

Exhibit No.:
Issue: Minimum Filing Requirements;
Class Cost of Service;
Rate Design;
Changes to Rules and Regulations
Witness: Tim M. Rush
Type of Exhibit: Direct Testimony
Sponsoring Party: Kansas City Power & Light Company
Case No.: ER-2006-____
Date Testimony Prepared: January 27, 2006

MISSOURI PUBLIC SERVICE COMMISSION

CASE NO. ER-2006-____

DIRECT TESTIMONY

OF

TIM M. RUSH

ON BEHALF OF

KANSAS CITY POWER & LIGHT COMPANY

**Kansas City, Missouri
January 2006**

DIRECT TESTIMONY

OF

TIM M. RUSH

Case No. ER-2006-_____

1 **Q: Please state your name and business address.**

2 A: My name is Tim M. Rush. My business address is 1201 Walnut, Kansas City, Missouri
3 64106-2124.

4 **Q: By whom and in what capacity are you employed?**

5 A: I am employed by Kansas City Power & Light Company ("KCPL" or "Company") as
6 Director, Regulatory Affairs.

7 **Q: What are your responsibilities?**

8 A: My general responsibilities include overseeing the preparation of the rate case, class cost
9 of service and rate design of the Company. I am also responsible for overseeing the
10 regulatory reporting and general activities as they relate to the Missouri Public Service
11 Commission ("MPSC").

12 **Q: Please describe your education, experience and employment history.**

13 A: In addition to public schools, I received a Master's Degree in Business Administration
14 from Northwest Missouri State University in Maryville, Missouri. I did my
15 undergraduate study at both the University of Kansas in Lawrence and the University of
16 Missouri in Columbia. I received a Bachelor of Science Degree in Business
17 Administration with a concentration in Accounting from the University of Missouri in
18 Columbia.

1 **Q: Have you previously testified in a proceeding at the MPSC or before any other**
2 **utility regulatory agency?**

3 A: I have testified on numerous occasions before the MPSC on a variety of issues affecting
4 regulated public utilities.

5 **Q: What is the purpose of your testimony?**

6 A: The purpose of my testimony is to explain how KCPL has satisfied the MPSC's
7 minimum filing requirements ("MFR") and to explain the results of, and how KCPL
8 proposes to implement, the class cost of service study it conducted pursuant to the terms
9 of the Stipulation and Agreement concerning KCPL's Regulatory Plan, which the MPSC
10 approved in Case No. EO-2005-0329 ("Regulatory Plan Stipulation and Agreement").
11 My direct testimony will also discuss KCPL's proposed rate design and changes to the
12 Company's General Rules and Regulations, as set forth in its Missouri tariffs ("Missouri
13 Rules").

14 **I. MINIMUM FILING REQUIREMENTS**

15 **Q: What is the purpose of this part of your testimony?**

16 A: My purpose is to confirm that KCPL has satisfied the MPSC's MFR, as set forth in 4 CSR
17 § 240-3.030 and 4 CSR § 240-3.160.

18 **Q: How did KCPL satisfy the MFR?**

19 A: The following information was prepared addressing the specific requirements of the MFR
20 as outlined in 4 CSR § 240-3.030(3):

21 A: Letter of transmittal

22 B: General information, including:

1. the amount of dollars of the aggregate annual increase and percentage over current revenues;
2. names of counties and communities affected;
3. the number of customers to be affected;
4. the average change requested in dollars and percentage change from current rates;
5. the proposed annual aggregate change by general categories of service and by rate classification;
6. press releases relative to the filing; and
7. a summary of reasons for the proposed changes.

Q: Are you sponsoring this information?

A: Yes, I am.

Q: Was this information prepared under your direct supervision?

A: Yes, it was.

Q: Were the provisions of 4 CSR 240-3.160 also addressed, concerning a depreciation study, database and property unit catalog?

A: Pursuant to 4 CSR § 240-3.160(1)(A), the Company is not required to submit the information included in this section with this filing because the MPSC staff has received these items from the Company within the three years prior to the Company filing for a general increase. The depreciation and amortization rates used in the preparation are found in Appendix G-1 through G-3 of the Regulatory Plan Stipulation and Agreement.

II. ELECTRIC RATE DESIGN

1. Cost of Service

1 **Q: Are you sponsoring the electric tariffs filed in this case?**

2 A: Yes, I am.

3 **Q: Please describe generally the electric tariffs and the proposed changes and how the**
4 **rate design set out in these tariffs was developed.**

5 A: The proposed tariffs and rate design are the result of an extensive effort on the part of
6 KCPL to determine the Company's appropriate cost of providing service and the
7 appropriate rate design. The general goal of the Company's electric rate design as
8 contained in the proposed tariffs is to provide reasonable energy prices that encourage the
9 efficient use of electricity while at the same time allowing a reasonable return on
10 investment. The Company developed a class cost of service ("COS") study as set out in
11 the Regulatory Plan Stipulation and Agreement. The class COS study was used to help
12 develop the appropriate revenues for each class of service. KCPL witness Lois J. Liechti
13 is sponsoring the testimony on the development of the class COS study.

14 **Q: What is the purpose of a class COS study?**

15 A: The purpose of a class COS study is to determine the return on rate base of each class of
16 customer served in relation to the total Company return on rate base. Such a study
17 provides guidance to determine if any adjustments are necessary in the class revenue
18 requirements. The conclusions from the class COS study performed in this case appear
19 as Schedule LJL-1, pages 1 through 3, attached to the testimony of Lois J. Liechti.

