\$ 2,246	\$ 0.4036	\$ 3,258	\$ 0.59	65%
\$ (209)	12%	60%	40%	\$ 205	\$ 1,252	\$ 1,1862	\$ 995	\$ 0.94	119%
\$ (1,502)	#DIV/0!	#DIV/0!	#DIV/0!	\$ 429	#DIV/0!	#DIV/0!	#DIV/0!	#DIV/0!	#DIV/0!
\$ 216,393									
\$ 8	38%	32%	68%	#DIV/0!	\$ 539	\$ 0.1606	\$ 941	\$ 0.28	47%
\$ 174	38%	32%	68%	#DIV/0!	\$ 516	\$ 0.1536	\$ 1,013	\$ 0.30	42%
\$ 16,747	38%	32%	68%	#DIV/0!	\$ 200	\$ 0.0596	\$ 1,101	\$ 0.33	15%
\$ 29,436	38%	32%	68%	#DIV/0!	\$ 248	\$ 0.0740	\$ 1,145	\$ 0.34	18%
\$ 1,729	38%	32%	68%	#DIV/0!	\$ 286	\$ 0.0851	\$ 1,209	\$ 0.36	20%
\$ 49,419	38%	32%	68%	#DIV/0!	\$ 141	\$ 0.0421	\$ 1,260	\$ 0.38	9%
\$ 2,334	38%	32%	68%	#DIV/0!	\$ 206	\$ 0.0613	\$ 1,286	\$ 0.38	13%
\$ 240	38%	32%	68%	#DIV/0!	\$ 265	\$ 0.0790	\$ 1,425	\$ 0.42	15%
\$ 25,015	38%	32%	68%	#DIV/0!	\$ 148	\$ 0.0441	\$ 1,460	\$ 0.43	8%
\$ 202	38%	32%	68%	#DIV/0!	\$ 212	\$ 0.0631	\$ 1,461	\$ 0.44	12%
\$ 165	38%	32%	68%	#DIV/0!	\$ 212	\$ 0.0631	\$ 1,556	\$ 0.46	11%
\$ 7,495	38%	32%	68%	#DIV/0!	\$ 178	\$ 0.0531	\$ 1,573	\$ 0.47	9%
\$ 736	38%	32%	68%	#DIV/0!	\$ 201	\$ 0.0598	\$ 1,718	\$ 0.51	10%
\$ 28,851	38%	32%	68%	#DIV/0!	\$ 158	\$ 0.0469	\$ 1,740	\$ 0.52	7%
\$ 269	38%	32%	68%	#DIV/0!	\$ 156	\$ 0.0465	\$ 1,760	\$ 0.52	7%
\$ 14,855	38%	32%	68%	#DIV/0!	\$ 217	\$ 0.0646	\$ 2,574	\$ 0.77	7%
\$ 3,796	38%	32%	68%	#DIV/0!	\$ 272	\$ 0.0812	\$ 2,574	\$ 0.77	9%
\$ 10,391	38%	32%	68%	#DIV/0!	\$ 132	\$ 0.0394	\$ 2,931	\$ 0.87	4%
\$ 24,181	38%	32%	68%	#DIV/0!	\$ 131	\$ 0.0389	\$ 2,931	\$ 0.87	4%
\$ 349	38%	32%	68%	#DIV/0!	\$ 160	\$ 0.0477	\$ 2,931	\$ 0.87	5%
\$ 1,068,832	28%			\$ 402					

Won't match bonus in
step 4 because net
benefits differ between
CE test and bonus. For
estimate only at the
measure level

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

These columns will auto-populate			Column will auto-populate after entering values in cells F3:H18 and C22-25	Program Specific Admin: Enter Manually			Allocated based on Total Enter Values in cells C22 - ;		
Program	Incentives	Incentive as % of Total Incentives (R&D/Other Admin Allocator)	Program Costs as % of Total Spending (Bonus Allocator)	Program Specific Admin <small>(Do not include the costs paid by a utility for an EECRF proceeding here); these values are exempt from the CE test)</small>	Program Specific R&D	Program Specific EM&V Admin (TetraTech Allocation not actual expenditures)	R&D/Other Admin Portion	EM&V Costs	Bonus Portion
1 Commercial SOP	\$ 231,417.85	7%	7%	\$ 27,449.27	\$ 2,964.58	\$ 12,736.44	\$ -	\$ 41,416.66	
2 Retro-Commissioning MTP	\$ 868,781.23	25%	24%	\$ -	\$ 3,776.72	\$ 47,814.71	\$ -	\$ 138,831.71	
3 Load Management SOP	\$ 170,850.00	5%	5%	\$ 13,382.77	\$ 8,920.24	\$ 9,402.99	\$ -	\$ 30,554.14	
4 Small Commercial MTP	\$ 400,000.00	12%	11%	\$ -	\$ 1,881.74	\$ 22,014.62	\$ -	\$ 63,941.77	
5 Home Lighting MTP (Commercial Portion)	\$ 12,772.71	0%	1%	\$ 2,064.30	\$ 6,200.27	\$ 702.97	\$ -	\$ 3,279.36	
6 Residential SOP	\$ 567,783.39	16%	15%	\$ 27,451.51	\$ 2,585.59	\$ 31,248.83	\$ -	\$ 94,890.66	
7 Smart Thermostats MTP Pilot	\$ 1,300.00	0%	0%		\$ 2,430.39	\$ 71.55	\$ -	\$ 573.50	
8 Refrigerator Recycling MTP	\$ 54,700.00	2%	2%	\$ 10,915.00	\$ 2,073.40	\$ 3,010.50	\$ -	\$ 10,664.43	
9 Hard-to-Reach SOP	\$ 496,979.66	14%	14%	\$ 27,449.27	\$ 2,260.73	\$ 27,352.04	\$ -	\$ 83,573.28	
10 Low-Income Weatherization	\$ 420,915.77	12%	12%		\$ 1,754.50	\$ 23,165.75	\$ -	\$ 67,251.21	
11 Home Lighting MTP (Residential Portion)	\$ 251,644.79	7%	8%	\$ 39,222		\$ 13,849.66	\$ -	\$ 45,964.28	
12 Program 12	\$ -	0%	0%			\$ -	\$ -	\$ -	
13 Program 13	\$ -	0%	0%			\$ -	\$ -	\$ -	
14 Program 14	\$ -	0%	0%			\$ -	\$ -	\$ -	
15 Program 15	\$ -	0%	0%			\$ -	\$ -	\$ -	
16 Program 16	\$ -	0%	0%			\$ -	\$ -	\$ -	
Portfolio Total	\$ 3,477,145	100%	100%	\$ 147,934	\$ -	\$ 34,848.15	\$ 191,370.06	\$ -	\$ 580,941.00

