

**Exhibit No.:**  
**Issues:** MKP/RPC Pipeline  
Adjustment  
**Witness:** John B. Adger, Jr.  
**Type of Exhibit:** Rebuttal Testimony  
**Sponsoring Party:** Mid-Kansas Partnership/Riverside  
Pipeline Company, L.P.  
**Case No:** GR-96-450

**MID-KANSAS PARTNERSHIP/RIVERSIDE PIPELINE COMPANY, L.P.**

**REBUTTAL TESTIMONY**

**OF**

**JOHN B. ADGER, JR.**

**FILED**  
DEC 16 1998  
Missouri Public  
Service Commission

**MISSOURI GAS ENERGY**

**A division of**

**Southern Union Company**

**CASE NO. GR-96-450**

**Jefferson City, Missouri  
December, 1998**

**NON-PROPRIETARY**

# **REBUTTAL TESTIMONY OF**

**JOHN B. ADGER, JR.**

## **Table of Contents**

I.	Introduction .....	Page 1-3
II.	The Evaluation of Prudence in Gas Purchasing.....	Page 3-4
III.	MGE's Actions Regarding the Mid-Kansas II Agreement.....	Page 4-17
IV.	Staff Witness Wallis's Concerns.....	Page 17-28
V.	Overall Conclusions.....	Page 28-30

## **List of Schedules**

Schedule JBA-1 – Summary of Professional History

Schedule JBA 2-1 – Deposition Transcript of Thomas Shaw, page 78, lines 24-25 and page 79, lines 1-4

Schedule JBA 3 – Deposition Transcript of David Sommerer, page 33, lines 2-6

Schedule JBA 4 – Deposition Transcript of Michael T Langston, page 42, lines 14-23

Schedule JBA 5 – Comparison of Features – Mid-Kansas I/Mid Kansas II

Schedule JBA 6 – Chart - Case No. Gr-96-450 - Gas Index Prices

Schedule JBA 7 – Chart – Case No. GR-96-450 - Monthly Load Factor

Schedule JBA 8 – Charts Taken From MGE Presentations To Prospective Gas Suppliers

Schedule JBA 9 - Charts Taken From MGE Presentations To Prospective Gas Suppliers

Schedule JBA 10 – Chart On Corrections to Missouri PSC Recommended Disallowance  
“Deemed Highly Confidential”

Schedule JBA 11 – Deposition Transcript of Dennis M. Langley, page 32, lines 9-19

Schedule JBA 12 – Pipeline Capacity Charges

Schedule JBA 13 – Deposition Transcript of Michael Wallis, page 52, lines 6-8

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2  
3 **BEFORE THE PUBLIC SERVICE COMMISSION**  
4 **OF THE STATE OF MISSOURI**  
5

6 In the matter of Missouri Gas Energy's Gas Cost Adjustment )  
7 Tariff Revisions to be reviewed in Its 1996-1997 Annual ) Case No. GR-96-450  
8 Reconciliation Adjustment Account )  
9

10 **REBUTTAL TESTIMONY OF**  
11 **JOHN B. ADGER**

12  
13 **I. Introduction**  
14

15 Q. Please state your name and business address.  
16

17 A. My name is John B. Adger, Jr. My business address is P. O. Box 237, Quentin,  
18 Pennsylvania 17083-0237.  
19

20 Q. By whom and in what capacity are you employed?  
21

22 A. I am employed by The Liberty Consulting Group. I direct Liberty's Natural Gas  
23 Practice Area.  
24

25 Q. Please describe your training and work experience.  
26

27 A. I graduated from the Massachusetts Institute of Technology in 1968 with Bachelor's  
28 degrees in Earth Sciences and Chemical Physics, and a Master's degree in Geology and  
29 Geophysics. From 1969 through 1973, I worked for the Mobil Oil Corporation in  
30 international oil and gas exploration. From 1974 through 1982, I worked for the U. S.

1 Federal Government. My last position there was Director of the Alaska Gas Project  
2 Office and Alaska Gas Staff Delegate for the U. S. Federal Energy Regulatory  
3 Commission (FERC). Since 1982, I have been engaged in consulting for various  
4 clients within the natural gas industry in the U. S. and Canada. A summary of my  
5 professional history is attached as **Schedule JBA 1** to my testimony.

6 Since the issuance of the FERC's Order 436 in the fall of 1985, I have worked  
7 extensively with natural gas distributors (local distribution companies, or LDCs) and  
8 their regulators on questions of natural gas supply strategy. In particular, during that  
9 period I have performed audits of the gas purchasing policies and practices of three  
10 LDCs for public utility commissions (PUCs), and I have reviewed the gas supply  
11 function at four gas-only LDCs and two combination electric-and-gas utility companies  
12 in the course of comprehensive management audits of those companies for PUCs. I  
13 have also assisted two distributors in preparing for PUC audits of their respective gas-  
14 supply functions.

15  
16 Q. Have you previously testified before this Commission?

17  
18 A. No, I have not.

19  
20 Q. Please state the purpose of your testimony.

21  
22 A. The purpose of my testimony is to address the prudence of expenditures by Missouri  
23 Gas Energy, a division of Southern Union Company (MGE), for natural gas supplies

1 acquired from Mid-Kansas Partnership (Mid-Kansas) under a Firm Gas Purchase  
2 Contract referred to as "the Mid-Kansas II Agreement", or "Mid-Kansas II".<sup>1</sup> The  
3 prudence of those expenditures has been called into question by Staff Witness Michael  
4 J. Wallis, who found a difference between the amount of those expenditures and the  
5 amount which might have been paid under a hypothetical alternative source of supply  
6 constructed by him.

## 8 II. The Evaluation of Prudence in Gas Purchasing

9 Q. Please describe the evaluation of prudence in gas purchasing by regulated utility  
10 companies.

11  
12 A. Mid-Kansas Witness Howard Lubow presents an extensive discussion of the general  
13 concept of prudent behavior in a utility management setting. Under general standards  
14 of law and regulatory practice, prudence in gas purchasing by regulated gas utility  
15 companies has two aspects:

- 16 - Whether a company's decision to enter into a particular gas-supply contract was  
17 prudent in the context of the overall portfolio of contracts, which is a function of  
18 the alternatives available to the company at the time that it entered into the  
19 contract in question; and
- 20  
21 - Whether the company's takes under all of its gas-supply contracts are consistent  
22 with a) the terms of the contracts, b) any non-cost considerations (such as  
23 diversification of sources of supply), and then c) least-cost sourcing of its  
24 requirements for supply.  
25

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<sup>1</sup> The Mid-Kansas II volumes were delivered to MGE under a separate transportation agreement with Mid-Kansas affiliate Riverside Pipeline Company, L.P. For ease of reference, the entity providing the gas and transportation service at issue in this proceeding is referred to hereinafter as "Mid-Kansas/Riverside".

1           The standard by which a company's actions are to be judged is also discussed in  
2 Mr. Lubow's testimony. In Missouri, as in most other States, the generally applicable  
3 standard is the one defined by the New York Public Service Commission in a case  
4 involving Consolidated Edison Company of New York, Inc.<sup>2</sup>

5           ... the company's conduct should be judged by asking whether  
6 the conduct was reasonable at the time, under all the  
7 circumstances, considering that the company had to resolve its  
8 problems prospectively rather than in reliance on hindsight. In  
9 effect, our responsibility is to determine how reasonable people  
10 would have performed the tasks that confronted the company.  
11 (45 P.U.R., 4th, 1982, at page 331)

12  
13 Regarding gas-cost prudence reviews, the Missouri Commission has said:

14           The Commission is of the opinion that a prudence review of this  
15 type must focus primarily on the cause(s) of [any] allegedly  
16 excessive gas costs. ... The Commission is of the opinion that  
17 evidence relating to the decision-making process is relevant to the  
18 extent that the existence of a prudent decision-making process  
19 may preclude the adjustment. In addition, evidence about the  
20 particular controversial expenditures is needed for the  
21 Commission to determine the amount of [any] adjustment. ...  
22 The critical matter of proof is the prudence or imprudence of the  
23 decision from which expenses result. (*Re: Western Resources,*  
24 *Inc., d/b/a Gas Service, a Western Resources Company, 3 Mo.*  
25 *P.S.C. 3d 480,489 (1995)*)

26  
27  
28           **III. MGE's Actions Regarding the Mid-Kansas II Agreement**

29 Q.       Please describe what you have found regarding MGE's prudence in entering into and  
30 operating under the Mid-Kansas II Agreement.

31  

---

<sup>2</sup> Case 27123. *Re: Consolidated Edison Company of New York, Inc.*, Opinion 79-1, January 16, 1979, quoted in Case Nos. EO-85-17 and ER-85-160, *Union Electric*, 27 Mo P.S.C. at 194.