20 **Q: What did the results of the study show?**

21 A: The results indicate that the residential class is not providing a comparable return on rate
22 base in comparison to all other major classes of customers. The results of the class cost
23 of service show a return in the residential class that is 74% of the overall average. This is

1 shown by looking on line 0430 of LJJ-1, page 1 of 3. The overall rate of return, line
2 0420 is 7.416% for the Missouri retail, column 601 and the residential class has a return
3 of 5.497%. This latter amount is 74% of the overall return. This demonstrates that the
4 residential class is not earning an equal return to the other classes. Small General Service
5 Class is 11% above the overall average rate of return. Medium General Service is 40%
6 above the overall return. Large General Service is 21% above the overall average and
7 Large Power Service is 12% above the average. The column 607, Off-Peak Lighting was
8 not used, but the results were all included in the Other Lighting Class, column 608. This
9 class showed a rate of return that was 39% of the overall average.

10 **Q. What kind of increases in rates would be required to each class have each class**
11 **provide the average rate of return?**

12 A. In order to provide an equal return on rate base for all classes of customers, the
13 residential class revenues would have to be increased by 7.45% and the small, medium,
14 large general service classes and large power class would have to be reduced by 2.99%,
15 9.04%, 4.60% and 2.29%, respectively. The Other Lighting Class would be increased by
16 10.30%. The results of levelizing the classes is shown on page 2 of Schedule LJJ-1 on
17 line 0880. If the Company were to recommend these changes, the changes would be
18 made in addition to the requested increase of the Company. The Company is requesting
19 an overall increase of 11.45%. To reflect the changes described above and the overall
20 increase request would result in an increase to the residential class of nearly 20%.

21 **Q: What rate adjustments are being proposed for each class?**

1 A: The Company does not propose to change the current relationship of customer class
2 returns to the average jurisdictional return. The Company is recommending an equal
3 percentage increase be to all customer classes with minimal changes to rate design.

4 **Q: Why are you not suggesting changes to customer class revenues based on the**
5 **outcome of the class COS study?**

6 A: KCPL completed a class COS and rate design case in 1996. This case included major
7 restructuring of all rate schedules and included shifts of revenue between classes to move
8 class returns closer to the average jurisdictional return. It is the Company's position that
9 any additional shift in revenue requirement among classes for the purpose of achieving
10 equal returns of all classes is more appropriately addressed in a future rate design case.
11 KCPL has not requested an increase in rates in over twenty years. Some disparity
12 between customer class rates of return has been in existence for the entire twenty year
13 period and perhaps as long as fifty years. KCPL does not believe it is appropriate to
14 increase any class of customer rates higher than the average in this case. Minimal
15 movement toward average rate of return would be required to minimize the impact on
16 individual customers' bills. It is KCPL's position that even a minimal increase above
17 average would add undue burden on those customers at this time. In addition, a class
18 COS study is only a guide and provides cost by class for only a particular point in time.
19 Because of the significant investments the Company is making, including investments in
20 customer programs designed to assist customers in managing their energy bill, it is
21 premature to align average class rates of return in this case. It is KCPL's belief that the
22 appropriate time to move toward equal rate of return for all customer classes is after
23 completion of the Regulatory Plan and the in-service date of the base load coal plant.

1 Subsequent to that case it may be appropriate to file another rate design case based on a
2 revenue neutral jurisdictional revenue requirement that would result in minimizing a one-
3 time impact of any particular customer or class of customer.

4 2. *Rate Design*

5 **Q: Describe the general approach and the proposed modification for each electric rate**
6 **design change that KCPL is recommending in this proceeding.**

7 A: With the exception of space-heating rates, residential service charges, adjustments related
8 to revised line losses for commercial and industrial customers and some clean up of our
9 tariffs, KCPL's proposed rates reflect equal percentage increases for all charges.

10 **Q: How is the increase to the residential class to be implemented?**

11 A: Schedule TMR-1, page 1 outlines the proposed residential rate adjustments. In general,
12 we are proposing to maintain the current relationship of rate design within the residential
13 class, except to increase the service charge by a larger percentage than the other rate
14 components. The reason for increasing the service charge is to more closely approximate
15 the cost of providing this service. The overall class rate adjustment is then adjusted by
16 the overall percentage and reflects the average of the overall rate request by the
17 Company. The overall proposed change in rates for the residential class is equal to the
18 average. KCPL provides separate meter space heating to customers with two meters.
19 One meter includes general usage and the other includes space-heating usage. The
20 practice of having two meters was initiated years ago when the electric heating market
21 was first developing and usually the loads could be separated. We are recommending to
22 no longer offer separate meter space-heating for new residential customers. Separate

meter space-heating will continue to be available to those existing customers who have this service.

Q: How are you proposing to modify the small, medium and large general service classes and the large power class rates?

A: The classes consist of numerous rate codes, which are differentiated by voltage level and all-electric versus general usage categories for all commercial and industrial customers. We propose to maintain the same rate classifications with several modifications within some of the categories. The Company recently completed a line loss study, which was part of the Regulatory Plan Stipulation and Agreement. The results of the line loss study were used in the class COS study and we are proposing to use the line loss study to differentiate voltage level rates. Second, we are proposing to adjust each of the all-electric winter energy charge rates by 5% above the average increase in the overall class. While making this recommendation, we are also proposing to change the availability section in the all-electric rates to allow customers who are not all-electric, but whose primary heating source is electric heat, to qualify for this rate. We currently offer separate meter space heating in each of the rates schedules for both primary and secondary service. We do not have any customers under the primary voltage level separate meter space-heating category and are recommending deleting this provision. We also have service charges within each rate schedule that vary based on the size of the customer. We are recommending deleting those service charges where we do not have customers or the customer usage characteristics would be such as they should be on another rate schedule. These latter two changes are essentially clean-up and simplification changes from the rate design case in 1996. We are also recommending

1 removing the provisions that established a different method for calculating facilities
2 charges for customers who were on a specific rate in 1996, the time that the rate design
3 case went into effect. The classes' overall rate adjustments reflect the average of the
4 overall rate request by the Company.

