

Exhibit No.:
Issue: Phase-in Carrying Costs
Witness: David Murray
Sponsoring Party: MoPSC Staff
Type of Exhibit: Direct Testimony
File No.: ER-2012-0024
Date Testimony Prepared: October 21, 2011

MISSOURI PUBLIC SERVICE COMMISSION

REGULATORY REVIEW DIVISION

UTILITY SERVICES

DIRECT TESTIMONY

OF

DAVID MURRAY

**Great Plains Energy, Incorporated
KCP&L Greater Missouri Operations**

FILE NO. ER-2012-0024

**Jefferson City, Missouri
October 2011**

1 **DIRECT TESTIMONY**

2 **OF**

3 **DAVID MURRAY**

4 **Great Plains Energy, Incorporated**

5 **KCP&L Greater Missouri Operations**

6 **FILE NO. ER-2012-0024**

7 Q. What is your name?

8 A. David Murray.

9 Q. Who is your employer?

10 A. The Missouri Public Service Commission.

11 Q. What is your current position with the Commission?

12 A. I am currently the Acting Utility Regulatory Manager of the Financial
13 Analysis.

14 Q. What education, credentials and experience qualify you to provide an expert
15 opinion in regard to carrying costs for the phase-in of an ordered rate increase?

16 A. Please see Attachment A for a full explanation of my education and
17 credentials. Please see Attachment B for a list of utility regulatory proceedings in which I
18 have sponsored testimony.

19 Q. What is the purpose of your Direct Testimony?

20 A. In ordered paragraph 3 of its Order Suspending Tariff Sheets and Directing
21 Filing, the Commission ordered the following:

22 No later than June 8, 2011, the parties shall file a pleading
23 stating KCP&L Greater Missouri Operations Company's short-
24 term debt and any arguments why the "carrying costs" for the
25 phased-in tariffs should not be equal to the short-term debt
26 cost.

1 Therefore, the purpose of my Direct Testimony is to discuss the reasonableness of the
2 3.25 percent interest rate in the non-unanimous stipulation and agreement between KCP&L
3 Greater Missouri Operations' ("GMO") and Staff filed in this case on September 2, 2011. In
4 light of the Commission's order, from Staff's perspective that rate is a proxy for GMO's
5 potential cost of short-term debt over the rate phase-in period. I also discuss the discount rate
6 I believe an investor would likely use to determine the decrease in the present value of
7 foregone cash flows caused by the rate increase phase-in, a key factor in determining whether
8 GMO is being allowed to "...recover the revenue it would have been allowed in the absence
9 of a phase-in...." as required by Section 393.155.1 RSMo.

10 Q. How did you determine that a 3.25 percent interest rate is reasonable?

11 A. By reviewing the terms and conditions of GMO's current credit facility
12 agreement.

13 Q. Generally, why do companies have credit facilities?

14 A. Credit facilities are typically used for a company's short-term capital needs
15 and/or to allow the company to issue commercial paper for its short-term capital needs. This
16 may be either for working capital requirements to fund day-to-day operations (e.g. buying
17 natural gas before the winter heating season) or as bridge financing for investment in
18 long-term assets, such as property, plant and equipment. After a certain amount of
19 short-term debt has accumulated, then the company will issue long-term capital to refinance
20 at least a portion of the amount of the outstanding short-term debt.

21 Q. Are the interest rates associated with GMO's credit facility governed by a
22 contract?

1 A. Yes. GMO's credit facility is a contractual commitment from a syndicate of
2 banks (currently 16) where each bank commits to provide funds up to some fixed amount.
3 The current aggregation of these individual 3-year maximum commitments under GMO's
4 credit facility totals \$450 million. The formula for determining the interest rate to be applied
5 to advances on the credit facility is found in the credit facility.

6 Q. What interest rate is charged for advances made on GMO's credit facility?

7 A. It depends on the type of advance. GMO has two primary options. GMO can
8 make a "floating rate advance" or a "eurodollar advance."