1 A. Based upon my review of materials that Staff and MGE have furnished in response to  
2 data requests, my discussions with Mid-Kansas personnel, and my review of documents  
3 provided by Mid-Kansas, I believe that MGE's execution of and performance under the  
4 Mid-Kansas II Agreement was consistent with and supportive of a conclusion that  
5 MGE's conduct has been prudent and reasonable throughout.  
6

7 1. MGE's prudence in entering into Mid-Kansas II

8 Q. Please describe what you have learned about MGE's decision to enter into the Mid-  
9 Kansas II Agreement.  
10

11 A. The Mid-Kansas II Agreement is dated February 24, 1995. That contract is the  
12 successor to an earlier contract which was assumed by MGE when MGE acquired  
13 western Missouri gas distribution operations and properties from Western Resources,  
14 Inc. (Western). The prior contract had been entered into by Western (then doing  
15 business as KPL Gas Service Company) in 1990, and amended in 1991. (This prior  
16 contract is referred to hereinafter as "the Mid-Kansas I Agreement", or "Mid-Kansas  
17 I".)

18 The 1990 contract, with its 1991 amendment, was a result of an attempt by  
19 Western to bring an additional source of gas supplies to the Kansas City metropolitan  
20 area. Before the Mid-Kansas I supply was added, the Kansas City area was essentially  
21 completely dependent on the Williams Natural Gas Company (Williams) pipeline  
22 system. The Williams system was developed by the Cities Service Company, which

1 also owned the distribution company in Kansas City until the 1950s.<sup>3</sup> Since the pipeline  
2 and the distribution company were owned by the same company, the pipeline system  
3 and the distribution system were designed and developed together, with little or no  
4 consideration of moving gas from one part of the distribution system to another, or of  
5 access to alternative sources of supply.

6 Mid-Kansas was able to access parts of the Kansas City market because its  
7 pipeline system was developed initially to move liquid products into the area. The  
8 physical assets that comprise the Mid-Kansas system were part of a crude-oil gathering  
9 and refined-products transmission system owned by Phillips Petroleum Company. The  
10 system transported crude oil and refined products to and from a Phillips refinery  
11 located in the Fairfax industrial district of Kansas City, Kansas. The Mid-Kansas  
12 system was adapted to natural gas service, delivery points were added in Kansas City,  
13 Kansas, and the pipeline was extended across the Missouri River to the Riverside  
14 delivery point in Platte County, Missouri. In so doing, Mid-Kansas not only added a  
15 new competitor to the Kansas City area, but it also gave Western's Kansas and  
16 Missouri operations expanded access to supply areas in Oklahoma.

17 MGE had access to this background in the course of its "due-diligence" review  
18 of Western's contracts and operations. (That review would have been conducted prior  
19 to the closing of its acquisition on February 1, 1994.) Moreover, Southern Union  
20 reported that

---

<sup>3</sup> Cities Service divested itself of what became The Gas Service Company in the mid-1950s, to bring itself into compliance with the Public Utility Holding Company Act. Western acquired Gas Service in 1983.



1           At the time the [Mid-Kansas] Contract was negotiated and  
2           executed,<sup>4</sup> the sales prices being charged by [Mid-Kansas] were  
3           competitive with those available from other, third-party sources of  
4           supply which reasonably were able to deliver gas into the Kansas City,  
5           Missouri area.

6  
7           The continuation of this condition -- the fact that the price of the  
8           supplies acquired under the [Mid-Kansas] Contract would remain  
9           competitive with those available from other, third-party sources of  
10          supply throughout the remaining term of the Contract -- was a basic  
11          assumption upon which the Contract was made.<sup>5</sup>

12  
13         Southern Union further reported that:

14  
15                 In reliance on the continuation of that assumption, Southern  
16                 Union accepted assignment of the [Mid-Kansas] Contract effective as of  
17                 January 31, 1994. (*Ibid.*)

18  
19                 Soon after the acquisition was closed, however, Southern Union became  
20         concerned that the Mid-Kansas supplies might be more expensive than those available  
21         from other suppliers. Moreover, on April 29, 1994, the Missouri PSC Staff  
22         recommended a disallowance of costs paid by Western under the contract. On June 1,  
23         1994, MGE filed suit against Mid-Kansas and its affiliated upstream pipeline.<sup>6</sup> As  
24         reported by Mid-Kansas Witness Wendell Putman, MGE also suspended payment for  
25         gas supplies received after November 1994 under the contract, putting enormous  
26         financial pressure on Mid-Kansas. Intensive negotiations followed between MGE and  
27         Mid-Kansas/Riverside, resulting in part in the contract at issue in this proceeding,

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<sup>4</sup> The reference here is to the 1990 contract, as amended in 1991 (Mid-Kansas I).

<sup>5</sup> "Complaint", filed by Southern Union Company in Civil Action No. 94-0511-CV-W-8, U. S. District Court for the Western District of Missouri, Western Division, on June 1, 1994.

<sup>6</sup> At the same time, MGE filed another lawsuit against both Western and Mid-Kansas's affiliated upstream pipeline raising issues with respect to the "Old Western Contracts". These contracts and their relationship to Mid-Kansas II are discussed below.

1 which was signed on February 24, 1995.

2 The question of whether MGE acted prudently in entering the renegotiated  
3 contract turns on what MGE's alternatives were at that time (the last half of 1994 and  
4 early 1995), and how the renegotiated Mid-Kansas contract compared with those  
5 alternatives. As a result of the development of the gas distribution system in the Kansas  
6 City area, MGE's system is composed of several distinct sub-systems that are not well  
7 connected to each other. This configuration is understandable, given the history of the  
8 system,<sup>7</sup> but it limits MGE's ability to vary its sources of gas supplies. For example,  
9 absent modification of MGE's system, or a commitment from a third pipeline to build  
10 facilities to the Riverside area, MGE's choices in that area are largely restricted to  
11 Williams and Mid-Kansas.

12 A conceivable option would have been for MGE to cease taking gas from Mid-  
13 Kansas, reverting to sole reliance on Williams in the Riverside area. Doing so,  
14 however, would have meant abandoning an alternative that had been endorsed by the  
15 FERC<sup>8</sup> and by both affected State public utility commissions<sup>9</sup> at the time of its

---

<sup>7</sup> The reference here is to the integrated development of the pipeline and distribution systems due to common ownership.

<sup>8</sup> In an order authorizing facilities to be constructed and operated by a Mid-Kansas affiliate, the FERC stated

... KPL, the local distribution company for the specified market area, is currently served by only one interstate pipeline in that area, [Williams].

... The Commission's transportation policy is to provide consumers with a variety of options by promoting access to a competitively priced market for natural gas. The facilities proposed by [a Mid-Kansas affiliate] will help to further these goals by providing KPL and other consumers an alternative facility through which to move gas. ("Order Issuing Certificate and Approving Abandonment", FERC Docket No. CP89-983-000, issued September 18, 1989, at pages 7-8.)

<sup>9</sup> In a related proceeding, in response to a pleading to the FERC by Williams, the Kansas Corporation Commission and the Missouri Public Service Commission argued

1 certification. Moreover, terminating the Mid-Kansas contract would likely have  
2 involved a substantial settlement payment, as the contract extended until 2009.<sup>10</sup>

3 It would be logical in these circumstances for MGE to focus on renegotiating the  
4 Mid-Kansas agreement, rather than reverting to Williams at Riverside. Mid-Kansas  
5 witness Putman has testified that, indeed, MGE approached the negotiations seeking  
6 revision of the terms of the contract, rather than termination.

7 MGE improved its position significantly in the renegotiation of the Mid-Kansas  
8 contract. Schedule JBA 5, attached to my testimony, compares features of the old  
9 contract with counterpart features of the one at issue in this proceeding. The principal  
10 improvements that MGE obtained were as follows:

- 11 - Commodity price: In place of an open-ended commitment to pay whatever costs  
12 that Mid-Kansas incurred in making supply available, MGE got a price linked to  
13 the price of supply on the Transok pipeline system in Oklahoma, which is  
14 generally lower than other Mid-continent prices;
- 15  
16 - Transportation charges: In place of a commitment to pay whatever prices were  
17 approved by relevant regulatory authorities, including any rate increases  
18 authorized, MGE got prices that were fixed in the contract through the year  
19 2009. Moreover, escalation in those prices was limited to two percent every

---

It is precisely the relative captivity of KPL's Missouri and eastern Kansas system that counsels affording it opportunities to use other ... systems ... [than Williams's]. ("Joint Answer of Missouri Public Service Commission and Kansas Corporation Commission to Request of Williams Natural Gas Company for Stay and Joint Motion of Missouri Public Service Commission and Kansas Corporation Commission to Afford Parties an Opportunity to Address Issues Presented by Williams' Request for Rehearing", FERC Docket No. CP89-485, July 21, 1989, at page 9.)

<sup>10</sup> Settling a contract which is valid and in effect generally involves estimating a stream of revenues under the contract, and then discounting that stream to its present value using an agreed discount rate. The net present value of the income stream is then the amount of the settlement payment. Mid-Kansas Witness Putman estimates that the net present value of the revenue stream under the Mid-Kansas I Agreement and the companion Riverside Transportation Agreement at that time exceeded \$100 million. Staff Witnesses Tom Shaw and Dave Sommerer both conceded that Mid-Kansas would not likely have terminated the contract without compensation. (See Schedule JBA 2-1, Deposition Transcript of Thomas Shaw, page 78, lines 24-25 and page 79, lines 1-4. See Schedule JBA 3, Deposition Transcript of David Sommerer, page 33, lines 2-6.) MGE Witness Langston made the same point in his deposition. See Schedule JBA 4, Deposition Transcript of Michael T. Langston, page 42, lines 14-23.)