5 **Q: How are you proposing to modify the lighting class?**

6 A: The lighting class consists of numerous rate codes, which include customer-owned off-
7 peak street lighting, traffic signals and street lighting. We propose to maintain the same
8 rate classifications and to increase each rate component by the average increase proposed
9 for the Company. For the customer owned lighting schedule, we are proposing to
10 simplify the calculation from a multiple step rate to a single charge per Kwh. The overall
11 class increase is 11.46% to each of the tariffs.

12 **Q: What impact do the changes in rates have on the residential general use class?**

13 A: Attached and marked as Schedule TMR-2 is a comparison for various usage levels of
14 typical residential general use class customers.

15 **Q. Are there any other changes the Company is recommending?**

16 A: Yes, we are proposing several modifications in the Rules and Regulations of the
17 Company.

18 III. RULES AND REGULATIONS

19 **Q: Does KCPL's filing address changes to the Company's Missouri Rules?**

20 A: Yes, another part of the rate making and planning process has been to look at KCPL's
21 Missouri Rules. We have identified three broad, guiding themes for review: (i) adding
22 clarity, where needed; (ii) providing for consistency; and (iii) simplifying the existing
23 Missouri Rules to better serve customers.

1 **Q: Would you discuss, in greater detail, what is meant by adding clarity to the Missouri**
2 **Rules?**

3 A: We are seeking to clarify our Missouri Rules by providing clearer definitions. For
4 instance, in our current rules and regulations we use the word “Adult,” however, that
5 word is not defined. To address this and similar issues, we are proposing to add ten (10)
6 new definitions to the Missouri Rules: Adult, Billing Error, Field Error, Fraud, Individual
7 Liability, Meter Error, Responsible Party, Tampering, Time of Application and
8 Unauthorized Use.

9 We recommend clarifying the treatment of “Other Extensions” in Missouri Rule 9.02. As
10 currently written, a customer could infer that the rule for Other Extensions may be
11 applied for line extensions for temporary service. To eliminate this possible
12 misunderstanding, we are proposing revisions to the language by adding the word
13 “permanent” to the opening sentence.

14 **Q: How would you, generally, describe what you refer to as providing for consistency**
15 **in the Missouri Rules?**

16 A: The first area is the returned check charge. We recommend bringing our insufficient
17 check charge amount more in line with our cost of providing this service. In Missouri,
18 the current charge is ten-dollars (\$10). We are recommending a change to the Missouri
19 charge to thirty dollars (\$30), which is in line with our actual costs of processing and
20 collecting on a returned check. We are also requesting this change in Kansas.

21 We also propose to implement the use of credit and debit cards as a means of payment for
22 residential customers with no fee charge to the customer. Under Missouri Rule 4.03, we
23 recommend including language to define that bills for residential service may be paid by

1 means of check, cash, credit or debit card. The basis for this recommendation is
2 contained in the direct testimony of KCPL witness Susan K. Nathan. Additionally, we
3 are recommending in Missouri to discontinue the practice of allowing third parties to
4 charge a fee of up to one dollar (\$1.00) at pay stations. We currently do not allow pay
5 stations to charge a collection fee in Kansas and it is our intent for consistency to
6 implement this practice in Missouri. With all of the payment options available, we
7 believe that allowing multiple options at no cost provides customers the best means for
8 paying for service.

9 KCPL is also recommending changing its deposit interest rate for Missouri customers, as
10 set forth in Missouri Rule 2.07(D). We recommend a deposit rate consistent among
11 commercial, industrial and residential customers equal to the federal reserve prime rate
12 plus 1%. Currently, KCPL pays nine percent (9%) on deposits to customers in Missouri.
13 This change is similar to other major utilities in the state deposit practice. Maintaining
14 the current fixed deposit rate does not account for the changes that occur in interest rates
15 over time.

16 KCPL proposes to remove the reference to "Seasonal" service from Missouri Rule 2.06
17 as the Company ceased providing Seasonal Rates, Amusement Parks, Baseball Fields,
18 and Christmas Tree Lots, etc., with rate changes for Missouri in 1996.

19 **Q: You mentioned simplification, what sorts of changes do you propose to simplify**
20 **matters for Customers and Customer Care personnel?**

21 **A:** First, each of our Missouri and Kansas jurisdictions has its own electric line extension
22 rules for single-phase, single-family dwellings for residential customers. In Missouri,
23 the rule provides the Customer 210 feet of Company facilities at no cost to the customer.

1 In Kansas, the rule provides up to one-quarter mile onto the customer's property. Our
2 recommendation is to change the Missouri rule to the current extension language in the
3 Kansas rule. This change would then give Missouri customers the same one-quarter mile
4 benefit as our Kansas customers. This change will also provide consistency between our
5 Missouri and Kansas jurisdictions and simplify the work of customer care personnel.

6 Within the context of single-phase, single family residential extensions, we are proposing
7 a change in the monthly recovery rate applied to amounts customers owe in excess of
8 costs provided by KCPL for residential customer extensions. We recommend modifying
9 this provision to provide more flexibility in arranging payments.

10 Another area of simplification for our customers and employees has been dealing with
11 customer needs for provision of service beyond what is normally provided a similarly
12 situated customer. In an effort to add simplicity to our relationships with customers
13 between Missouri and Kansas, and to provide a basis for our employees in their dealings
14 with customers in these matters, we are recommending an "Excess Facilities Charge."
15 The Excess Facilities Charge is a charge to customers for facilities and services above
16 and beyond the normal amount required for providing service.