Other Costs to Be Allocated Among All Programs Enter Blue Cells Manually; Green Will Autocalculate if Step 1 completed:	PUC Rule: How to allocate non-program specific expenses
R&D and Non-program specific Admin to be Allocated (Rate Case Expenses Details: Include any costs incurred by the utility for an EECRF filing here unless they have already been included in the program specific admin in column F. Do not include the costs paid by a utility for an EECRF proceeding here; these values are exempt from the CE test. Enter those costs separately in cell C25 below.)	\$ 191,370.06
	(i): Any portion of these costs which are not directly assignable to a specific program shall be allocated among the programs in proportion to the program incentive costs. Any bonus awarded by the commission shall not be included in program costs for the purpose of applying these limits.
Third party EM&V Costs (Ex: Frontier EM&V; counted as admin)	\$ -
	(i): Any portion of these costs which are not directly assignable to a specific program shall be allocated among the programs in proportion to the program incentive costs. Any bonus awarded by the commission shall not be included in program costs for the purpose of applying these limits.
Bonus for Cost-effectiveness (bonus collected during the PY) Costs Paid by a Utility for an EECRF Proceeding (To be included as admin in the "total program cost" input for the bonus calculation in Step 4)	\$ 580,941.00
	(h)(6): The bonus shall be allocated in proportion to the program costs associated with meeting the demand and energy goals and allocated to eligible customers on a rate class basis. These are costs to be included as admin in the "total program costs" for the bonus calculation (per the preamble pg 150). Please note these values are excluded from the cost-effectiveness test (per the preamble and email from Katie Rich). This is why they are not included in either the program-specific admin values or the non-program specific admin in other cells on this tab.

Southwestern Public Service Company

Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019

II Incentives or Program Costs <i>25 and results will auto-populate</i>		
Costs Paid by a Utility for an EERC Proceedings (to be included in Total Admin for Bonus Calculation)	Total Admin for Bonus Calculation (Excluding Bonus)	Total Admin for Cost- effectiveness Calculation (Including Bonus)
\$ -	\$ 43,150.29	\$ 84,566.95
\$ -	\$ 51,591.43	\$ 190,423.14
\$ -	\$ 31,705.00	\$ 62,260.14
\$ -	\$ 23,894.35	\$ 87,838.12
\$ -	\$ 8,957.53	\$ 12,246.89
\$ -	\$ 61,285.93	\$ 156,176.59
\$ -	\$ 2,501.94	\$ 3,075.44
\$ -	\$ 15,998.90	\$ 26,663.33
\$ -	\$ 57,062.04	\$ 140,635.32
\$ -	\$ 24,920.25	\$ 92,171.46
\$ -	\$ 53,073.36	\$ 99,035.64
\$ -	\$ -	\$ -
\$ -	\$ -	\$ -
\$ -	\$ -	\$ -
\$ -	\$ -	\$ -
\$ -	\$ -	\$ -
\$ -	\$ 374,152	\$ 955,093
Total Program Cost Check	\$ 3,851,297	\$ 4,432,238
should match Step 2 cell M922	should match Step 2 cell N922	

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Program Year 2019			
Energy Efficiency Performance Bonus Calculator			
Demand and Energy Goals	kW 5,495	kWh 9,627,240	Directions:
Actual Demand and Energy Savings	9,573	23,327,578	Fill in blue cell and performance bonus will calculate.
Reported/Verified Hard-to-Reach	956		All green cells will auto-populate
Program Costs (excluding bonus)	\$3,851,297		All inputs must be accounted for in the "Fixed Inputs," "Admin Allocation," and "Results Calculator" tabs in order to correctly calculate bonus.
Performance Bonus	\$1,068,832		Please review built in checks on sums to make sure calculation is correct.