1 three years, irrespective of the costs that Mid-Kansas incurs in owning and  
2 operating its system.

3  
4 The new contract also provided that Mid-Kansas's service would convert from  
5 sales to transportation when the FERC took jurisdiction over Mid-Kansas's rates and  
6 services.<sup>11</sup> Moreover, MGE obtained an option to take assignment of a pro rata share  
7 of the capacity on the Transok, Inc. pipeline system held by Mid-Kansas if MGE chose  
8 to buy its gas supplies directly. Thus, if MGE finds that it can acquire supply and  
9 operate the Transok lease for less than 5 percent of the Transok index price (which is  
10 what MGE has been paying Mid-Kansas to perform these functions), MGE can take  
11 over and operate its share of the lease.

12 MGE also worked with Mid-Kansas/Riverside to revise another set of  
13 agreements that Bishop had entered into with Western at the time Mid-Kansas I was  
14 amended (October 1991).<sup>12</sup> Those agreements committed Western to a second project  
15 to be developed by Mid-Kansas/Riverside to bring an additional source of pipeline  
16 capacity to Kansas City.<sup>13</sup> When Western sold its western Missouri operations to  
17 MGE, the status of the "Old Western Contracts" became uncertain to MGE. The  
18 Riverside II Agreement, entered into by MGE and Mid-Kansas affiliate Riverside

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<sup>11</sup> The service provided under Mid-Kansas II was a "bundled" sales service. When the FERC took jurisdiction over the Bishop Group's pipeline system (which occurred on June 1, 1998), the bundled sales service under Mid-Kansas II was replaced by an equivalent transportation-only service provided under a Firm Gas Transportation Service Agreement (Riverside I) executed at the same time as Mid-Kansas II.

<sup>12</sup> These agreements were between Western and four of Mid-Kansas's affiliates. The agreements are referred to hereinafter as "the Old Western Contracts".

<sup>13</sup> Studies done for Western by outside consultants in 1987 and 1991 strongly encouraged Western to diversify its sources of gas supply. The latter of those two studies considered specifically and recommended an expanded relationship with Mid-Kansas/Riverside. After completion of that work, Western agreed to certain amendments to Mid-Kansas I that Mid-Kansas/Riverside had been seeking, and entered into the Old Western Contracts.

1 Pipeline Company (Riverside) at the same time as the execution of the Mid-Kansas II  
2 Agreement, settled that uncertainty by committing the two companies to a new lateral  
3 off of the Panhandle Eastern pipeline system about 30 miles south of Kansas City. The  
4 new lateral would serve the southern part of the Kansas City metropolitan area, on both  
5 Kansas<sup>14</sup> and Missouri sides, with significantly larger volumes than were available  
6 under the Mid-Kansas Agreements. MGE's share of the new lateral was to provide  
7 150,000 MMBtu/day, or more than 15 percent of MGE's requirement for peak-day  
8 capacity, into an area previously served almost entirely by Williams.<sup>15</sup>

9  
10 Q. Is it unusual for an LDC to renegotiate supply arrangements so soon after assuming  
11 them?

12  
13 A. Almost no gas utility company gets to develop its supply portfolio "from scratch".  
14 Typically, at any given point in time, a company has a set of contracts in place that  
15 must be honored, or renegotiated if necessary and if possible. Changes to commodity  
16 supply contracts, and to transportation and storage contracts, are usually made when  
17 other contracts expire.

18 The circumstance of "inheriting" in-place supply arrangements, and other  
19 supply-related commitments, was certainly true for MGE. As all acquirers do, MGE

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<sup>14</sup> A counterpart agreement was entered into on the Kansas side by Western and Mid-Kansas affiliate Kansas Pipeline Partnership on February 28, 1995.

<sup>15</sup> After construction of the lateral had begun, the Bishop Group sold the project to K N Energy. By that time (November, 1996), K N had developed the Pony Express Pipeline System by acquiring an abandoned crude oil pipeline from Wyoming to a point south of Kansas City and converting it to natural gas service. Thus, MGE's actions in negotiating the Riverside II Agreement ultimately led to access to an entirely new supply area.

1 took some time to learn about those arrangements and commitments prior to closing its  
2 purchase of the properties. In the course of its due-diligence review, MGE must have  
3 found that the in-place arrangements were either delivering gas at competitive prices or,  
4 as in the case of the Tight-Sands Contracts, were subject to special considerations that  
5 required their continuation.<sup>16</sup> Upon completion of its review, MGE agreed to assume  
6 those contracts and commitments as part of its acquisition of Western's western  
7 Missouri operations.<sup>17</sup>

8  
9 Q. What do you conclude about the prudence of MGE's actions in entering into the Mid-  
10 Kansas II Agreement?

11  
12 A. On the basis of my experience with gas supply evaluations for companies like MGE,  
13 the Company's actions in assuming, and then seeking adjustments to, the portfolio of  
14 supply contracts and commitments entered into by Western were reasonable and  
15 prudent. Specifically,

- 16 - MGE's examination of those contracts and commitments in its due-diligence  
17 analysis revealed no reason to not assume them when it closed its acquisition,  
18 and it does not appear that MGE proposed any changes to those contracts and  
19 commitments in its agreement with Western, or in the approvals that it sought  
20 from the Missouri Public Service Commission;  
21

---

<sup>16</sup> In 1984, Western's predecessor Kansas Power & Light brought suit against several natural gas producers and Williams to recover alleged overcharges from sales of gas from "tight-sands" formations in Wyoming. The litigation was settled in 1990. Under the settlement, KPL would receive approximately \$100 million in credits on gas purchases over a 20-year period. The agreed purchases were of the tight-sands gas. (See Mo. P.S.C. Case No. GR-91-286, decided October 11, 1991.)

<sup>17</sup> The Missouri Public Service Commission approved the acquisition, with conditions that did not address the supply arrangements, on December 29, 1993.

- 1 - Very soon after the acquisition was completed, MGE moved aggressively to  
2 renegotiate a supply contract (Mid-Kansas I) that had, in MGE's view, moved  
3 out of line. MGE's aggressive action brought considerable improvement in the  
4 terms of that contract from the perspective of MGE's customers, while  
5 preserving MGE's access to an alternative supplier (Mid-Kansas) which, in turn,  
6 provided improved access to a lower-cost supply region;  
7  
8 - MGE also moved aggressively to reduce its and its customers' potential  
9 exposure to costs which might have been incurred under other agreements with  
10 Mid-Kansas/Riverside (the Old Western Contracts), while securing the principal  
11 benefit of those agreements, namely the new high-capacity lateral from  
12 Panhandle into southern Kansas City. That lateral alone increased the non-  
13 Williams portion of MGE's peak-day supply capacity from 8.3 percent to almost  
14 25 percent, with the potential to divert a much larger portion of MGE's annual  
15 requirements away from Williams.  
16

17 The results of MGE's assumption of, and then negotiated adjustments to, these  
18 agreements were available to the Missouri Public Service Commission Staff and other  
19 interested parties as they considered MGE's gas supply costs for the 1993-94 ACA  
20 period. In a stipulation in that case (Case Nos. GR-94-101 and GR-94-228), the parties  
21 agreed:

22 ... that neither the execution of the MKP/WR Sales Agreement and the  
23 Riverside/WR Transportation Agreement I [these are the agreements  
24 which were assumed by MGE], nor the decisions associated with the  
25 execution of the Missouri Agreements [one of these is the Mid-Kansas II  
26 contract] shall be the subject of any further ACA prudence review.  
27 (Stipulation and Agreement, at page 4)  
28

29 The Commission approved the stipulation on June 11, 1996.<sup>18</sup>  
30

31 2. MGE's prudence in operating under its contracts.

32 Q. What about MGE's operations under the Mid-Kansas II Agreement?

---

<sup>18</sup> "Order Approving Stipulations and Agreements", issued in Case Nos. GR-94-101 and GR-94-228, on June 11, 1996.

1 A. The second aspect of prudence in gas purchasing is whether a company's portfolio of  
2 contracts is operated in a manner which results in the lowest possible gas price to its  
3 customers, after giving effect to the requirements in the various contracts, and to other  
4 special considerations which may impact a company's gas-purchasing decisions.<sup>19</sup> In  
5 MGE's case, the standard prudence review has been at least partially displaced by the  
6 Experimental Gas Cost Incentive Mechanism (EGCIM),<sup>20</sup> but the intended result is the  
7 same: to produce a pattern of purchasing decisions which minimizes costs to customers,  
8 consistent with the requirements of a company's gas-supply contracts, and with other  
9 considerations which affect the supply process.

10 Schedule JBA 6, attached to my testimony, is a chart which shows gas prices  
11 on the three pipelines which served MGE during the months which comprise the ACA  
12 period of interest in this proceeding. The chart shows that, throughout the period, gas  
13 prices on the Transok system were considerably lower than those on the Panhandle  
14 system which, in turn, were slightly lower than those on the Williams system. The  
15 Transok system is the source for much of the gas supplied under the Mid-Kansas  
16 contract and, as noted earlier, the price for gas supplied under the contract is linked to  
17 prices on the Transok system. The chart suggests that the slight premium over the

---

<sup>19</sup> An example of such a consideration is the influence of the tight-sands settlement on MGE's purchases. See the Commission's order cited in Note 16, above, especially item 6 of the Stipulation and Agreement attached to and adopted by the order.