17 The last suggested change regarding simplification is combining the rules for "Liability
18 of Company" and "Continuity of Service," Missouri Rules 3.17 and 3.09, respectively.
19 The language found in each of these sections is identical. We are simply recommending
20 that we consolidate the two rules into one, with a general heading that covers both
21 Liability and Continuity.

22 **Q: Does that conclude your testimony?**

23 **A:** Yes, it does.

In the Matter of the Application of Kansas City)
Power & Light Company to Modify Its Tariff to) Case No. ER-2006-_____
Begin the Implementation of Its Regulatory Plan)

STATE OF MISSOURI)
) ss
COUNTY OF JACKSON)

1. My name is Tim M. Rush. I work in Kansas City, Missouri, and I am employed by Kansas City Power & Light Company as Director, Regulatory Affairs.

3. I have knowledge of the matters set forth therein. I hereby swear and affirm that my answers contained in the attached testimony to the questions therein propounded, including any attachments thereto, are true and accurate to the best of my knowledge, information and belief.

~~Tim M. Rush~~

Subscribed and sworn before me this 27th day of January 2006.

Notary Public

My commission expires:

CAROL SIVILS
Notary Public - Notary Seal
STATE OF MISSOURI
Clay County
My Commission Expires: June 15, 2007

RESIDENTIAL GENERAL SERVICES SUMMARY OF PROPOSAL SCENARIOS MISSOURI

[http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/\[MO TMR-1.xls\]MO Residential](http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Residential)

| INPUT FOR MODEL | |
|----------------------------------|--|
| Cust Chg | |
| CUSTOMER CHARGE | |
| One Meter | |
| Two Meters | |
| ENERGY CHARGE | |
| Summer Rate | |
| 0-600 | |
| 600-1000 | |
| 1000+ | |
| Winter Rates | |
| <u>Winter Gen - RESA/RESC</u> | |
| 0-600 | |
| 600-1000 | |
| 1000+ | |
| <u>Winter Gen&S/H - RESB</u> | |
| 0-600 | |
| 600-1000 | |
| 1000+ | |
| <u>Sep Space Heat Mtr</u> | |
| Winter | |
| Summer | |
| <u>T-O-U (RTOD)</u> | |
| Customer Charge | |
| Summer On-Peak | |
| Summer Off-Peak | |
| Winter | |

| Current Rates | Proposed Rates | Overall Increase (%) |
|---------------|----------------|----------------------|
| 6.11 | 8.36 | 36.82% |
| 7.56 | 10.03 | 32.67% |
| 0.0740 | 0.0814 | 10.00% |
| 0.0740 | 0.0814 | 10.00% |
| 0.0740 | 0.0814 | 10.00% |
| 0.0666 | 0.0674 | 1.20% |
| 0.0398 | 0.0513 | 28.89% |
| 0.0332 | 0.0379 | 14.16% |
| 0.0468 | 0.0513 | 9.62% |
| 0.0468 | 0.0513 | 9.62% |
| 0.0326 | 0.0375 | 15.03% |
| 0.0318 | 0.0375 | 17.92% |
| 0.0740 | 0.0814 | 10.00% |
| 9.42 | 10.50 | 11.46% |
| 0.1134 | 0.1264 | 11.46% |
| 0.0632 | 0.0704 | 11.39% |
| 0.0468 | 0.0522 | 11.54% |

SMALL GENERAL SERVICES SUMMARY OF PROPOSAL SCENARIOS MISSOURI

http://spportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Small General

| INPUT FOR MODEL | |
|---|--|
| Cust Chg | |
| A: CUSTOMER CHARGE | |
| Metered Service: | |
| 0-24 KW | |
| 25-199 KW | |
| 200-999 KW | |
| 1001+ KW | |
| Unmetered Service | |
| Separately Metered Space Heat | |
| B: FACILITIES CHARGE | |
| SECONDARY: | |
| 0-25 KW | |
| 26+ KW | |
| PRIMARY: | |
| 0-26 KW | |
| 27+ KW | |
| C: ENERGY CHARGE | |
| <u>SECONDARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| D: SEPARATELY METERED S/H-WINTER | |
| SECONDARY | |
| PRIMARY | |

| Current Rates | Proposed Rates | Overall Increase (%) |
|---------------|----------------|----------------------|
| | | - |
| | | - |
| 11.18 | 12.46 | 11.45% |
| 30.98 | 34.53 | 11.46% |
| 62.92 | 34.53 | -45.12% |
| 537.24 | 34.53 | -93.57% |
| 4.68 | 5.22 | 11.54% |
| 1.45 | 1.62 | 11.72% |
| | | - |
| | 0 | - |
| 1.840 | 2.051 | 11.47% |
| | 0 | - |
| 1.802 | 2.009 | 11.49% |
| | | - |
| | | - |
| 0.10071 | 0.1121 | 11.31% |
| 0.04779 | 0.0532 | 11.32% |
| 0.04257 | 0.0474 | 11.35% |
| | | - |
| 0.07826 | 0.0872 | 11.42% |
| 0.03820 | 0.0426 | 11.52% |
| 0.03447 | 0.0387 | 12.27% |
| | | |
| 0.09870 | 0.1096 | 11.04% |
| 0.04683 | 0.0519 | 10.83% |
| 0.04172 | 0.0463 | 10.98% |
| | | |
| 0.07669 | 0.0852 | 11.10% |
| 0.03743 | 0.0416 | 11.14% |
| 0.03378 | 0.0378 | 11.90% |
| | | |
| 0.05348 | 0.0626 | 17.05% |
| 0.03392 | 0.0399 | 17.63% |
| 0.03392 | 0.0382 | 12.62% |
| | | |
| 0.05242 | 0.0612 | 16.75% |
| 0.03324 | 0.0390 | 17.33% |
| 0.03324 | 0.0373 | 12.21% |
| | | |
| 0.03447 | 0.038 | 10.24% |
| 0.03378 | 0.038 | 12.49% |