17%	Hard-to-Reach Goal Met?
Bonus Calculation Details	
174%	Percentage of Demand Reduction Goal Met (Reported kW/Goal kW)
242%	Percentage of Energy Reduction Goal Met (Reported kWh/Goal kWh)
TRUE	Met Requirements for Performance Bonus?
\$15,120,563	Total Avoided Costs
\$580,941	Docket No. 48297 requirement (add previous bonus to current year bonus calculation)
\$4,432,238	Total Program Costs (including bonus)
\$10,688,324	Net Benefits
\$3,966,489	Calculated Bonus (((Achieved Demand Reduction/Demand Goal - 100%) / 2) * Net Benefits)
\$1,068,832	Maximum Bonus Allowed (10% of Net Benefits)

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Residential & Commercial EULs				
Sector	TRM Measure	Energy Efficiency Measure	EUL (years)	TRM Version
Custom	NA	Custom	NA	NA
Residential	2.1.1	Res Standard Compact Fluorescent Lamps (10,000 to 11,000 hour Rated Measure Life)	11.0	6.0
Residential	2.1.1	Res Standard Compact Fluorescent Lamps (11,001 to 13,500 hour Rated Measure Life)	13.0	6.0
Residential	2.1.1	Res Standard Compact Fluorescent Lamps (13,501 to 17,500 hour Rated Measure Life)	16.0	6.0
Residential	2.1.1	Res Standard Compact Fluorescent Lamps (\geq 17,501 hour Rated Measure Life)	20.0	6.0
Residential	2.1.2	Res Specialty Compact Fluorescent Lamps (10,000 to 11,000 hour Rated Measure Life)	11.0	6.0
Residential	2.1.2	Res Specialty Compact Fluorescent Lamps (11,001 to 13,500 hour Rated Measure Life)	13.0	6.0
Residential	2.1.2	Res Specialty Compact Fluorescent Lamps (13,501 to 17,500 hour Rated Measure Life)	16.0	6.0
Residential	2.1.2	Res Specialty Compact Fluorescent Lamps (\geq 17,501 hour Rated Measure Life)	20.0	6.0
Residential	2.1.3	Res Energy Star Omni-Directional LED Lamps (15,000 year Rated Measure Life)	16.0	6.0
Residential	2.1.3	Res Energy Star Omni-Directional LED Lamps (20,000 year Rated Measure Life)	20.0	6.0
Residential	2.1.4	Res Energy Star Specialty and Directional LED Lamps (15,000 hour Rated Measure Life)	16.0	6.0
Residential	2.1.4	Res Energy Star Specialty and Directional LED Lamps (20,000 hour Rated Measure Life)	20.0	6.0
Residential	2.2.1	Res AC or HP Tune-Up	5.0	6.0
Residential	2.2.2	Res Duct Efficiency Improvement	18.0	6.0
Residential	2.2.3	Res Central AC	18.0	6.0
Residential	2.2.4	Res Ground Source Heat Pump	20.0	6.0
Residential	2.2.5	Res Central Heat Pump	15.0	6.0
Residential	2.2.6	Large Capacity Split System and Single-Package AC	18.0	6.0
Residential	2.2.6	Large Capacity Split System and Single-Package HP	15.0	6.0
Residential	2.2.7	Res Room (Window) Air Conditioner	8.0	6.0
Residential	2.2.8	ENERGY STAR Connected Thermostats	11.0	6.0
Residential	2.2.9	Smart Thermostat Demand Response	1.0	6.0
Residential	2.3.1	Res Air Infiltration	11.0	6.0
Residential	2.3.2	Res Ceiling Insulation	25.0	6.0
Residential	2.3.3	Res Attic Encapsulation	25.0	6.0
Residential	2.3.4	Res Wall Insulation	25.0	6.0
Residential	2.3.5	Res Floor Insulation	25.0	6.0
Residential	2.3.6	Res Energy Star Windows	25.0	6.0
Residential	2.3.7	Res Solar Screens	10.0	6.0

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Residential & Commercial EULs				
Sector	TRM Measure	Energy Efficiency Measure	EUL (years)	TRM Version
Residential	2.3.8	Cool Roofs	15.0	6.0
Residential	2.4.1	Res Faucet Aerators	10.0	6.0
Residential	2.4.2	Res Low-Flow Showerheads	10.0	6.0
Residential	2.4.3	Res Water Heater Pipe Insulation	13.0	6.0
Residential	2.4.4	Res Water Heater Tank Insulation	7.0	6.0
Residential	2.4.5	Res Water Heater Installation-Electric Tankless	20.0	6.0
Residential	2.4.5	Res Water Heater Installation-Fuel Substitution	11.0	6.0
Residential	2.4.6	Res Heat Pump Water Heater	13.0	6.0
Residential	2.4.7	Res Water Heater Replacement-Solar Water Heating	15.0	6.0
Residential	2.4.8	Showerhead Temperature Sensitive Restrictor Valves	10.0	6.0
Residential	2.4.9	Tub Spout and Showerhead Temperature Sensitive Restrictor Valves	10.0	6.0
Residential	2.5.1	Res Energy Star Ceiling Fans	10.0	6.0
Residential	2.5.2	Res Energy Star Clothes Washer	11.0	6.0
Residential	2.5.3	Res Energy Star Dishwashers	15.0	6.0
Residential	2.5.4	Res Energy Star Refrigerators	16.0	6.0
Residential	2.5.5	Energy Star Pool Pumps	10.0	6.0
Residential	2.6.1	Res Refrigerator/Freezer Recycling	8.0	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Halogen Lamps	1.5	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: High Intensity Discharge Lamps	15.5	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Integrated-ballast CCFL Lamps	4.5	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Integrated-ballast CFL Lamps	2.5	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Integral LED Lamps	9.0	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Light Emitting Diode	15.0	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: Modular CFL and CCFL Fixtures	16.0	6.0
Commercial	2.1.1	Comm Lamps and Fixtures: T8 and T5 Linear Fluorescents	15.5	6.0
Commercial	2.1.2	Comm Lighting Controls: Occupancy Sensor	10.0	6.0
Commercial	2.1.2	Comm Lighting Controls: Photocell (Daylighting Control)	10.0	6.0
Commercial	2.1.2	Comm Lighting Controls: Timeclock	10.0	6.0
Commercial	2.1.2	Comm Lighting Controls: Tuning Control	10.0	6.0
Commercial	2.2.1	Comm AC or HP Tune-Up	5.0	6.0
Commercial	2.2.2	Comm Split System/Single Packaged Heat Pumps and Air Conditioners	15.0	6.0