<sup>20</sup> In its Report and Order in Case No. GO-94-318, Phase II (*Re: In the matter of the investigation of certain PGA-related issues involving Missouri Gas Energy, a division of Southern Union Company*), issued January 31, 1996, the Commission found that its PGA/ACA process should be modified for MGE on an experimental basis to include a commodity-cost incentive mechanism. Under MGE's EGCIM, so long as MGE's actual gas costs are within ranges specified in the order, no prudence review is necessary. If actual gas costs are above a specified level, however, MGE would have the burden of dispelling the Commission's doubts about its gas-purchasing practices. See the Commission's order at pages 14-21.



1 Transok index price (5 percent) that MGE pays for that supply is generally less than  
2 half of the difference between Transok prices and the average of Panhandle and  
3 Williams prices, and considerably less than half of that difference in some months.  
4 (Notice especially the months of December, 1996, and January and February, 1997.)

5 Schedule JBA 7, also attached to my testimony, is a chart which shows daily  
6 volumes taken by MGE on each of the three pipelines, along with estimates of the load  
7 factor on each pipeline for each month from April, 1996 through March, 1997.<sup>21</sup>  
8 Notice that the load factors on Mid-Kansas, which is the source of the cheapest gas, are  
9 higher than those for Williams in all five of the heating-season months, and are higher  
10 than those for Panhandle in three of those five months.<sup>22</sup> Mid-Kansas's load factors are  
11 generally higher during the non-heating season as well, even though takes in those  
12 months are complicated by storage-fill volumes and the requirement that MGE take  
13 tight-sands gas.<sup>23</sup>

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<sup>21</sup> This period is not exactly the same as the period of interest in this proceeding, but nine of the 12 months are the same, and the heating-season months, which are the most important for purposes of this comparison, are the correct ones for the current proceeding.

<sup>22</sup> I did not attempt to explore why Mid-Kansas's load factor is lower than Panhandle's in November, 1996 and March, 1997, but I suspect that it is because the Panhandle supply is a smaller proportion of the supply available to a larger market area than is the case with Mid-Kansas. Thus, MGE's takes of Mid-Kansas supply are probably constrained by physical factors (or by MGE's need to take tight-sands gas) in those two months. Indeed, the load factor on Panhandle in those months is considerably higher than that on Williams in those months, which is consistent with the observed relationship between prices on those two systems. (Prices on the Panhandle system are lower than those on Williams.)

<sup>23</sup> Joan Schnepf, Vice-President of Operations for Mid-Kansas's operating company (Kansas Pipeline Operating Company, or KPOC), and also a witness in this proceeding, reports that she was told that the reason that MGE took no gas from Mid-Kansas in September, 1996, was that MGE had to correct imbalances with or relating to the Williams system.

1 Other information suggests that the price differentials among the supply sources  
2 to which MGE has access are exerting a strong influence on MGE's supply operations.  
3 Schedule JBA 8 and Schedule JBA 9, also attached to my testimony, are taken from  
4 MGE presentations to prospective gas suppliers.<sup>24</sup> The first presentation was in March  
5 1994, soon after MGE took over operations from Western; the second was in August  
6 1997, after the Mid-Kansas contract had been renegotiated, and the Pony Express  
7 Pipeline project was being implemented. Comparison of the figures on the two charts  
8 shows the following:

- 9 - After renegotiation of the Mid-Kansas contract resulted in lower commodity  
10 prices, volumes taken by MGE from that source approximately doubled;
- 11 - Volumes also shifted from Williams to Panhandle over the period; and
- 12 - Introduction of gas from Wyoming via the Pony Express project was expected to  
13 displace volumes taken on all three of MGE's other pipelines, with Williams  
14 sources taking the largest proportionate displacement.  
15  
16  
17  
18

19 Q. What do you conclude from this information?

20  
21 A. The patterns cited -- monthly load factors during months of interest in this proceeding,  
22 and estimated and actual takes by pipeline since 1992 -- strongly suggest that  
23 purchasing has been conducted in a way that minimizes costs to MGE's customers.  
24 Certainly these patterns are consistent with and suggestive of a conclusion that gas  
25 purchasing has been conducted in a prudent manner.

---

<sup>24</sup> Materials from these presentations were submitted by MGE in response to Mid-Kansas Data Request No. 14.

1           Furthermore, Mid-Kansas's gas price during the period was below the index  
2           prices on the Panhandle and Williams systems. Since MGE is supplied via only those  
3           three pipelines, and since the EGCIM uses price benchmarks based on a weighted  
4           average of index prices on the Panhandle and Williams systems, MGE's actual gas  
5           costs are likely to have been within the tolerance zone provided in that mechanism,  
6           where no ACA-period prudence review is necessary.

#### 8                               IV. Staff Witness Wallis's Concerns

9   Q.     Please comment on the concerns expressed in Staff Witness Wallis's Direct Testimony.

10  
11   A.     Staff Witness Wallis's Direct Testimony, submitted in this proceeding in August, seems  
12           to suggest that MGE erred in taking gas from Mid-Kansas, since those volumes "...  
13           could have been nominated and transported on Williams ..." at a lower cost. (Wallis  
14           Direct Testimony at pages 2-3) While he concedes that commodity costs on Mid-  
15           Kansas are lower than those on Williams, he says that Mid-Kansas's higher  
16           transportation costs more than offset the difference in commodity costs.

17           Mr. Wallis's argument ignores the existence of an in-place and effective contract  
18           with Mid-Kansas, and MGE's obligation to honor that contract. First, I share MGE  
19           Witness Langston's assessment that the Mid-Kansas II Agreement does not provide for  
20           nominating and transporting gas purchased under that contract via an alternate route.<sup>25</sup>  
21           Second, even if such an option was allowed under the contract, Mr. Wallis

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<sup>25</sup> The reference here is to Mr. Langston's Direct Testimony, filed in this proceeding on August 3, 1998, at page 13.

1 underestimates the costs that would have been incurred. As is the case with most  
2 pipelines (including Williams), most of the transportation charges under the Mid-  
3 Kansas contract are in the form of reservation ("demand") charges, which means that  
4 they must be paid irrespective of whether gas is actually shipped. Thus, those charges  
5 would have to be added to the costs of Mr. Wallis's alternative in order for it to provide  
6 a choice that MGE might validly make. A valid alternative would have to include 1)  
7 reservation charges on Mid-Kansas, 2) variable transportation charges on Williams,<sup>26</sup> 3)  
8 the cost of interruptible or released capacity on Williams, and 4) gas supply purchased  
9 in field markets served by Williams. Such an alternative would have exceeded the cost  
10 of the Mid-Kansas supply by at least \*\* \_\_\_\_\_ \*\*, plus the cost of the capacity on  
11 Williams. Thus, if Mr. Wallis's argument is that MGE was imprudent in the way that  
12 it operated under its contracts, correcting his analysis shows that his argument is simply  
13 wrong.

14 Another conceivable interpretation of Mr. Wallis's hypothetical is to assume that  
15 MGE could get out of its contract with Mid-Kansas somehow,<sup>27</sup> and enter into a  
16 contract with Williams for the same services. Assuming for the sake of argument that

---

<sup>26</sup> Mr. Wallis's number for this component, or his amount for gas supply (both of which are presented in the work paper that he attached to his response to Mid-Kansas Data Request No. 1), is wrong. MGE points out in its response to Staff Data Request No. 23 that

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\*\*

<sup>27</sup> Recall that Mid-Kansas Witness Putman estimated that the net present value of the revenues under Mid-Kansas I was in excess of \$100 million. Recall also that Staff Witnesses Shaw and Sommerer, and MGE Witness Langston, testified in their respective depositions that they had not seen, nor were they aware of, situations where a company could simply "walk away from" a valid contract. See Note 10, above.

1 this could be done, Mr. Wallis's comparison of the costs of the alternatives is  
2 inaccurate for the following reasons:

- 3 - His calculation uses city-gate volumes for computing the cost of his Williams  
4 alternative, rather than field-purchase volumes;<sup>28</sup>  
5
- 6 - He ignores "direct-bill" amounts -- items like take-or-pay charges, Order 636  
7 transition charges, recovery of costs incurred to remedy PCB contamination,  
8 etc. -- which would certainly apply to transportation service provided by  
9 Williams.

10  
11 In responding to Mr. Wallis's data request regarding the costs of his  
12 hypothetical (Staff Data Request No. 23), MGE did not include direct-bill amounts.  
13 MGE can speak to why those amounts were not included in its response; my view is  
14 that, given the history of Williams's relationship with what is now MGE, it is highly  
15 likely that Williams's other customers would insist that a new contract to replace Mid-  
16 Kansas bear a pro rata share of Williams's direct-bill costs. Those customers would  
17 view a contract which substituted for Mid-Kansas as a resumption of a prior  
18 relationship -- same customer, same facilities, same quantity, same delivery point as  
19 had been in place prior to the introduction of the Mid-Kansas supply -- rather than a  
20 new one. Accordingly, those customers would insist that the resumed relationship bear  
21 its fair share of Williams's direct-bill costs, and I believe that a proper comparison has  
22 to include them.