MEDIUM GENERAL SERVICE SUMMARY OF PROPOSAL SCENARIOS MISSOURI

http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Med General

| INPUT FOR MODEL | |
|---|--|
| Cust Chg | |
| A: CUSTOMER CHARGE | |
| 0-24 KW | |
| 25-199 KW | |
| 200-999 KW | |
| 1001+ KW | |
| Separately Metered Space Heat | |
| B: FACILITIES CHARGE | |
| SECONDARY: | |
| PRIMARY: | |
| C: DEMAND CHARGE | |
| SECONDARY-SUMMER: | |
| SECONDARY-WINTER | |
| PRIMARY-SUMMER | |
| PRIMARY-WINTER | |
| SECONDARY-WINTER - ELEC ONLY | |
| PRIMARY-WINTER - ELEC ONLY | |
| D: ENERGY CHARGE | |
| <u>SECONDARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| E: SEPARATELY METERED S/H-WINTER | |
| SECONDARY | |
| PRIMARY | |
| F: REACTIVE DEMAND ADJUSTMENT | |

| Current Rates | Proposed Rates | Overall Increase (%) |
|---------------|----------------|----------------------|
| | | - |
| 30.98 | 34.53 | 11.46% |
| 30.98 | 34.53 | 11.46% |
| 62.92 | 34.53 | -45.12% |
| 537.24 | 34.53 | -93.57% |
| 1.45 | 1.62 | 11.72% |
| | | - |
| | | - |
| 1.84 | 2.051 | 11.47% |
| 1.53 | 1.705 | 11.44% |
| | | - |
| | | - |
| 2.544 | 2.836 | 11.48% |
| 1.294 | 1.442 | 11.44% |
| 2.493 | 2.771 | 11.15% |
| 1.268 | 1.409 | 11.12% |
| 1.834 | 2.044 | 11.45% |
| 1.798 | 1.998 | 11.12% |
| | | - |
| | | - |
| 0.06651 | 0.0740 | 11.26% |
| 0.04543 | 0.0506 | 11.38% |
| 0.03839 | 0.0428 | 11.49% |
| | | - |
| 0.05745 | 0.0639 | 11.23% |
| 0.03445 | 0.0383 | 11.18% |
| 0.02896 | 0.0322 | 11.19% |
| | | - |
| 0.06519 | 0.0723 | 10.91% |
| 0.04452 | 0.0495 | 11.19% |
| 0.03763 | 0.0418 | 11.08% |
| | | - |
| 0.05630 | 0.0624 | 10.83% |
| 0.03376 | 0.0375 | 11.08% |
| 0.02838 | 0.0314 | 10.64% |
| | | - |
| 0.03520 | 0.0411 | 16.76% |
| 0.02318 | 0.0275 | 18.64% |
| 0.02123 | 0.0246 | 15.87% |
| | | - |
| 0.03449 | 0.0402 | 16.56% |
| 0.02272 | 0.0269 | 18.40% |
| 0.02080 | 0.0241 | 15.87% |
| | | - |
| 0.02896 | 0.0322 | 11.19% |
| 0.02838 | 0.0314 | 10.64% |
| | | - |
| 0.452 | 0.504 | 11.50% |

LARGE GENERAL SERVICE SUMMARY OF PROPOSAL SCENARIOS MISSOURI

http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Large General

| INPUT FOR MODEL | |
|---|--|
| Cust Chg | |
| A: CUSTOMER CHARGE | |
| 0-24 KW | |
| 25-199 KW | |
| 200-999 KW | |
| 1001+ KW | |
| Separately Metered Space Heat | |
| B: FACILITIES CHARGE | |
| SECONDARY: | |
| PRIMARY: | |
| C: DEMAND CHARGE | |
| SECONDARY-SUMMER: | |
| SECONDARY-WINTER | |
| PRIMARY-SUMMER | |
| PRIMARY-WINTER | |
| SECONDARY-WINTER - ELEC ONLY | |
| PRIMARY-WINTER - ELEC ONLY | |
| D: ENERGY CHARGE | |
| <u>SECONDARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-SUMMER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER:</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>SECONDARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| <u>PRIMARY-WINTER - ALL ELECTRIC</u> | |
| 0-180 hrs use per month | |
| 181-360 hrs use per month | |
| 361+ hrs use per month | |
| E. SEPARATELY METERED S/H-WINTER | |
| SECONDARY | |
| PRIMARY | |
| F: REACTIVE DEMAND ADJUSTMENT | |