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Residential & Commercial EULs				
Sector	TRM Measure	Energy Efficiency Measure	EUL (years)	TRM Version
Commercial	2.2.3	Comm HVAC Chillers: Screw / Scroll / Reciprocating Chillers	20.0	6.0
Commercial	2.2.3	Comm HVAC Chillers: Centrifugal Chillers	25.0	6.0
Commercial	2.2.4	Comm Packaged Terminal Air Conditioners, Heat Pumps	15.0	6.0
Commercial	2.2.4	Comm Room Air Conditioners	11.0	6.0
Commercial	2.2.5	Comm HVAC VFD on AHU Supply Fans	15.0	6.0
Commercial	2.2.6	Condenser Air Evaporative Pre-Cooling	15.0	6.0
Commercial	2.3.1	Comm Energy Star Roofs	15.0	6.0
Commercial	2.3.2	Comm Window Film	10.0	6.0
Commercial	2.3.3	Entrance and Exit Door Air Infiltration	11.0	6.0
Commercial	2.4.1	Comm High Efficiency Combination Ovens	12.0	6.0
Commercial	2.4.2	Comm High Efficiency Electric Convention Ovens	12.0	6.0
Commercial	2.4.3	Comm Energy Star Commercial Dishwashers	11.0	6.0
Commercial	2.4.4	Comm Hot Food Holding Cabinets	12.0	6.0
Commercial	2.4.5	Comm Energy Star Electric Fryers	12.0	6.0
Commercial	2.4.6	Comm Pre-Rinse Spray Valves	5.0	6.0
Commercial	2.4.7	Comm Energy Star Electric Steam Cookers	12.0	6.0
Commercial	2.5.1	Comm Door Heater Controls	12.0	6.0
Commercial	2.5.2	Comm ECM Evaporator Fan Motor	15.0	6.0
Commercial	2.5.3	Comm Electronic Defrost Controls	10.0	6.0
Commercial	2.5.4	Comm Evaporator Fan Controls	16.0	6.0
Commercial	2.5.5	Comm Night Covers for Open Refrigerated Display Cases	5.0	6.0
Commercial	2.5.6	Comm Solid and Glass Door Reach-Ins	12.0	6.0
Commercial	2.5.7	Comm Strip Curtains for Walk-In Refrigerated Storage	4.0	6.0
Commercial	2.5.8	Comm Zero Energy Doors for Refrigerated Cases	12.0	6.0
Commercial	2.5.9	Door Gaskets for Walk-in and Reach-in Coolers and Freezers	4.0	6.0
Commercial	2.6.1	Comm Vending Machine Controls	5.0	6.0
Commercial	2.6.2	Comm Lodging Guest Room Occupancy Sensor Controls	10.0	6.0
Commercial	2.6.3	Comm Pump-Off Controller	15.0	6.0
Commercial	2.6.4	Energy Star Pool Pumps	10.0	6.0
Measurement and Verification	2.1.1	M&V AC Tune-Up	5.0	6.0
Measurement and Verification	2.1.2	M&V Ground Source HP	15.0	6.0

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Residential & Commercial EULs				
Sector	TRM Measure	Energy Efficiency Measure	EUL (years)	TRM Version
Measurement and Verification	2.1.3	Variable Refrigerant Flow Systems	15.0	6.0
Measurement and Verification	2.2.1	New Homes	23.0	6.0
Measurement and Verification	2.3.1	Nonresidential Solar PV	30.0	6.0
Measurement and Verification	2.3.2	Res Solar PV	30.0	6.0
Measurement and Verification	2.3.3	Solar Shingles	N/A	6.0
Measurement and Verification	2.4.1	Behavioral Measure Overview	1.0	6.0
Measurement and Verification	2.4.2	Air Compressors less than 75 hp	10.0	6.0
Measurement and Verification	2.4.3	Commercial Retro-Commissioning	5.0	6.0
Measurement and Verification	2.5.1	Res Load Curtailment	1.0	6.0
Measurement and Verification	2.5.2	Nonresidential Load Curtailment	1.0	6.0