9 The interest rate on a "floating rate advance" is determined by adding 1.75 percent to
10 an "alternate base rate," which by terms of the credit facility would be the highest of (a) the
11 Federal Funds Rate plus one-half of one percent (1/2%), (b) the rate of interest in effect for
12 such day as publicly announced from time to time by Bank of America as its "prime rate"
13 and (c) the Eurodollar base rate plus one percent (1%).

14 The interest rate on a "eurodollar advance" is determined by adding 2.75 percent to
15 the British Bankers Association LIBOR rate with a term equivalent to the interest period for
16 such advance. For example, if GMO elects a 3-month "eurodollar advance," then GMO
17 would pay the 3-month LIBOR rate plus a margin of 2.75 percent.

18 Q. What have been the terms of most of GMO's "eurodollar advances" under its
19 current credit facility?

20 A. Based on Staff's analysis of GMO's weighted average cost of short-term debt
21 calculations it appears that GMO's "eurodollar advances" have been limited to one-month at
22 least through May 2011. Consequently, the one-month LIBOR rate is the likely benchmark
23 rate that would apply to future advances. However, under the terms of GMO's credit facility,

1 | GMO has the option to elect “eurodollar advances” that have terms greater than one month,
2 | and therefore would be priced based on a longer-term LIBOR rate.

3 | Q. Considering the above options under GMO’s credit facility, what are the
4 | short-term interest rates GMO is likely to incur over the period of the rate phase-in?

5 | A. For one-month “eurodollar advances,” it could be anywhere from 2.95 percent
6 | to 3.10 percent. If GMO elects longer-term advances, such as 3-month terms or longer, then
7 | it could be as high as 3.25 percent based on the 3-month LIBOR rates experienced since
8 | January 1, 2010.¹ Although past interest rate experience does not assure similar future rates,
9 | the fact that the Federal Reserve has assured financial markets that it will maintain the
10 | Federal Funds rate at its current level for the next couple of years provides some certainty the
11 | current levels of short-term rates will continue in the near future.

12 | If GMO takes a “floating rate advance,” then the interest rate it is likely to pay on it is
13 | currently 5.00 percent. The terms of GMO’s credit facility indicate that after adding a
14 | margin of 1.75 percent it will pay the highest of the following options—(a) the Federal Funds
15 | Rate plus one-half of one percent (1/2%), (b) the rate of interest in effect for such day as
16 | publicly announced from time to time by Bank of America as its “prime rate” or (c) the
17 | Eurodollar base rate plus one percent (1%). Currently, the option that applies to any
18 | “floating rate advances” is the prime rate plus 1.75 percent. The prime rate has been at a
19 | constant 3.25 percent for approximately the last three years. Adding the margin of
20 | 1.75 percent to the prime rate of 3.25 percent, results in a rate of 5.00 percent.

21 | Q. Has GMO taken a “floating rate advance” under its current credit facility?

22 | A. Yes. Based GMO’s weighted average cost of short-term debt information
23 | through May 2011, GMO took a “floating rate advance” on May 11, 2011. The rate on this

¹ <http://www.moneycafe.com/library/3monthlibor.htm>

1 advance was 5.00 percent. Staff is unaware of whether GMO has taken any additional
2 “floating rate advances” since then.

3 Q. Considering all of the above information, if the Commission chooses to use
4 GMO’s short-term debt cost for determining the carrying costs associated with the phase-in
5 of GMO’s rates is an interest rate of 3.25 percent fair and reasonable?

6 A. Yes.

7 Q. Let’s turn now to the topic of the discount rate an investor would likely use to
8 determine the decrease in the present value of GMO’s foregone cash flows caused by the
9 phase-in of its rate increase. What discount rate do you believe an investor or valuation
10 expert would use to determine the present value of GMO’s foregone cash flows attributable
11 to the phase-in of its rate increase as ordered by the Commission?

12 A. An investor or valuation expert would use a discount rate based on a
13 company’s cost of capital because the investor is discounting the cash flow to the firm, which
14 is affected by the risks of the firm. While those familiar with utility ratemaking, and
15 specifically rate of return recommendations in context of utility rate cases, may translate that
16 to mean that the allowed rate of return is the appropriate discount rate, I do not.