| Current Rates | Proposed Rates | Overall Increase (%) |
|---------------|----------------|----------------------|
| | | - |
| 62.92 | 70.13 | 11.46% |
| 62.92 | 70.13 | 11.46% |
| 62.92 | 70.13 | 11.46% |
| 537.24 | 598.81 | 11.46% |
| 1.45 | 1.62 | 11.72% |
| | | - |
| | | - |
| 1.84 | 2.051 | 11.47% |
| 1.53 | 1.705 | 11.44% |
| | | - |
| | | - |
| 3.680 | 4.102 | 11.47% |
| 1.981 | 2.208 | 11.46% |
| 3.607 | 4.007 | 11.09% |
| 1.941 | 2.157 | 11.13% |
| 1.834 | 2.044 | 11.45% |
| 1.798 | 1.997 | 11.07% |
| | | - |
| | | - |
| 0.05405 | 0.0593 | 9.71% |
| 0.04114 | 0.0454 | 10.35% |
| 0.03216 | 0.0354 | 10.07% |
| | | - |
| 0.04969 | 0.0548 | 10.28% |
| 0.03161 | 0.0349 | 10.41% |
| 0.02712 | 0.0301 | 10.99% |
| | | |
| 0.05297 | 0.0581 | 9.68% |
| 0.04032 | 0.0444 | 10.12% |
| 0.03152 | 0.0347 | 10.09% |
| | | |
| 0.04869 | 0.0536 | 10.08% |
| 0.03098 | 0.0341 | 10.07% |
| 0.02658 | 0.0292 | 9.86% |
| | | |
| 0.03520 | 0.0412 | 17.05% |
| 0.02318 | 0.0272 | 17.34% |
| 0.02123 | 0.0251 | 18.23% |
| | | |
| 0.03449 | 0.0402 | 16.56% |
| 0.02272 | 0.0265 | 16.64% |
| 0.02080 | 0.0245 | 17.79% |
| | | |
| 0.02712 | 0.0302 | 11.36% |
| 0.02658 | 0.0295 | 10.99% |
| | | |
| 0.452 | 0.504 | 11.50% |

LARGE POWER SERVICE SUMMARY OF PROPOSAL SCENARIOS MISSOURI

http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Large Power

| INPUT FOR MODEL | | | |
|----------------------------|--------|--------|--------|
| Cust Chg | | | |
| A: CUSTOMER CHARGE | | | |
| | 537.24 | 598.81 | - |
| | - | 0 | 11.46% |
| | - | 0 | |
| B: FACILITIES CHARGE | | | |
| SECONDARY: | 1.840 | 2.051 | 11.47% |
| PRIMARY: | 1.530 | 1.705 | 11.44% |
| SUBSTATION VOLTAGE | 0.463 | 0.516 | 11.45% |
| TRANSM VOLTAGE | - | 0 | 0.00% |
| C: DEMAND CHARGE | | | |
| <u>SECONDARY-SUMMER:</u> | | | |
| First 2450 kw | 7.138 | 7.956 | 11.46% |
| Next 2450 kw | 5.710 | 6.364 | 11.45% |
| Next 2450 kw | 4.783 | 5.331 | 11.46% |
| All kw over 7350 kw | 3.492 | 3.892 | 11.45% |
| <u>SECONDARY-WINTER</u> | | | |
| First 2450 kw | 4.852 | 5.408 | 11.46% |
| Next 2450 kw | 3.787 | 4.221 | 11.46% |
| Next 2450 kw | 3.341 | 3.724 | 11.46% |
| All kw over 7350 kw | 2.571 | 2.866 | 11.47% |
| <u>PRIMARY-SUMMER</u> | | | |
| First 2500 kw | 6.996 | 7.773 | 11.11% |
| Next 2500 kw | 5.596 | 6.218 | 11.12% |
| Next 2500 kw | 4.687 | 5.209 | 11.14% |
| All kw over 7500 kw | 3.422 | 3.803 | 11.13% |
| <u>PRIMARY-WINTER</u> | | | |
| First 2500 kw | 4.755 | 5.283 | 11.10% |
| Next 2500 kw | 3.711 | 4.124 | 11.13% |
| Next 2500 kw | 3.274 | 3.638 | 11.12% |
| All kw over 7500 kw | 2.520 | 2.800 | 11.11% |
| <u>SUBSTATION-SUMMER</u> | | | |
| First 2520 kw | 6.940 | 7.682 | 10.69% |
| Next 2520 kw | 5.551 | 6.146 | 10.72% |
| Next 2520 kw | 4.649 | 5.147 | 10.71% |
| All kw over 7560 kw | 3.395 | 3.758 | 10.69% |
| <u>SUBSTATION-WINTER</u> | | | |
| First 2520 kw | 4.717 | 5.222 | 10.71% |
| Next 2520 kw | 3.681 | 4.076 | 10.73% |
| Next 2520 kw | 3.248 | 3.596 | 10.71% |
| All kw over 7560 kw | 2.499 | 2.768 | 10.76% |
| <u>TRANSMISSION-SUMMER</u> | | | |
| First 2541 kw | 6.883 | 7.614 | 10.62% |
| Next 2541 kw | 5.507 | 6.090 | 10.59% |

LARGE POWER SERVICE SUMMARY OF PROPOSAL SCENARIOS MISSOURI

http://sportal01/CaseWorks/5/DirectTestimony_Rush/Library/[MO TMR-1.xls]MO Large Power