23 Schedule JBA-10, attached to my testimony, is a chart which illustrates the  
24 effects of correcting Mr. Wallis's comparison. The bar on the left shows Mr. Wallis's  
25 recommended adjustment as he developed it from MGE's response to Staff Data

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<sup>28</sup> The difference is pipeline fuel, which is reported as variable transportation cost for Mid-Kansas.

1 Request No. 23. The second bar shows the reduction in the adjustment for Mr.  
2 Wallis's mistake regarding pipeline fuel.<sup>29</sup> The third bar shows how much the  
3 adjustment would be reduced by assigning a pro rata share of MGE's direct-bill costs to  
4 Mr. Wallis's hypothetical.<sup>30</sup>

5 With those two adjustments, the city-gate costs (commodity supply plus  
6 transportation costs) of the two alternatives, Mid-Kansas actual and Mr. Wallis's  
7 hypothetical, differ by less than \*\* \_\_\_\_\_ \*\*. In my experience, that is a very  
8 small difference for competing supply alternatives. The difference among the city-gate  
9 costs of gas delivered to New York City via Transco, Texas Eastern and Tennessee Gas  
10 Pipeline, for example, is usually at least five percent, and the delivered cost of gas to  
11 South Commack (Long Island), New York via the Iroquois system is usually at least 15  
12 percent above the average of the other three.

13 In approving MGE's gas-cost incentive mechanism, the Missouri Commission  
14 allowed for management discretion in selecting an optimal mix of supply resources.  
15 The tolerance zone and sharing ranges established as part of that mechanism allow  
16 MGE to trade off among capacity resources and commodity supplies, without having to  
17 demonstrate the prudence of those trade-offs, as long as the weighted average cost of

---

<sup>29</sup> See Note 26, above.

<sup>30</sup> This adjustment is conservative. If MGE were to resume this relationship with Williams, I would expect Williams's other customers to demand that this service bear a pro rata share of all of Williams's direct-bill costs, rather than a share of MGE's portion of those costs, which is how the adjustment here is calculated.

1 those commodity supplies (excluding Tight-Sands gas) is less than ten percent above the  
2 benchmark.<sup>31</sup>

3 The fourth bar on my chart shows that Mr. Wallis's proposed adjustment would  
4 be negative if he had used 1.1 times the benchmark gas cost in the incentive  
5 mechanism, rather than the benchmark itself. Under the incentive mechanism, MGE's  
6 commodity purchases are presumed prudent if the weighted average cost of those  
7 purchases is less than 1.1 times the benchmark gas cost. Thus, the delivered cost of  
8 Mid-Kansas supply could have been almost \*\* \_\_\_\_\_ \*\* percent higher than it was and  
9 still not have resulted in a prudence review.<sup>32</sup>

10  
11 Q. What about Mid-Kansas's transportation charges?

12  
13 A. Mr. Wallis's concern seems to be that the transportation charges under the Mid-Kansas  
14 contract are higher than those on the Williams system.<sup>33</sup> In fact, this difference is likely  
15 due to the fact that Mid-Kansas is a relatively new gas pipeline system, whereas the  
16 Williams system has been in place for some time. The new-versus-old difference gives  
17 rise to two kinds of differences in a pipeline's rates:

18 - Construction costs: Because of general increases in construction costs over time,  
19 almost any facility constructed today costs more than an identical facility

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<sup>31</sup> The benchmark is four percent above a weighted average of index prices on the Panhandle and Williams systems. See the Commission's order in Case No. GO-94-318, cited in footnote 20.

<sup>32</sup> This estimate is probably conservative. The EGCIM works on the weighted average cost of gas (WACOG), rather than on the cost of individual streams. Thus, unless the commodity costs of MGE's other gas supplies were quite high, the cost of the Mid-Kansas supply could have been even higher without raising the WACOG out of the tolerance zone.

<sup>33</sup> See, e.g., his response to Mid-Kansas Data Requests No. 12, 53A, and 55A.

1 constructed 60 or 70 years ago. Under rate-base/rate-of-return regulation,  
2 higher construction costs yield a higher rate base, which, in turn, yields higher  
3 transportation rates and charges.

4  
5 - This effect also occurs with facilities which, like many of the components of the  
6 Mid-Kansas system, were acquired by Mid-Kansas' upstream affiliate, rather  
7 than constructed. Acquisitions tend to take place at values related to  
8 replacement costs, rather than historical costs. The effect on rate base, and thus  
9 on transportation rates and charges, is the same: higher construction costs make  
10 the replacement cost of a long-lived facility (like a pipeline) considerably higher  
11 than the original installation cost. Consequently, the rate base of a pipeline  
12 which is acquired and converted to gas service is likely to be considerably  
13 higher than that of an identical facility which was constructed and placed into  
14 service 60 or 70 years ago.

15  
16 - Depreciation: Facilities which have been in service for a long time also have the  
17 benefit of many years' depreciation in determining their rate base, and thus their  
18 transportation rates and charges. Newer facilities, whether they have been  
19 constructed or acquired, have had less time to be depreciated. Again, in a rate-  
20 base/rate-of-return environment, this difference results in lower rates and  
21 charges for an older facility.

22  
23  
24 Q. Is it unusual for pipelines with different cost structures to serve the same city-gate  
25 markets?

26  
27 A. Examples of pipeline systems which serve the same markets but which have different  
28 cost structures, and thus different rates and charges, are plentiful. One example that I  
29 am familiar with is the pipelines into the State of Connecticut. The three LDCs in that  
30 State are served by three pipelines: the Tennessee Gas Pipeline system, the Algonquin  
31 Gas Transmission system, and the Iroquois Gas Transmission system. The three  
32 systems are of different vintages, which manifests itself in their respective rates for  
33 transportation service:

34 \*\*

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Many more examples could be cited; the point is that Mr. Wallis's concern about Mid-Kansas's transportation charges and their relationship to Williams's is not a basis to conclude that MGE was imprudent in contracting to pay a higher transportation charge.

Q. Are there good reasons for an LDC to choose a pipeline system with higher transportation charges?

A. The TCPL/Iroquois system, like Mid-Kansas, involves more expensive transportation, but it connects the city-gate markets it serves with less-expensive gas: gas from western Canada. Mr. Wallis's analysis acknowledges this trade-off, as his analysis compares the cost of two alternative sources of gas supply, Mid-Kansas and his hypothetical involving Williams, on the basis of their respective total costs -- commodity supply and transportation -- delivered to the city gate.

34 \* \*

\*\*

1 Q. Are there other reasons that an LDC might choose a pipeline system with higher  
2 transportation charges?

3  
4 A. As noted above, Mr. Wallis's analysis implicitly acknowledges one of the reasons that  
5 an LDC might contract for more-expensive transportation service, namely, access to a  
6 lower-cost gas supply. There are at least two other reasons which seem likely to have  
7 been considered by MGE in reaching its decision to contract with Mid-Kansas: supply  
8 reliability and increased negotiating "leverage" with the other pipelines, particularly  
9 Williams.

10       Regarding reliability, it is almost self-evident that a larger number of sources of  
11 supply provides more reliability than a smaller number. This consideration is  
12 magnified when the numbers are small: two sources versus one, for example, or three  
13 versus two. MGE's predecessor Western had an opportunity to experience the value of  
14 a second supplier in 1993. In the late summer of that year, severe flooding resulted in  
15 operational difficulties on the Williams system; only continuing service from Mid-  
16 Kansas into the north of Kansas City, and from Panhandle into the south, kept a  
17 difficult situation from becoming much worse.

18       On the issue of negotiating leverage, there is considerable evidence that MGE  
19 was concerned about its heavy reliance on Williams at the time that the Mid-Kansas  
20 contract was being renegotiated (late 1994 and early 1995). At that time, in addition to  
21 the Mid-Kansas negotiation, MGE was evaluating alternatives for supplying an  
22 additional 100,000 to 150,000 MMBtu/day into its Kansas City market to meet  
23 observed and anticipated growth in that market.

1 Internal documents dating from that period<sup>35</sup> show that \*\*

7 \*\*.

8 MGE found Mid-Kansas/Riverside much easier to work with. As noted earlier,  
9 considerable progress had been made in revising the terms of the Mid-Kansas I  
10 Agreement, and Mid-Kansas/Riverside was amenable to converting the Old Western  
11 Contracts into an alternative involving a new, high-capacity connection, which Mid-  
12 Kansas/Riverside would construct and own, between Panhandle's main line and MGE's  
13 distribution system on the south side of its service territory. Released firm capacity  
14 was generally available at some level on Panhandle, and Mid-Kansas/Riverside's main  
15 pipeline system was inter-connected with Panhandle upstream of the Kansas City area.  
16 Thus, the alternative being discussed with Mid-Kansas/Riverside provided an option to  
17 use the Group's main system to ship Oklahoma gas into the south of Kansas City (via  
18 Panhandle and the new link), as well as into the Riverside area. This option was in  
19 addition to options involving supplies from field markets served by the Panhandle  
20 system. In an internal evaluation dated January 25, 1995,<sup>36</sup> MGE found that

<sup>35</sup> See, e.g., "Analysis of Kansas City Market Needs and Capacity Alternatives", January 25, 1995.