17 Q. Why not?

18 A. The discounting of future cash flows expected by the firm, and in this instance
19 future cash flows foregone by the firm, should be based on the after-tax weighted average
20 cost of capital. It should be determined based on current costs of debt and equity, not the
21 historical cost of debt reflected in an allowed rate return. Further, the historical cost of debt
22 is inappropriate for discounting future revenues because it includes embedded expenses that
23 should not be included when discounting expected cash flows. Finally, the cost of debt needs

1 to be reduced to consider the tax deductibility of the interest expense that is associated with
2 debt.

3 Q. What cost of equity did you assume for purposes of determining the cost of
4 capital to GMO for purposes of determining an appropriate rate to make investors whole for
5 purposes of the phase-in of GMO's rate increase?

6 A. Although, with all due-respect to the Commission, I do not believe GMO's
7 cost of equity is 10.0 percent, I used this allowed return on equity for purposes of my
8 estimated discount rate.

9 Q. What capital structure did you assume for GMO to estimate GMO's cost of
10 capital?

11 A. Based on GMO's most recent rate case, Great Plains Energy's common equity
12 ratio was approximately 48 percent, which is fairly consistent with the equity ratio GPE
13 appears to target. Consequently, I used a capital structure of 48 percent equity and
14 52 percent long-term debt.

15 Q. What cost of debt did you assume?

16 A. Utilities have been able to issue debt at fairly low cost recently. In fact, GPE
17 recently issued 10-year debt at a coupon rate of 4.85 percent and Kansas City Power and
18 Light Company issued 30-year debt at a coupon rate of 5.3 percent. In light of the cost of
19 these recent issuances, it seems reasonable to use a cost of debt of 5.0 percent to estimate the
20 appropriate discount rate for GMO.

21 Q. What tax rate did you assume?

22 A. 38.39 percent, which is consistent with the tax rate used for purposes of rate
23 cases.

1 Q. If the Commission does not accept 3.25 percent rate for determining the
2 “carrying costs” of phasing-in GMO’s rates that Staff and GMO proposed in their non-
3 unanimous stipulation and agreement, then what discount rate does Staff recommend the
4 Commission use to determine the “carrying costs”?

5 A. Based on the assumptions I have stated, it would be appropriate for the
6 Commission to use a discount rate of 6.40 percent (see Schedule 1).

7 Q. Does this conclude your testimony?

8 A. Yes it does.

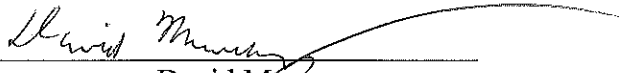
BEFORE THE PUBLIC SERVICE COMMISSION
OF THE STATE OF MISSOURI

In the Matter of the Determination of Carrying)
Costs for the Phase-In Tariffs of KCP&L) File No. ER-2012-0024
Greater Missouri Operations Company)

AFFIDAVIT OF DAVID MURRAY

STATE OF MISSOURI)
) ss.
COUNTY OF COLE)

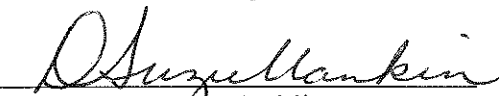
David Murray, of lawful age, on his oath states: that he has participated in the preparation of the foregoing Direct Testimony in question and answer form, consisting of 7 pages to be presented in the above case; that the answers in the foregoing Direct Testimony were given by him; that he has knowledge of the matters set forth in such answers; and that such matters are true and correct to the best of his knowledge and belief.



David Murray

Subscribed and sworn to before me this 21st day of October, 2011.

D. SUZIE MANKIN Notary Public - Notary Seal State of Missouri Commissioned for Cole County My Commission Expires: December 08, 2012 Commission Number: 08412071
--



Notary Public

DAVID MURRAY

Educational and Employment Background and Credentials

I am currently the Acting Utility Regulatory Manager of the Financial Analysis Unit for the Missouri Public Service Commission (Commission). I accepted the position of a Public Utility Financial Analyst in June 2000 and my position was reclassified in August 2003 to an Auditor III. I was promoted to the position of Auditor IV, effective July 1, 2006. I was employed by the Missouri Department of Insurance in a regulatory position before I began my employment at the Missouri Public Service Commission.