| INPUT FOR MODEL | | | |
|--------------------------------------|---------------|----------------|----------------------|
| Cust Chg | Current Rates | Proposed Rates | Overall Increase (%) |
| Next 2541 kw | 4.613 | 5.102 | 10.60% |
| All kw over 7623 kw | 3.367 | 3.725 | 10.63% |
| <u>TRANSMISSION-WINTER</u> | | | |
| First 2541 kw | 4.678 | 5.175 | 10.62% |
| Next 2541 kw | 3.652 | 4.039 | 10.60% |
| Next 2541 kw | 3.222 | 3.563 | 10.58% |
| All kw over 7623 kw | 2.479 | 2.742 | 10.61% |
| D: ENERGY CHARGE | | | |
| <u>SECONDARY-SUMMER:</u> | | | |
| 0-180 hrs use per month | 0.04470 | 0.0498 | 11.41% |
| 181-360 hrs use per month | 0.03109 | 0.0347 | 11.61% |
| 361+ hrs use per month | 0.02230 | 0.0250 | 12.11% |
| <u>SECONDARY-WINTER:</u> | | | |
| 0-180 hrs use per month | 0.03790 | 0.0422 | 11.35% |
| 181-360 hrs use per month | 0.02828 | 0.0315 | 11.39% |
| 361+ hrs use per month | 0.02210 | 0.0247 | 11.76% |
| <u>PRIMARY-SUMMER:</u> | | | |
| 0-180 hrs use per month | 0.04381 | 0.0487 | 11.16% |
| 181-360 hrs use per month | 0.03047 | 0.0339 | 11.26% |
| 361+ hrs use per month | 0.02186 | 0.0244 | 11.62% |
| <u>PRIMARY-WINTER:</u> | | | |
| 0-180 hrs use per month | 0.03714 | 0.0412 | 10.93% |
| 181-360 hrs use per month | 0.02771 | 0.0308 | 11.15% |
| 361+ hrs use per month | 0.02165 | 0.0242 | 11.78% |
| <u>SUBSTATION-SUMMER</u> | | | |
| 0-180 hrs use per month | 0.04346 | 0.0482 | 10.91% |
| 181-360 hrs use per month | 0.03023 | 0.0334 | 10.49% |
| 361+ hrs use per month | 0.02168 | 0.0241 | 11.16% |
| <u>SUBSTATION-WINTER</u> | | | |
| 0-180 hrs use per month | 0.03684 | 0.0408 | 10.75% |
| 181-360 hrs use per month | 0.02749 | 0.0304 | 10.59% |
| 361+ hrs use per month | 0.02148 | 0.0239 | 11.27% |
| <u>TRANSMISSION-SUMMER</u> | | | |
| 0-180 hrs use per month | 0.04311 | 0.0477 | 10.65% |
| 181-360 hrs use per month | 0.02999 | 0.0332 | 10.70% |
| 361+ hrs use per month | 0.02151 | 0.0239 | 11.11% |
| <u>TRANSMISSION-WINTER</u> | | | |
| 0-180 hrs use per month | 0.03655 | 0.0405 | 10.81% |
| 181-360 hrs use per month | 0.02727 | 0.0302 | 10.74% |
| 361+ hrs use per month | 0.02131 | 0.0236 | 10.75% |
| E: REACTIVE DEMAND ADJUSTMENT | 0.452 | 0.504 | 11.50% |

KCPD PROPOSED RESIDENTIAL BASE RATE - TYPICAL BILL IMPACT ANALYSIS
 RATE A - GENERAL USE
 MISSOURI

E:\Regulatory\CO505-Class\CO5Rate Case Schedules\MO TMR-2.xls\MO RES-Rate A - DESIGN

Current GENERAL USE Schedule

| | |
|-----------------|----------|
| Customer Charge | \$6.11 |
| Summer: | |
| First 600 | \$0.0740 |
| Next 400 | \$0.0740 |
| Over 1000 | \$0.0740 |
| Winter: | |
| First 600 | \$0.0666 |
| Next 400 | \$0.0398 |
| Over 1000 | \$0.0332 |

Proposed GENERAL USE Schedule

| | |
|-----------------|----------|
| Customer Charge | \$8.36 |
| Summer: | |
| First 600 | \$0.0814 |
| Next 400 | \$0.0814 |
| Over 1000 | \$0.0814 |
| Winter: | |
| First 600 | \$0.0674 |
| Next 400 | \$0.0513 |
| Over 1000 | \$0.0379 |

average usage

AVERAGE MONTHLY USAGE

| | 0 | 200 | 500 | 750 | 1000 | 1250 | 1500 | 2000 | 3000 |
|--|---|-----|-----|-----|------|------|------|------|------|
|--|---|-----|-----|-----|------|------|------|------|------|

SUMMER KWH USAGE

| | | |
|---|----------|--------|
| 0 | Current | 6.11 |
| | Proposed | 8.36 |
| | Change | 36.82% |

| | | | | | | | | | | | | | | | |
|-------------|--------|----|-------|----|-------|----|--------|----|--------|----|--------|----|--------|----|--------|
| Winter Bill | | | | | | | | | | | | | | | |
| \$ | 19.43 | \$ | 39.41 | \$ | 52.04 | \$ | 61.99 | \$ | 70.29 | \$ | 78.59 | \$ | 95.19 | \$ | 128.39 |
| \$ | 21.84 | \$ | 42.06 | \$ | 56.50 | \$ | 69.32 | \$ | 78.80 | \$ | 88.27 | \$ | 107.22 | \$ | 145.12 |
| | 12.40% | | 6.72% | | 8.57% | | 11.82% | | 12.11% | | 12.32% | | 12.64% | | 13.03% |

Summer Bill

| | | |
|------|----------|--------|
| 300 | Current | 28.31 |
| | Proposed | 32.78 |
| | Change | 15.79% |
| 600 | Current | 50.51 |
| | Proposed | 57.20 |
| | Change | 13.24% |
| 700 | Current | 57.91 |
| | Proposed | 65.34 |
| | Change | 12.83% |
| 850 | Current | 69.01 |
| | Proposed | 77.55 |
| | Change | 12.38% |
| 1000 | Current | 80.11 |
| | Proposed | 89.76 |
| | Change | 12.05% |
| 1200 | Current | 94.91 |
| | Proposed | 106.04 |
| | Change | 11.73% |
| 1500 | Current | 117.11 |
| | Proposed | 130.46 |
| | Change | 11.40% |
| 1980 | Current | 152.63 |
| | Proposed | 169.53 |
| | Change | 11.07% |
| 3000 | Current | 228.11 |
| | Proposed | 252.56 |
| | Change | 10.72% |