Southwestern Public Service Company

**Calculation of Net Benefits, Cost Effectiveness,
and Performance Bonus for PY 2019**

Program Cost-effectiveness Summary								
2019	Savings		Costs	Benefits			Benefit-Cost	
Customer Class and Program	kW	kWh	Total Program Costs	Avoided Capacity Costs	Avoided Energy Costs	Total Avoided Cost	Net Benefits	Ben-Cost Ratio
Commercial SOP	623	3,142,792	\$ 315,985	\$ 472,957	\$ 1,507,788	\$ 1,980,745	\$ 1,664,760	6.27
Retro-Commissioning MTP	1,214	6,552,893	\$ 1,059,204	\$ 948,823	\$ 3,257,440	\$ 4,206,263	\$ 3,147,059	3.97
Load Management SOP	3,417	27,312	\$ 233,110	\$ 258,461	\$ 1,313	\$ 259,773	\$ 26,663	1.11
Small Commercial MTP	316	1,420,641	\$ 487,838	\$ 230,785	\$ 667,009	\$ 897,794	\$ 409,956	1.84
Home Lighting MTP (Commercial Portion)	415	1,702,497	\$ 25,020	\$ 228,272	\$ 594,796	\$ 823,068	\$ 798,049	32.90
Residential SOP	899	2,134,339	\$ 723,960	\$ 841,638	\$ 1,281,002	\$ 2,122,640	\$ 1,398,680	2.93
Smart Thermostats MTP Pilot	-	36,322	\$ 4,375	\$ -	\$ 14,741	\$ 14,741	\$ 10,365	3.37
Refrigerator Recycling MTP	50	398,184	\$ 81,363	\$ 25,312	\$ 126,888	\$ 152,200	\$ 70,837	1.87
Hard-to-Reach SOP	691	1,531,446	\$ 637,615	\$ 644,700	\$ 919,138	\$ 1,563,838	\$ 926,223	2.45
Low-Income Weatherization	265	730,512	\$ 513,087	\$ 215,110	\$ 369,777	\$ 584,888	\$ 71,800	1.14
Home Lighting MTP (Residential Portion)	1,683	5,650,639	\$ 350,680	\$ 802,584	\$ 1,712,028	\$ 2,514,611	\$ 2,163,931	7.17
Program 12	-	-	\$ -	\$ -	\$ -	\$ -	\$ -	#DIV/0!
Program 13	-	-	\$ -	\$ -	\$ -	\$ -	\$ -	#DIV/0!
Program 14	-	-	\$ -	\$ -	\$ -	\$ -	\$ -	#DIV/0!
Program 15	-	-	\$ -	\$ -	\$ -	\$ -	\$ -	#DIV/0!
Program 16	-	-	\$ -	\$ -	\$ -	\$ -	\$ -	#DIV/0!
Portfolio Total	9,573	23,327,578	\$ 4,432,238	\$ 4,668,642	\$ 10,451,921	\$ 15,120,563	\$ 10,688,324	3.41

SERVICE AGREEMENT

This Service Agreement is made and entered into this 9 day of September, 2016, by and between Southwestern Public Service Company ("Client Company") and Xcel Energy Services Inc. ("Service Company").

WITNESSETH

WHEREAS, Service Company is a subsidiary of Xcel Energy Inc. ("Xcel Energy"), a public utility holding company under the Public Utility Holding Company Act of 2005 ("PUCHA 2005") that has been formed to provide support services for Xcel Energy and its subsidiaries in a manner consistent with applicable regulatory requirements; and

WHEREAS, Client Company is a utility operating company subsidiary of Xcel Energy and an affiliate of Service Company; and

WHEREAS, Service Company and Client Company have entered into this Service Agreement whereby Service Company agrees to provide and Client Company agrees to accept and pay for various services as provided on a cost basis, the Service Company will fairly and equitably allocate costs among all associate companies to which it renders services, including the Client Company.

NOW THEREFORE, in consideration of the premises and the mutual agreements herein contained, the parties to this Service Agreement covenant and agree as follows:

ARTICLE I - SERVICES

Section 1.1 Service Company shall furnish to Client Company, as requested by Client Company, upon the terms and conditions hereinafter set forth, such of the services described in Appendix A hereto, at such times, for such periods and in such manner as Client Company may from time to time request and that Service Company concludes it is able to perform. Service Company shall also provide Client Company with such special services, in addition to those services described in Appendix A hereto, as may be requested by Client Company and that Service Company concludes it is able to perform. In supplying such services, Service Company may arrange, where it deems appropriate, for the services of such experts, consultants, advisers, and other persons with necessary qualifications as are required for or pertinent to the provision of such services.

Section 1.2 Client Company shall take from Service Company such services described in Section 1.1, and such additional general or special services, whether or not now contemplated, as are requested from time to time by Client Company and that Service Company concludes it is able to perform.

Section 1.3 The services described herein or contemplated to be performed hereunder shall be directly assigned or allocated by activity, project, program, work order or other

appropriate basis. Client Company shall have the right from time to time to amend, alter or rescind any activity, project, program or work order provided that (i) any such amendment or alteration that results in a material change in the scope of the services to be performed or equipment to be provided is agreed to by Service Company, (ii) the cost for the services covered by the activity, project, program or work order shall include any expense incurred by Service Company as a direct result of such amendment, alteration or rescission of the activity, project, program or work order, and (iii) no amendment, alteration or rescission of an activity, project, program or work order shall release Client Company from liability for all costs already incurred by or contracted for by Service Company pursuant to the activity, project, program or work order, regardless of whether the services associated with such costs have been completed.

Section 1.4 Service Company shall use its best efforts to maintain a staff trained and experienced in the design, construction, operation, maintenance, management, and general administration of public utility properties.

ARTICLE II - COMPENSATION

Section 2.1 As compensation for the services to be rendered hereunder, Client Company shall pay to Service Company all costs which reasonably can be identified and related to particular services performed by Service Company for or on its behalf. The methods for assigning or allocating Service Company costs to Client Company, as well as to other associate companies, are set forth in Appendix A.