I was authorized in October 2010 to use the Chartered Financial Analyst (CFA) designation. The use of the CFA designation requires the passage of three rigorous examinations addressing many investment related areas such as valuation analysis, portfolio management, statistical analysis, economic analysis, financial statement analysis and ethical standards. In addition to the passage of the examinations a CFA charterholder must have four years of relevant professional work experience.

In May 1995, I earned a Bachelor of Science degree in Business Administration with an emphasis in Finance and Banking, and Real Estate from the University of Missouri-Columbia. I earned a Masters in Business Administration from Lincoln University in December 2003.

I have been awarded the professional designation Certified Rate of Return Analyst (CRRA) by the Society of Utility and Regulatory Financial Analysts (SURFA). This designation is awarded based upon experience and successful completion of a written examination, which I completed during my attendance at a SURFA conference in April 2007.

CASE PROCEEDING PARTICIPATION**DAVID MURRAY**

Date Filed	Case Number	Company Name	Testimony Type	Issue(s)
1/12/11	ER-2010-0356	KCP&L Greater Missouri Operations Company	Surrebuttal	Rate of Return Capital Structure
1/05/11	ER-2010-0355	Kansas City Power & Light Company	Surrebuttal	Rate of Return Capital Structure
12/15/10	ER-2010-0356	KCP&L Greater Missouri Operations Company	Rebuttal	Rate of Return Capital Structure
12/08/10	ER-2010-0355	Kansas City Power & Light Company	Rebuttal	Rate of Return Capital Structure
11/17/10	ER-2010-0356	KCP&L Greater Missouri Operations Company	Cost of Service Report	Rate of Return Capital Structure
11/10/10	ER-2010-0355	Kansas City Power & Light Company	Cost of Service Report	Rate of Return Capital Structure
05/06/10	WR-2010-0131	Missouri-American Water Company	Surrebuttal	Rate of Return Capital Structure
04/15/10	WR-2010-0131	Missouri-American Water Company	Rebuttal	Rate of Return Capital Structure
03/09/10	WR-2010-0131	Missouri-American Water Company	Cost of Service Report	Rate of Return Capital Structure
03/05/10	ER-2010-0036	Union Electric Company d/b/a AmerenUE	Surrebuttal	Rate of Return Capital Structure
02/11/10	ER-2010-0036	Union Electric Company d/b/a AmerenUE	Rebuttal	Rate of Return Capital Structure
12/18/09	ER-2010-0036	Union Electric Company d/b/a AmerenUE	Cost of Service Report	Rate of Return Capital Structure
10/14/09	GR-2009-0355	Missouri Gas Energy	Surrebuttal	Rate of Return Capital Structure
09/28/09	GR-2009-0355	Missouri Gas Energy	Rebuttal	Rate of Return Capital Structure
08/21/09	GR-2009-0355	Missouri Gas Energy	Cost of Service Report	Rate of Return Capital Structure
04/09/09	HR-2009-0092	KCP&L Greater Missouri Operations Company	Surrebuttal	Rate of Return Capital Structure