<sup>36</sup> *Ibid.*

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**\*\***

**\*\***

<sup>37</sup> Reed Consulting Group, February 14, 1995.

1 Williams was quite properly a significant consideration in MGE's decision to enter into  
2 the Mid-Kansas II and related agreements.

3 The cited language and the rest of those two documents make clear MGE's  
4 perception that an expanded relationship with Mid-Kansas/Riverside was a preferred  
5 option for further diversifying its sources of supply into its Kansas City service territory.  
6 Such diversification was an objective that MGE sought for all of the reasons previously  
7 cited: expanded access to low-cost supply regions, additional supply security, and  
8 increased bargaining leverage vis-a-vis existing pipelines, particularly Williams. Mid-  
9 Kansas Witness Langley points out in his deposition<sup>38</sup> that adding a second contract with  
10 the Bishop entities provided a fourth benefit: averaging down the overall costs of the  
11 supply capacity made available by Mid-Kansas/Riverside.

12 As previously noted, the Mid-Kansas system was originally installed to move  
13 crude oil and refined petroleum products to and from a refinery in Kansas City, Kansas.  
14 While the system was able to be converted to natural gas service, it uses smaller-diameter  
15 pipe than would have been the case had it been designed for gas transmission. Smaller-  
16 diameter pipe involves relatively high capital and operating costs when considered on a  
17 per-unit-of-installed-capacity basis.

18 The lateral to Panhandle was to have the effect of mitigating those high capital  
19 and operating costs. The design of the lateral was optimized for natural gas service, and  
20 the installed capacity was to be considerably higher than that provided by Mid-Kansas II  
21 -- MGE's portion of the lateral was to be 150,000 MMBtu/day, or more than three times  
22 the capacity provided by Mid-Kansas II.

---

<sup>38</sup> See Schedule JBA 11, Deposition Transcript of Dennis Langley, page 32, lines 9-19

1 As also previously noted, Mid-Kansas II and Riverside II were entered into at  
2 the same time. Schedule JBA 12, attached to my testimony, illustrates the effect on  
3 the capacity costs to MGE of adding the second contract. The blending of Mid-Kansas  
4 II and Riverside II results in a weighted average capacity cost of \$6.6578 per  
5 MMBtu/day per month, which is \$3.6125 per MMBtu/day per month less than the  
6 counterpart rate for capacity on Williams, which was \$10.2703 at the time that  
7 Riverside II was expected to go into service (October 1, 1996).

8  
9 Q. What do you conclude from this information?

10  
11 A. I conclude that Mr. Wallis's concern about the level of Mid-Kansas's transportation  
12 charges is unjustified. In support of that conclusion, I have cited another example<sup>39</sup> of  
13 pipelines with very different transportation charges, but which serve the same city-gate  
14 markets, and I have identified three reasons why an LDC might reasonably choose to  
15 contract with the higher-cost system:

- 16 1. To access lower-cost gas supplies: Even Mr. Wallis's analysis acknowledges the  
17 relevance of this consideration in MGE's decision;  
18
- 19 2. For additional supply reliability: The occurrence in this decade of an event  
20 requiring alternative suppliers to compensate for operational difficulties  
21 illustrates the validity of this concern; and  
22
- 23 3. For additional bargaining leverage in dealing with a dominant supplier: Internal  
24 documents contemporaneous with MGE's decision to enter into the Missouri  
25 Agreements make clear the relevance of this consideration.  
26

---

<sup>39</sup> As previously noted, I believe that many such examples could be found. The one cited was readily accessible to me.

1 Moreover, in the case of Mid-Kansas, the simultaneous execution of the Riverside II  
2 Agreement effectively lowered the cost of capacity on Mid-Kansas/Riverside to a level  
3 considerably below that on Williams.

4  
5  
6 **V. Overall Conclusions**

7 Q. Please summarize your conclusions.

8  
9 A. Mr. Wallis's Direct Testimony proposes an adjustment in gas costs recoverable by  
10 MGE for the '96/'97 ACA period. The reason that he gives is the difference between  
11 amounts paid by MGE to Mid-Kansas and an amount that might have been paid under a  
12 hypothetical alternative developed by him.

13 Mr. Wallis's deposition<sup>40</sup> makes clear that the real issue is MGE's decision to  
14 enter into the Mid-Kansas II Agreement. His proposed adjustment is his estimate of the  
15 damage done to MGE's ratepayers during the '96/'97 ACA period by MGE's decision  
16 (in 1995) to enter into the contract.

17 I have identified and presented evidence that strongly indicates to me that  
18 MGE's decision to enter Mid-Kansas II was prudent, and that MGE's operation of its  
19 effective contracts during the ACA period was also prudent. I have also provided  
20 another example -- and I believe that I could find many such examples -- of city-gate  
21 markets being served by pipelines with quite different transportation charges, and I  
22 have presented several reasons why an LDC's customers might be well served by that

---

<sup>40</sup> See Schedule JBA 13, Deposition Transcript of Michael Wallis, page 52, lines 6-8.

1 LDC contracting for transportation service on a more-expensive pipeline. I have also  
2 presented what I believe is particularly compelling evidence of MGE's consideration of  
3 the benefits to its customers in the Kansas City area of competition among pipelines to  
4 provide gas-delivery capacity to that area.

5 Finally, I have shown that the comparison used by Mr. Wallis to compute his  
6 proposed adjustment is simply wrong:

- 7 - First, even before correcting the mistakes in Mr. Wallis's comparison, the  
8 difference between the average delivered cost of the Mid-Kansas supply and that  
9 of Mr. Wallis's hypothetical alternative is well within the tolerance of MGE's  
10 EGCIM;
- 11  
12 - Second, when Mr. Wallis's proposed adjustment is corrected for variable  
13 transportation charges and Williams direct-bill charges, the difference between  
14 Mid-Kansas's costs and those of his hypothetical alternative is within the range  
15 of variation among such costs that I have seen in other city-gate markets in the  
16 U.S., particularly in the Northeast;
- 17  
18 - Third, when Mr. Wallis's proposed adjustment is further corrected for Mid-  
19 Kansas demand charges which would have to be paid even if volumes were  
20 nominated and shipped on Williams, Mr. Wallis's alternative is more expensive  
21 than the Mid-Kansas supply.
- 22

23 For all of these reasons, I urge the Commission to reject Mr. Wallis's proposed  
24 adjustment.

25  
26 Q. Does that conclude your prepared Rebuttal Testimony?

27  
28 A. Yes, it does.



**BEFORE THE PUBLIC SERVICE COMMISSION**  
**OF THE STATE OF MISSOURI**

In the matter of the Missouri Gas Energy's  
Gas Cost Adjustment Tariff Revisions to  
Be Reviewed in its 1996-1997 Annual  
Reconciliation Adjustment Account

)  
)  
)  
)  
Case No. GR-96-450

**AFFIDAVIT OF JOHN B. ADGER, JR.**

STATE OF KANSAS )

COUNTY OF JOHNSON )

ss.

John B. Adger, Jr. of lawful age, on his oath states: that he has participated in the preparation of the foregoing Rebuttal Testimony in question and answer form, considering of 30 pages to be presented in the above case; that the answers in the foregoing Rebuttal 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.

  
John B. Adger, Jr.

Subscribed and sworn to before me this 30 day of November, 1998.

FELICIA A. BODY  
NOTARY PUBLIC  
STATE OF KANSAS  
MY APPT. EXPIRES 6-2-2002

  
Notary Public

My commission Expires: 6-2-2002

# **JOHN B. ADGER, JR.**

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## **Areas of Specialization**

Natural gas supply and procurement strategy; natural gas marketing strategy; gas industry strategic analysis and business planning; U.S. and Canadian gas industry regulation.

## **Relevant Experience**

### **Commission-Sponsored Audits**

Lead Consultant on Liberty's management audit of Southern Connecticut Gas Company for the Connecticut Department of Public Utility Control. Responsible for reviews of gas supply and marketing activities, and coal tar remediation activities.

For the staff of a regulatory commission in the northeast U.S., evaluated a proposed gas-service and capacity-release project that was proposed by a jurisdictional utility.

Lead Consultant on Liberty's management audit of Connecticut Natural Gas Company for the Connecticut Department of Public Utility Control. Responsible for reviews of gas supply and marketing activities.

Managed Liberty's audit of the gas purchasing and supply management policies and practices of K N Energy, Inc. for the Wyoming Public Service Commission. Responsible for reviews of gas acquisition, gas transportation and storage, relationships with affiliates, and response to regulatory change. Conducted supplemental evaluations in response to Liberty's initial findings, and presented testimony to the Commission in the proceeding to consider K N's pilot program for unbundling its services in Wyoming.

Lead Consultant on Liberty's management audit of Yankee Gas Services Company for the Connecticut Department of Public Utility Control. Responsible for reviews of gas supply activities and coal tar remediation activities.

Directed Liberty's analysis for the Georgia Public Service Commission of the impacts of FERC's Order 636 on gas rate structures in Georgia.