Section 2.2 Service Company shall periodically review the methods of assignment or allocation of costs described in Appendix A. Such methods of assignment or allocation of costs may be modified or changed by Service Company subject to providing Client Company three months advance notice, and subject to any required state regulatory commission and Federal Energy Regulatory Commission ("FERC") approval. SPS shall comply with Texas Public Utility Regulatory Act and Public Utility Commission of Texas requirements, if any, regarding notice or approval, or both, of proposed modification to the methods of assignment or allocation of costs. SPS shall comply with New Mexico Public Utility Act and New Mexico Public Regulation Commission requirements, if any, regarding notice or approval, or both, of proposed modification to the methods of assignment or allocation of costs.

Section 2.3 No change in the organization of Service Company, the type and character of the companies to be serviced, the methods of assigning or allocating costs to associate companies, or in the scope or character of the services to be rendered shall be made unless such change is consistent with any applicable regulatory requirements.

Section 2.4 Service Company charges are billed electronically monthly to Client Company. The electronic details reflect the billing information necessary to identify the costs charged for that month. By the twenty-third (23rd) day of the following month, the Client Company shall remit to Service Company payment for all charges billed to it in the previous month.

Section 2.5 In the event of a dispute between the Operating Company and Service Company regarding a billing methodology and/or amount, representatives from the parties involved along with Service Company Accounting will meet to discuss the issues. If a resolution cannot be reached, the issue will be referred to each party's executive management for final resolution.

Section 2.6 It is the intent of this Service Agreement that the payment for services rendered by Service Company to Client Company under this Service Agreement shall cover all the costs of its doing business (less the costs of services provided to associated companies not a party to this Service Agreement and to other non-associated companies, and credits for any miscellaneous items), including, but not limited to, salaries and wages, office supplies and expenses, outside services employed, contract labor, property insurance, injuries and damages, employee pensions and benefits, miscellaneous general expenses, rents, maintenance of structures and equipment, depreciation and amortization, and compensation for use of capital.

ARTICLE III - TERM

Section 3.1 This Service Agreement shall become effective upon its execution, or, if required, upon receipt of applicable regulatory approval, and shall continue in full force and effect until terminated by Service Company or Client Company, upon not less than one year's prior written notice to the other party. This Service Agreement shall also be subject to termination or modification at any time, without notice, if and to the extent performance under this Service Agreement may conflict with any regulatory requirement of the FERC or state commission applicable to either Service Company or Client Company adopted before or after the effective date of this Service Agreement.

ARTICLE IV - LIMITATION OF LIABILITY AND INDEMNIFICATION

Section 4.1 In performing the services hereunder, Service Company will exercise due care to assure that the services are performed in an appropriate manner, meet the standards and specifications set forth in any applicable request for service and comply with the applicable standards of law and regulation. However, failure to meet these obligations shall in no event subject Service Company to any claims by or liabilities to Client Company other than to reperform the services and be reimbursed at cost for such reperformance. Service Company makes no other warranty with respect to its performance of the services, and Client Company agrees to accept such services without further warranty of any nature.

Section 4.2 To the fullest extent allowed by law, Client Company shall and does hereby indemnify and agree to save harmless and defend Service Company, its agents and employees from liabilities, taxes, losses, obligations, claims, damages, penalties, causes of action, suits, costs and expenses or judgments of any nature, on account of, or resulting from the performance and prosecution of any services performed on behalf of Client Company pursuant to this Agreement, whether or not the same results or allegedly results from the claimed or actual negligence or breach of warranty of, or willful conduct by, Service Company or any of its employees, agents, clients, or contractors or its or their subcontractors or any combination thereof.

ARTICLE V - MISCELLANEOUS

Section 5.1 All accounts and records of Service Company shall be kept in accordance with either the General Rules and Regulations promulgated by the FERC pursuant to the PUHCA 2005, in particular, the Uniform System of Accounts for Subsidiary Service Companies or the Uniform System of Accounts Prescribed for Public Utilities and Licensees subject to the Provisions of the Federal Power Act promulgated by the FERC, as each is in effect from and after the date hereof.

Section 5.2 New direct or indirect subsidiaries of Xcel Energy, which may come into existence after the effective date of this Service Agreement, may become additional client companies of Service Company and subject to a service agreement with Service Company, or an existing client company may wish to obtain additional services from Service Company. Likewise, an existing direct or indirect subsidiary of Xcel Energy may cease to be a client company or cease to take individual services from Service Company. In either event, the parties hereto shall make such changes in the scope and character of the services to be rendered and the method of assigning or allocating costs of such services as specified in Appendix A, subject to the requirements of Section 2.3, as may become necessary to achieve a fair and equitable assignment or allocation of Service Company costs among all associate companies.

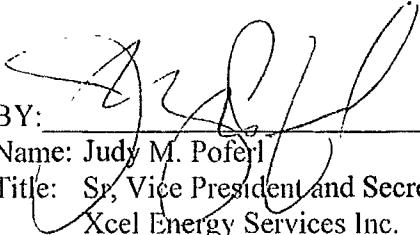
Section 5.3 In the event a Client Company changes the scope of services that it takes from Service Company (pursuant to Section 1.3) or terminates this Service Agreement (pursuant to Section 2.1), the Service Company may bill such Client Company a charge that reflects a proportionate share of any significant residual fixed costs (i.e., incurred costs or commitments to incur costs) that were incurred or committed to incur in contemplation of providing such Client Company service prior to the notice of termination. Examples of fixed costs include, but are not limited to, costs to upgrade computer hardware and software systems to meet Client Company's specifications.

Section 5.4 Service Company shall permit Client Company access to its accounts and records, including the basis and computation of allocations.