CASE PROCEEDING PARTICIPATION

DAVID MURRAY

Date Filed	Case Number	Company Name	Testimony Type	Issue(s)
04/09/09	ER-2009-0090	KCP&L Greater Missouri Operations Company	Surrebuttal	Rate of Return Capital Structure
04/07/09	ER-2009-0089	Kansas City Power & Light Company	Surrebuttal	Rate of Return Capital Structure
03/13/09	HR-2009-0092	KCP&L Greater Missouri Operations Company	Rebuttal	Rate of Return Capital Structure
03/13/09	ER-2009-0090	KCP&L Greater Missouri Operations Company	Rebuttal	Rate of Return Capital Structure
03/11/09	ER-2009-0089	Kansas City Power & Light Company	Rebuttal	Rate of Return Capital Structure
02/13/09	HR-2009-0092	KCP&L Greater Missouri Operations Company	Cost of Service Report	Rate of Return Capital Structure
02/13/09	ER-2009-0090	KCP&L Greater Missouri Operations Company	Cost of Service Report	Rate of Return Capital Structure
02/11/09	ER-2009-0089	Kansas City Power & Light Company	Cost of Service Report	Rate of Return Capital Structure
08/01/2008	HR-2008-0300	Trigen-Kansas City Energy Corporation	Cost of Service Report	Rate of Return Capital Structure
01/18/2008	GR-2008-0060	Missouri Gas Utility, Inc.	Cost of Service Report	Rate of Return Capital Structure
07/31/2007	WR-2007-0216	Missouri-American Water Company	Surrebuttal	Rate of Return Capital Structure
07/13/2007	WR-2007-0216	Missouri-American Water Company	Rebuttal	Rate of Return Capital Structure
06/05/2007	WR-2007-0216	Missouri-American Water Company	Direct	Rate of Return Capital Structure
12/27/2006	GR-2006-0422	Missouri Gas Energy	True-up Direct	Rate of Return Capital Structure
12/11/2006	GR-2006-0422	Missouri Gas Energy	Surrebuttal	Rate of Return Capital Structure
11/21/2006	GR-2006-0422	Missouri Gas Energy	Rebuttal	Rate of Return Capital Structure
10/13/2006	GR-2006-0422	Missouri Gas Energy	Direct	Rate of Return Capital Structure

CASE PROCEEDING PARTICIPATION

DAVID MURRAY

Date Filed	Case Number	Company Name	Testimony Type	Issue(s)
08/18/2006	ER-2006-0315	Empire District Electric Co.	Surrebuttal	Rate of Return Capital Structure
07/28/2006	ER-2006-0315	Empire District Electric Co.	Rebuttal	Rate of Return Capital Structure
06/23/2006	ER-2006-0315	Empire District Electric Co.	Direct	Rate of Return Capital Structure
12/13/2005	ER-2005-0436	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Surrebuttal	Rate of Return Capital Structure
11/18/2005	ER-2005-0436	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Rebuttal	Rate of Return Capital Structure
10/14/2005	ER-2005-0436	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Direct	Rate of Return Capital Structure
11/24/2004	ER-2004-0570	Empire District Electric Co.	Surrebuttal	Rate of Return Capital Structure
11/04/2004	ER-2004-0570	Empire District Electric Co.	Rebuttal	Rate of Return Capital Structure
09/20/2004	ER-2004-0570	Empire District Electric Co.	Direct	Rate of Return
07/19/2004	GR-2004-0209	Missouri Gas Energy	True-Up Direct	Rate of Return Capital Structure
06/14/2004	GR-2004-0209	Missouri Gas Energy	Surrebuttal	Rate of Return Capital Structure
05/24/2004	GR-2004-0209	Missouri Gas Energy	Rebuttal	Rate of Return Capital Structure
04/15/2004	GR-2004-0209	Missouri Gas Energy	Direct	Rate of Return Capital Structure
03/11/2004	IR-2004-0272	Fidelity Telephone Company	Direct	Rate of Return Capital Structure
02/13/2004	GR-2004-0072	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Rebuttal	Rate of Return Capital Structure
02/13/2004	ER-2004-0034	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Surrebuttal	Rate of Return Capital Structure
02/13/2004	HR-2004-0024	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks-L&P	Surrebuttal	Rate of Return Capital Structure