Consultant on Liberty's management audit of the Tennessee operations of United Cities Gas Company for the Tennessee Public Service Commission. Responsible for reviews in system operations, marketing, and affiliate relationships.

Lead Consultant on Liberty's audit of gas purchasing policies and practices at Pike Natural Gas Company and Eastern Natural Gas Company for the Public Utilities Commission of Ohio. Responsible for reviews of gas acquisition, gas transportation services, and response to regulatory change.

Consultant on Liberty's audit of the affiliate relationships of Public Service Enterprise Group (holding company for Public Service Electric & Gas Company) for the New Jersey Board of

## **John B. Adger, Jr.**

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**Regulatory Commissioners.** Responsible for reviews of systems and processes, affiliate relationships, and transaction analysis with regard to (a) the purchase of gas from the Group's gas-producing subsidiary, (b) the purchase of electric power from the Group's IPP subsidiary, and (c) the Group's real estate subsidiary.

Led the evaluation of gas supply activities as part of Liberty's management audit of New York State Electric & Gas Corporation for the New York Public Service Commission.

Directed an evaluation of the marginal costs of the District of Columbia Natural Gas Company, a division of the Washington Gas Light Company, for the Public Service Commission of the District of Columbia.

Lead Consultant on a general management audit of the Peoples Natural Gas Company, a subsidiary of Consolidated Natural Gas Corporation, for the Pennsylvania Public Utility Commission. Responsible for the review of gas supply activities.

### **Natural Gas Supply Strategy**

For Kansas Pipeline Operating Company, evaluated certain gas supply contracts entered into by Western Resources' KPL Gas Service Company. Presented testimony to the Kansas Corporation Commission.

For a steam utility in Pennsylvania, solicited offers for gas supply, and structured the evaluation of the responses.

For the Potomac Electric Power Company, assisted in the development of comprehensive policies and procedures for fuels procurement. Responsible for gas acquisition policies and procedures.

Directed development of a gas supply strategy for a power-supply cooperative's first combustion turbines. (Coop's generation previously all coal-fired.)

For Delmarva Power & Light Company, assisted an internal review of gas supply planning for electric power generation.

Served as gas supply consultant to two major Midwestern gas distributors. In that capacity, directed development of long-term supply plans, short-term contracting strategies, and peak-load management plans. Also provided staff support to teams formed to negotiate with producers regarding long-term gas supply contracts, and with pipelines regarding conditions of service. Directed quantitative analysis of particular supply decisions, and did documentation projects.

For an investment banking group, explored the influence of the Midland Cogeneration Project's gas supply contracts on the Project's economic viability.

For the Interstate Natural Gas Association of America (trade association of gas pipeline companies), participated in a comparative study of supply contracting practices for gas, coal, and fuel oil. Developed recommendations for gas supply contracting.

For the Wisconsin Distributors Group, directed an analysis of gas supply alternatives for the State of Wisconsin. Directed a similar study of gas supply alternatives for the municipal Gas Department of the City of Charlottesville, Virginia.

### **Natural Gas Marketing Strategy**

Assisted a production-area storage developer in identifying prospective users of a proposed storage facility, and in marketing interests in the project.

For National Fuel Gas Supply Corporation, analyzed potential markets for gas storage and pipeline capacity in particular sectors and in particular geographic areas. Also recommended opportunities in electric utility industry restructuring for consideration by NFGS management.

For an offshore supplier of LNG, participated in an evaluation of North America as a potential market for its gas.

For the municipal Gas Department of the City of Charlottesville, Virginia, directed a rate design study. Also recommended modifications to customer service agreements.

For Yankee Gas Marketing (now Enron Access Energy), directed an analysis of line-of-business restrictions as applied to the gas industry. This analysis was attached to Yankee's filing in the FERC's rule-making proceeding regarding rules of conduct for pipeline-affiliated marketers (proceeding resulted in the issuance of FERC Order 497).

For the Canadian Petroleum Association and the Independent Petroleum Association of Canada, participated in an analysis of regional markets for Canadian gas in the U.S.

For various U.S. and Canadian gas producers, evaluated particular regional and sectoral gas markets in the U.S. Also developed strategies for market penetration.

For U.S. and Canadian producers and pipeline companies, directed analyses of alternative gas transportation systems. Also for U. S. Gas distribution companies.

For U.S. and Canadian gas pipelines and marketers, participated in preparation of a multi-client study of the market for residual fuel oil. Also developed strategies for gas sellers to use in competing with residual oil.

### **Gas Industry Strategic Analysis and Business Planning**

Co-directing a project to develop a comprehensive unbundling strategy for a gas distributor with operations in 12 states.

Directed a project to assist an electric utility in exploring opportunities in related businesses. Options considered included gas pipeline and storage projects; distribution of other fuels, including natural gas, propane and heating oil; and ventures in telecommunications.

For a combination electric and gas utility company in the midwest U.S., participated in a major re-evaluation of its strategy for its gas business unit.

For a major Canadian pipeline company, prepared an analysis of strategic factors in U.S. pipeline industry mergers. Subsequently presented findings of the study to the company's Corporate Strategy and Policy Committee.

For an investor group, evaluated three gas-gathering systems and an intra-state pipeline for possible acquisition. One gathering system was acquired, and a workout plan was developed. Now serves as Chairman of companies formed to own and operate the acquired system.

For two gas distribution companies, consulted on strategy development for non-utility subsidiaries.

For a syndicate of U.S. and Canadian commercial banks, evaluated financing and tariff restructuring for a major U.S. interstate pipeline company.

For a major Canadian pipeline company, prepared a study of possible changes in rate design and capacity planning with decontrol of the Canadian gas market. Also researched pipeline capacity allocation problems and their relationship to rate design.

Conducted several assignments in business strategy development for gas distribution companies: market segmentation, cost allocation, structuring tariffs and service contracts, *etc.*

Evaluated several U.S. pipeline companies for possible acquisition by investor groups.

Participated in evaluation of the economic viability of gas-fired cogeneration projects for equity investors and banks. Evaluations included the impact of possible regulatory change.

### **U.S. and Canadian Gas Industry Regulation**

Prepared and presented a seminar on U.S. regulation of oil and gas pipelines for staff members of the Argentina Task Force on Privatization of the Oil Industry.

For a syndicate of U.S. and Canadian commercial banks, prepared an analysis of the influence of certain FERC Gas Tariff issues on pipeline cash flow. Also provided technical support to a "due diligence" investigation for project-type financing.

For a major U.S. pipeline company, prepared an analysis of certain Federal (FERC, Council on Environmental Quality) and State (California) regulatory issues.

For the U.S. Department of Energy, financial institutions, pipelines, and distribution companies, prepared various studies exploring the impacts of regulatory change on segments of the gas industry and on specific firms.

For the U.S. Department of Energy, participated in a study of Canadian gas export policies, and the potential influence on U.S. policies toward gas imports.

Served as Director of the U.S. Federal Energy Regulatory Commission's Alaska Gas Project Office. Evaluated financing and tariff aspects of gas transportation system proposals. Responsible for policy development, managing FERC proceedings, representing the FERC to government and industry, and liaison with Canada.

Served as Director of the U.S. Federal Energy Administration's Office of Energy Project Operations. Evaluated legislative and regulatory impediments to energy project development. Recommended changes and prepared testimony for presentation to committees of the U. S. Congress.

As a Policy Analyst for the Federal Energy Administration, produced research, analysis, writing, and recommendations in oil and gas exploration and production, price control and allocation programs for crude oil and petroleum products, and the international petroleum market.

### **Other Experience**

As a geologist for Mobil Oil Corporation, conducted oil and gas exploration activities in Libya and in Indonesia.

### **Education**

M.S., *cum laude*, Geology and Geophysics, The Massachusetts Institute of Technology  
B.S., *cum laude*, Earth Sciences and Chemical Physics (double major), The Massachusetts Institute of Technology

### **Publications and Conference Presentations**

Presented a paper entitled "Can the Conflict Between Maintenance/Replacement Projects and Expansion/Upgrade Projects Be Mitigated by Using a Different Approach to Capital Budgeting?" at a Conference on Gas Company Management Under Limited Budgets, sponsored by the Institute of Gas Technology. October 1998.

Presented a paper entitled "Skills for Effective Competition" at the IGT Technical Business Forum on Enhancing Corporate Performance, sponsored by the Institute of Gas Technology. September 1997.

Panelist on Contract Abandonment at a public seminar entitled "Natural Gas: The Regulatory Crisis Now," sponsored by *The Energy Daily*. July 27, 1987.

Presented a paper on the natural gas pipeline industry to *The Energy Week* Conference, held annually by The First National Bank of Chicago. April 1987.

**John B. Adger, Jr.**

---

Presented a paper entitled "New Approaches to Gas Supply Strategies" at a symposium entitled "The Outlook for Gas Distributors in the New Market Place," sponsored by the Institute of Gas Technology. November 1986.

Presented a paper entitled "Diversification Issues in the Natural Gas Industry" to the Williamsburg Conference on the Institute of Public Utilities. December 1984. Later published in *The Impact of Deregulation and Market Forces on Public Utilities: The Future Role of Regulation*, edited by Patrick C. Mann and Harry M. Trebing (MSU Public Utilities Papers, 1985).