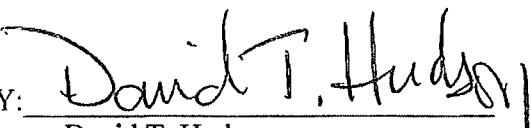
Section 5.5 This Service Agreement supercedes the Service Agreement dated May 28th, 2015.

IN WITNESS WHEREOF, the parties hereto have caused this Service Agreement to be executed as of the date and year first above written.

XCEL ENERGY SERVICES INC.

BY: 
Name: Judy M. Poerl
Title: Sr. Vice President and Secretary
Xcel Energy Services Inc.

SOUTHWESTERN PUBLIC SERVICE COMPANY

BY: 
Name: David T. Hudson
Title: President

Appendix A

DESCRIPTION OF SERVICES TO BE PROVIDED BY XCEL ENERGY SERVICES INC. AND DETERMINATION OF CHARGES FOR SUCH SERVICES TO THE OPERATING COMPANIES AND OTHER AFFILIATES

Description of Services Provided

A description of the services provided by Xcel Energy Services is detailed below. Identifiable costs will be directly assigned to the Operating Companies and other affiliates. For costs that are for services of a general nature and cannot be directly assigned, the method of allocation is described below for each service provided.

*a) Executive Management Services**

Description - Represents charges for Xcel Energy Inc. executive management and services, including, but not limited to, officers of Xcel Energy Inc.

Method of Allocation - Executive Management indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

*b) Investor Relations**

Description - Provides communications to investors and the financial community. Coordinates the transfer agent and shareholder record keeping functions and plans the annual shareholder meeting.

Method of Allocation - Investor Relations indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

*c) Internal Audit**

Description - Reviews internal controls and procedures to ensure assets are safeguarded and transactions are properly authorized and recorded. Evaluates contract risks.

Method of Allocation - Internal Audit indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

*d) Legal**

Description - Provides legal services related to labor and employment law, litigation, contracts, rates and regulation, environmental matters, real estate and other legal matters.

Method of Allocation - Legal indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

e) *Claims Services**

Description - Provides claims services related to casualty, public and company claims.

Method of Allocation - Claims Services costs will be direct charged. Any costs that cannot be direct charged will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio, and the Total Asset Ratio.

f) *Corporate Communications**

Description - Provides corporate communications, speech writing and coordinates media services. Provides advertising and branding development for the companies within the Xcel Energy Inc. system. Manages and tracks all contributions made on behalf of the Xcel Energy Inc. system.

Method of Allocation - Corporate Communications indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

g) *Employee Communications**

Description - Develops and distributes communications to employees.

Method of Allocation - Employee Communications indirect costs will be allocated based on the Employee Ratio.

h) *Corporate Strategy & Business Development**

Description - Facilitates development of corporate strategy and prepares strategic plans, monitors corporate performance and evaluates business opportunities. Develops and facilitates process improvements.

Method of Allocation - Corporate Strategy & Business Development indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

i) *Government Affairs **

Description - Monitors, reviews and researches government legislation.

Method of Allocation - Government Affairs indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

j) *Facilities & Real Estate**

Description - Operates and maintains office buildings and service centers. Procures real estate and administers real estate leases. Administers contracts to provide security, housekeeping and maintenance services for such facilities. Procures office furniture and equipment.

Method of Allocation - Facilities & Real Estate indirect costs will be allocated to the Operating Companies and Affiliate Companies based on the Employee Ratio.

k) *Facilities Administrative Services**

Description - Includes but is not limited to the functions of Mail Delivery, Duplicating and Records Management.

Method of Allocation - Facilities Administrative Services indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio

l) *Supply Chain**

Description - Includes contract negotiations, development and management of supplier relationships and acquisition of goods and services. Also includes inventory planning and forecasting, ordering, accounting and database management. Warehousing services includes receiving, storing, issuing, shipping, returns, and distribution of material and parts.

Method of Allocation - Supply Chain will be direct charged. Any management and oversight of the payment and reporting services that cannot be direct charged will be allocated using the Invoice Transaction Ratio

m) *Supply Chain Special Programs**

Description - Develops and implements special programs utilized across the company such as procurement cards, travel services, and compliance with corporate MWBE (minority women business expenditures) program goals.

Method of Allocation - Supply Chain Special Programs indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio.

*n) Human Resources**

Description - Establishes and administers policies related to employment, compensation and benefits. Maintains Human Resources computer system, the tuition reimbursement plan, and diversity program. Coordinates the bargaining strategy and labor agreements with union employees. Provides technical and professional development training and general Human Resources support services.

Method of Allocation - Human Resources indirect costs will be allocated based on the Employee Ratio.

*o) Finance & Treasury**

Description - Coordinates activities related to securities issuance, including maintaining relationships with financial institutions, cash management, investing activities and monitoring the capital markets. Performs financial and economic analysis.

Method of Allocation - Finance & Treasury indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio, except for:

(1) indirect costs associated with proprietary trading activities, which will be allocated based on the Joint Operating Agreement Peak Hour Megawatt Load Ratio, provided, however, that indirect costs provided jointly for both generation trading activities and proprietary trading activities will be allocated based on the Joint Operating Agreement Labor Hours Ratio.

*p) Accounting, Financial Reporting & Taxes**

Description - Maintains the books and records. Prepares financial and statistical reports, tax filings and ensures compliance with the applicable laws and regulations. Maintains the accounting systems. Coordinates the budgeting process.