CASE PROCEEDING PARTICIPATION

DAVID MURRAY

Date Filed	Case Number	Company Name	Testimony Type	Issue(s)
01/26/2004	HR-2004-0024	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks L&P	Rebuttal	Rate of Return Capital Structure
01/26/2004	ER-2004-0034	Aquila, Inc. dba Aquila Networks-MPS and Aquila Networks L&P	Rebuttal	Rate of Return Capital Structure
01/09/2004	WT-2003-0563	Osage Water Company	Rebuttal	Rate of Return Capital Structure
01/09/2004	ST-2003-0562	Osage Water Company	Rebuttal	Rate of Return Capital Structure
01/06/2004	GR-2004-0072	Aquila, Inc.	Direct	Rate of Return Capital Structure
12/19/2003	ST-2003-0562	Osage Water Company	Direct	Rate of Return Capital Structure
12/19/2003	WT-2003-0563	Osage Water Company	Direct	Rate of Return Capital Structure
12/09/2003	ER-2004-0034	Aquila, Inc.	Direct	Rate of Return Capital Structure
12/09/2003	HR-2004-0024	Aquila, Inc.	Direct	Rate of Return Capital Structure
12/05/2003	WC-2004-0168	Missouri-American Water Co	Surrebuttal	Rate of Return Capital Structure
12/05/2003	WR-2003-0500	Missouri-American Water Co	Surrebuttal	Rate of Return Capital Structure
11/10/2003	WR-2003-0500	Missouri-American Water Company	Rebuttal	Rate of Return Capital Structure
11/10/2003	WC-2004-0168	Missouri-American Water Company	Rebuttal	Rate of Return Capital Structure
10/03/2003	WC-2004-0168	Missouri-American Water Company	Direct	Rate of Return Capital Structure
10/03/2003	WR-2003-0500	Missouri-American Water Company	Direct	Rate of Return Capital Structure
03/17/2003	GM-2003-0238	Southern Union Co. dba Missouri Gas Energy	Rebuttal	Insulation
10/16/2002	ER-2002-424	The Empire District Electric Company	Surrebuttal	Rate of Return Capital Structure
09/24/2002	ER-2002-424	The Empire District Electric Company	Rebuttal	Rate of Return Capital Structure

CASE PROCEEDING PARTICIPATION**DAVID MURRAY**

Date Filed	Case Number	Company Name	Testimony Type	Issue(s)
08/16/2002	ER-2002-424	The Empire District Electric Company	Direct	Rate of Return Capital Structure
08/06/2002	TC-2002-1076	BPS Telephone Company	Direct	Rate of Return Capital Structure
01/22/2002	ER-2001-672	UtiliCorp United Inc. dba Missouri Public Service	Surrebuttal	Rate of Return Capital Structure
01/22/2002	EC-2002-265	UtiliCorp United Inc. dba Missouri Public Service	Surrebuttal	Rate of Return Capital Structure
01/08/2002	ER-2001-672	UtiliCorp United Inc. dba Missouri Public Service	Rebuttal	Rate of Return Capital Structure
01/08/2002	EC-2002-265	UtiliCorp United Inc. dba Missouri Public Service	Rebuttal	Rate of Return Capital Structure
12/06/2001	ER-2001-672	UtiliCorp United Inc. dba Missouri Public Service	Direct	Rate of Return Capital Structure
12/06/2001	EC-2002-265	UtiliCorp United Inc. dba Missouri Public Service	Direct	Rate of Return Capital Structure
05/22/2001	GR-2001-292	Missouri Gas Energy, A Division of Southern Union Company	Rebuttal	Rate of Return Capital Structure
04/19/2001	GR-2001-292	Missouri Gas Energy, A Division of Southern Union Company	Direct	Rate of Return Capital Structure
03/01/2001	TT-2001-328	Oregon Farmers Mutual Telephone Company	Rebuttal	Rate of Return Capital Structure
02/28/2001	TR-2001-344	Northeast Missouri Rural Telephone Company	Direct	Rate of Return Capital Structure
01/31/2001	TC-2001-402	Ozark Telephone Company	Direct	Rate of Return Capital Structure

KCPL Greater Missouri Operations Company
File No. ER-2012-0024

After-Tax Cost of Capital/Discount Rate
for KCP&L Greater Missouri Operations Company

Capital Component	Percentage of Capital	Before-tax Cost	After-tax Cost ¹	Weighted After-tax Cost
Common Stock Equity	48.00%	10.00%	10.00%	4.80%
Long-Term Debt	52.00%	5.00%	3.08%	1.60%
Total	<u>100.00%</u>			<u>6.40%</u>

Notes:

1. Assumed tax rate is 38.39%.