Annual (4 summer and 8 winter months)

| | | | | | | | | | | | | | | | |
|----|----------|----|----------|----|----------|----|----------|----|----------|----|----------|----|----------|----|----------|
| \$ | 268.68 | \$ | 428.52 | \$ | 529.56 | \$ | 609.16 | \$ | 675.56 | \$ | 741.96 | \$ | 874.76 | \$ | 1,140.36 |
| \$ | 305.84 | \$ | 467.60 | \$ | 583.12 | \$ | 685.68 | \$ | 761.52 | \$ | 837.28 | \$ | 988.88 | \$ | 1,292.08 |
| | 13.83% | | 9.12% | | 10.11% | | 12.56% | | 12.72% | | 12.85% | | 13.05% | | 13.30% |
| \$ | 357.48 | \$ | 517.32 | \$ | 618.36 | \$ | 697.96 | \$ | 764.36 | \$ | 830.76 | \$ | 963.56 | \$ | 1,229.16 |
| \$ | 403.52 | \$ | 565.28 | \$ | 680.80 | \$ | 783.36 | \$ | 859.20 | \$ | 934.96 | \$ | 1,086.56 | \$ | 1,389.76 |
| | 12.88% | | 9.27% | | 10.10% | | 12.24% | | 12.41% | | 12.54% | | 12.77% | | 13.07% |
| \$ | 387.08 | \$ | 546.92 | \$ | 647.96 | \$ | 727.56 | \$ | 793.96 | \$ | 860.36 | \$ | 993.16 | \$ | 1,258.76 |
| \$ | 436.08 | \$ | 597.84 | \$ | 713.36 | \$ | 815.92 | \$ | 891.76 | \$ | 967.52 | \$ | 1,119.12 | \$ | 1,422.32 |
| | 12.66% | | 9.31% | | 10.09% | | 12.14% | | 12.32% | | 12.46% | | 12.68% | | 12.99% |
| \$ | 431.48 | \$ | 591.32 | \$ | 692.36 | \$ | 771.96 | \$ | 838.36 | \$ | 904.76 | \$ | 1,037.56 | \$ | 1,303.16 |
| \$ | 484.92 | \$ | 646.68 | \$ | 762.20 | \$ | 864.76 | \$ | 940.60 | \$ | 1,016.36 | \$ | 1,167.96 | \$ | 1,471.16 |
| | 12.39% | | 9.36% | | 10.09% | | 12.02% | | 12.20% | | 12.33% | | 12.57% | | 12.89% |
| \$ | 475.88 | \$ | 635.72 | \$ | 736.76 | \$ | 816.36 | \$ | 882.76 | \$ | 949.16 | \$ | 1,081.96 | \$ | 1,347.56 |
| \$ | 533.76 | \$ | 695.52 | \$ | 811.04 | \$ | 913.60 | \$ | 989.44 | \$ | 1,065.20 | \$ | 1,216.80 | \$ | 1,520.00 |
| | 12.16% | | 9.41% | | 10.08% | | 11.91% | | 12.08% | | 12.23% | | 12.46% | | 12.80% |
| \$ | 535.08 | \$ | 694.92 | \$ | 795.96 | \$ | 875.56 | \$ | 941.96 | \$ | 1,008.36 | \$ | 1,141.16 | \$ | 1,406.76 |
| \$ | 598.88 | \$ | 760.64 | \$ | 876.16 | \$ | 978.72 | \$ | 1,054.56 | \$ | 1,130.32 | \$ | 1,281.92 | \$ | 1,585.12 |
| | 11.92% | | 9.46% | | 10.08% | | 11.78% | | 11.95% | | 12.09% | | 12.33% | | 12.68% |
| \$ | 623.88 | \$ | 783.72 | \$ | 884.76 | \$ | 964.36 | \$ | 1,030.76 | \$ | 1,097.16 | \$ | 1,229.96 | \$ | 1,495.56 |
| \$ | 696.56 | \$ | 858.32 | \$ | 973.84 | \$ | 1,076.40 | \$ | 1,152.24 | \$ | 1,228.00 | \$ | 1,379.60 | \$ | 1,682.80 |
| | 11.65% | | 9.52% | | 10.07% | | 11.62% | | 11.79% | | 11.93% | | 12.17% | | 12.52% |
| \$ | 765.96 | \$ | 925.80 | \$ | 1,026.84 | \$ | 1,106.44 | \$ | 1,172.84 | \$ | 1,239.24 | \$ | 1,372.04 | \$ | 1,637.64 |
| \$ | 852.84 | \$ | 1,014.60 | \$ | 1,130.12 | \$ | 1,232.68 | \$ | 1,308.52 | \$ | 1,384.28 | \$ | 1,535.88 | \$ | 1,839.08 |
| | 11.34% | | 9.59% | | 10.06% | | 11.41% | | 11.57% | | 11.70% | | 11.94% | | 12.30% |
| \$ | 1,067.88 | \$ | 1,227.72 | \$ | 1,328.76 | \$ | 1,408.36 | \$ | 1,474.76 | \$ | 1,541.16 | \$ | 1,673.96 | \$ | 1,939.56 |
| \$ | 1,184.96 | \$ | 1,346.72 | \$ | 1,462.24 | \$ | 1,564.80 | \$ | 1,640.64 | \$ | 1,716.40 | \$ | 1,868.00 | \$ | 2,171.20 |
| | 10.96% | | 9.69% | | 10.05% | | 11.11% | | 11.25% | | 11.37% | | 11.59% | | 11.94% |