Methods of Allocation - Accounting, Financial Reporting & Taxes indirect costs will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio and the Total Assets Ratio, except for:

(1) indirect costs incurred for services associated with proprietary trading activities, which will be allocated based on the Joint Operating Agreement Peak

Hour Megawatt Load Ratio, provided, however, that indirect costs provided jointly for both generation trading activities and proprietary trading activities will be allocated based on the Joint Operating Agreement Labor Hours Ratio.

*q) Payment & Reporting**

Description - Processes payments to vendors and prepares statistical reports.

Method of Allocation - Payment & Reporting indirect costs will be allocated to the Operating Companies and affiliates based on the Invoice Transaction Ratio.

*r) Receipts Processing**

Description - Processes payments received from customers of the Operating Companies and affiliates.

Method of Allocation - Receipts Processing indirect costs will be allocated based on the Customer Bills Ratio.

*s) Payroll**

Description - Processes payroll including but not limited to time reporting, calculation of salaries and wages, payroll tax reporting and compliance reports.

Method of Allocation - Payroll indirect costs will be allocated based on the Employee Ratio.

*t) Rates & Regulation**

Description - Determines the Operating Companies' regulatory strategy, revenue requirements and rates for electric and gas customers. Coordinates the regulatory compliance requirements and maintains relationships with the regulatory bodies.

Method of Allocation - Rates & Regulation indirect costs will be allocated to the Operating Companies based on the Direct Labor Ratio.

*u) Energy Supply Engineering and Environmental**

Description - Provides engineering services to the generation business. Establishes policies and procedures for compliance with environmental laws and regulations. Researches emerging environmental issues and monitors compliance with environmental requirements. Oversees environmental cleanup projects.

Methods of Allocation - Energy Supply Engineering and Environmental services will be direct charged, and administrative support functions that cannot be direct charged will be allocated using a Total Plant Ratio.

v) *Energy Supply Business Resources**

Description - Provides performance, specialists and analytical services to the Operating Companies' generation facilities.

Method of Allocation - Energy Supply Business Resources indirect costs will be allocated using the MWh Generation Ratio.

w) *Energy Markets Regulated Trading & Marketing**

Description - Provides electric trading services to the Operating Companies' electric generation systems including load management, system optimization and resource acquisition.

Methods of Allocation - Energy Markets Regulated Trading & Marketing indirect costs will be allocated to the Operating Companies based on the Total MWh Sales Ratio, except for:

(1) indirect costs incurred for services associated with proprietary trading activities, which will be allocated based on the Joint Operating Agreement Peak Hour Megawatt Load Ratio, provided, however, that indirect costs provided jointly for both generation trading activities and proprietary trading activities will be allocated based on the Joint Operating Agreement Labor Hours Ratio.

x) *Energy Markets - Fuel Procurement**

Description - Purchases fuel for Operating Companies electric generation systems (excluding nuclear).

Method of Allocation - Energy Markets Fuel Procurement indirect costs will be allocated based on the MWh Generation Ratio.

y) *Energy Delivery Marketing**

Description - Develops new business opportunities and markets the products and services for the Delivery Business Unit.

Method of Allocation - Energy Delivery Marketing will be direct charged.

z) *Energy Delivery Construction, Operations & Maintenance (COM)**

Description - Constructs, maintains and operates electric and gas delivery systems.

Method of Allocation - Energy Delivery COM indirect costs will be allocated based on the Delivery Services Gross Plant Ratio.

*aa) Energy Delivery Engineering/Design**

Description - Provides engineering and design services in support of capacity planning, construction, operations and material standards.

Methods of Allocation - Energy Delivery Engineering/Design services will be direct charged; administrative support functions that cannot be direct charged will be allocated using a Delivery Services Gross Plant ratio based on the services being provided.

*bb) Marketing & Sales**

Description - Provides marketing and sales services for the Operating Companies and affiliates for their electric and natural gas customers including strategic planning, segment identification, business analysis, sales planning and customer service.

Method of Allocation - Marketing & Sales indirect costs will be allocated based on the Revenue Ratio.

*cc) Customer Service**

Description - Provides service activities to retail and wholesale customers. These services include meter reading, customer billing, call center and credit and collections.

Method of Allocation - Customer Service indirect costs will be allocated based on the Customers Ratio. Indirect costs associated with administering the low income and certified medical customer assistance programs will be allocated on the composite of the average of the Special Needs Customer Contacts Ratio and Residential Customers Ratio.

*dd) Business Systems**

Description - Provides basic information technology services such as: application management, voice and data network operations and management, customer support services, problem management services, security administration and systems management. In addition, Business Systems acts as a single point of contact for delivery of all information technology services to Xcel Energy Inc. They partner with vendors to ensure the delivery of benchmarking, continuous improvement, and leadership around strategic initiatives and key developments in the marketplace.

Methods of Allocation - Business Systems indirect costs will be allocated using any of the allocation ratios or combination of ratios.

*ee) Aviation Services**

Description - Provides aviation and travel services to employees.

Method of Allocation - Aviation Services will be allocated based on a three-factor formula that is comprised of the average of the Revenue Ratio, the Employee Ratio, and the Total Assets Ratio.

*ff) Fleet**

Description - Oversees the Operating Companies' Fleet Services Group.

Method of Allocation - Fleet will be direct charged.

*Corporate Governance activities within this Service Function will be allocated using the average of the Revenue Ratio with intercompany dividends assigned to Xcel Energy Inc., Employee Ratio with number of common officers assigned to Xcel Energy Inc., and the Total Assets Ratio including Xcel Energy Inc.'s per book assets.