Presented a paper entitled "International Competition in the California Gas Market" at the Annual North American Conference of the International Association of Energy Economists. November 1984.

Presented a paper on the Alaska Natural Gas Transportation System entitled "The Intersection of 'Public' and 'Private': Studies in Energy Decision-Making" to a panel at the Annual Meeting of the American Political Science Association. August 1984.

PUBLIC SERVICE COMMISSION  
STATE OF MISSOURI

In the Matter of Missouri Gas )  
Energy's Gas Cost Adjustment )  
Tariff Revisions to be Reviewed ) Case No. GR-96-450  
in its 1996-1997 Annual )  
Reconciliation Adjustment ) October 28, 1998  
Account. ) Jefferson City, Mo.

DEPOSITION OF THOMAS SHAW,

a witness, produced, sworn and examined on the 28th  
day of October, 1998, between the hours of 8:00 a.m.  
and 6:00 p.m. of that day at the law offices of  
Brydon, Swearingen & England, 312 East Capitol, in the  
City of Jefferson, County of Cole, State of Missouri,  
before

KELLENE FEDDERSEN, CSR, RPR  
ASSOCIATED COURT REPORTERS, INC.  
714 West High Street  
P.O. Box 1308  
JEFFERSON CITY, MO 65109  
(573) 636-7551

and Notary Public within and for the State of  
Missouri, commissioned in Cole County, in the  
above-entitled cause, on the part of MGE, taken  
pursuant to agreement.

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1 company totally release an LDC from its contractual  
2 obligations without some form of penalty with damages  
3 or payment, compensation?

4 A. Not that I'm aware of.

5 Q. You've testified that you believe  
6 Panhandle's reservation charges to MGE are higher than  
7 Williams; is that correct?

8 A. That's correct.

9 Q. Okay. Are you aware that in this particular  
10 ACA proceeding the Staff has not recommended a  
11 disallowance of charges paid by MGE to Panhandle?

12 A. In my review of the Staff recommendation  
13 filed, I don't recall that disallowance being in  
14 there.

15 Q. Well, if the reservation charge is higher,  
16 why wouldn't there be a disallowance?

17 A. Again, I was not asked for input. I did not  
18 do any work in GR-96-450 prior to the Staff  
19 recommendation being filed.

20 Q. So you're saying -- let me ask it this way.  
21 Are you intending for your testimony to review the  
22 Panhandle contract and its rates and charges and to  
23 determine whether or not there should be a  
24 disallowance on that?

25 A. No, that's not my expectation.

1 discretion?

2 A. Well, I think Staff should look at the  
3 information that was known and available to the LDC  
4 company in this instance when it's time to execute a  
5 new contract and get some type of assurance or level  
6 of security that that is the best alternative out  
7 there considering all the other options available.

8 Q. So I guess I'll ask the question again.  
9 Would MGE -- is it your testimony that MGE would have  
10 been prudent if the Mid-Kansas reservation charge was  
11 10 percent higher than Williams?

12 A. I cannot answer that question on a  
13 percentage basis or anything. I'm trying to tell you  
14 it's not the difference in the rates. It's the  
15 decision-making process that we're interested in.

16 MR. MONALDO: Would you read back that  
17 answer.

18 THE REPORTER: "Answer: I cannot answer  
19 that question on a percentage basis or anything. I'm  
20 trying to tell you it's not the difference in the  
21 rates. It's the decision-making process that we're  
22 interested in."

23 BY MR. MONALDO:

24 Q. Mr. Shaw, in your experience as a staff  
25 member of the MPSC, have you ever seen a pipeline

BEFORE THE PUBLIC SERVICE COMMISSION  
OF THE STATE OF MISSOURI

In the Matter of Missouri Gas )  
Energy's Gas Cost Adjustment )  
Tariff Revisions to be Reviewed ) Case No. GR-96-450  
in its 1996-1997 Annual )  
Reconciliation Adjustment Account )

DEPOSITION OF DAVID SOMMERER,

a witness, sworn and examined on the 27th day of  
October, 1998, between the hours of 8:00 a.m. and  
6:00 p.m. of that day at the law office of Brydon,  
Swearngen & England, 312 East Capitol Avenue, in the  
City of Jefferson, County of Cole, State of Missouri,  
before

KRISTAL R. MURPHY, CSR, RPR, CCR  
ASSOCIATED COURT REPORTERS, INC.  
714 West High Street  
Post Office Box 1308  
JEFFERSON CITY, MISSOURI 65102  
(573) 636-7551

Notary Public, within and for the State of Missouri,  
in the above-entitled cause, on the part of the MGE,  
taken pursuant to agreement.

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1 Resources and the Bishop Group and MGE.

2 But to answer your -- your question about if  
3 Mid-Kansas says no, do I -- am I aware of anything  
4 that MGE had that could have stopped the contract, no,  
5 I'm not aware of any specific provision. They had no  
6 market out clause.

7 Q. What is the basis for your suspicion that  
8 the -- you talked about in your answer that the  
9 litigation would have continued? If I understood your  
10 answer, that's what you were saying, that you  
11 suspected that the litigation --

12 A. Yes.

13 Q. -- would continue. What is the factual  
14 basis for that suspicion?

15 A. I think there is a relationship between the  
16 settlement that took place in Western District Court  
17 and those February 1995 contracts. And I really can't  
18 say much more than that, except knowing that there  
19 were allegations, general allegations, about what  
20 Western Resources had represented to MGE in the sales  
21 case, but what Bishop had alleged were MGE's  
22 responsibility pursuant to the assignment in the sales  
23 case, there was a tie-in with those February 1995  
24 contracts, and it seemed like the contracts that were  
25 executed in February 1995 were a result -- it seems a

1                   **BEFORE THE PUBLIC SERVICE COMMISSION**  
2                   **OF THE STATE OF MISSOURI**

3  
4   In the Matter of Missouri Gas                   )  
5   Energy's Gas Cost Adjustment                   )  
6   Tariff Revisions to be Reviewed                ) Case No. GR-96-450  
7   in its 1996-1997 Annual                         )  
8   Reconciliation Adjustment Account             )

9  
10                   **DEPOSITION OF MICHAEL T. LANGSTON,**

11   a witness, sworn and examined on the 27th day of  
12   October, 1998, between the hours of 8:00 a.m. and  
13   6:00 p.m. of that day at the law office of Brydon,  
14   Swearengen & England, 312 East Capitol Avenue, in the  
15   City of Jefferson, County of Cole, State of Missouri,  
16   before

17  
18                   **KRISTAL R. MURPHY, CSR, RPR, CCR**  
19                   **ASSOCIATED COURT REPORTERS, INC.**  
20                   714 West High Street  
21                   Post Office Box 1308  
22                   **JEFFERSON CITY, MISSOURI 65102**  
23                   **(573) 636-7551**

24   Notary Public, within and for the State of Missouri,  
25   in the above-entitled cause, on the part of the MGE,  
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1 purchase price/purchase arrangement, per se, with  
2 Western Resources. I was involved with the review of  
3 the gas supply and transportation contracts that were  
4 assigned as part of that transaction.

5 Q. You actually answered the question I should  
6 have asked. I was just trying to lay some groundwork  
7 to -- you understood the contracts that were being  
8 acquired by -- by MGE.

9 During the period when the negotiations were  
10 going on, do you recall having knowledge that the term  
11 of the contract, the Mid-Kansas I contract, expired  
12 around the year 2009?

13 A. Yes.

14 Q. Do you have any knowledge that would lead  
15 you to believe that Mid-Kansas/Riverside in  
16 renegotiating Mid-Kansas I would simply allow MGE to  
17 no longer have any obligations under the Mid-Kansas I  
18 agreement/Riverside agreement?

19 A. I don't think under a reasonable business  
20 position that Mid-Kansas/Riverside would take that  
21 position any more than Williams Gas Pipeline Central  
22 or Panhandle Eastern Pipeline Company or any supplier  
23 would.

24 Q. Okay. Now, under -- let me go back to --  
25 let me clear up the record.

**Comparison of Features - Mid-Kansas I / Mid-Kansas II**

<b>Feature</b>	<b>Mid-Kansas I</b>	<b>Mid-Kansas II</b>
<b>Term</b>	Until October 31, 2009	Until the Riverside I Gas Transportation Service Agreement is approved, or October 31, 2009, whichever is earlier.
<b>Price</b>	Actual weighted average cost of gas, plus applicable gathering, transportation and related charges.	105 percent of Transok index price, plus specified transportation charges: \$15.5860 per MMBtu of MDQ per month, plus \$0.0695 per MMBtu transported, subject to adjustment for outcomes of pending rate proceedings in Kansas and at FERC. Transportation rates increase by 2 percent every 3 years.
<b>Quantity</b>	Up to 46,332 Mcf/day. Annual quantity 4.015 Bcf. Monthly takes proportionate to Buyer's sales.	Up to 46,332 MMBtu/day, less any amount contracted by a customer which bypasses Buyer's system.
<b>Take-or-pay obligation</b>	None, but Buyer agrees to buy annual quantity, subject to adjustment only for change in Buyer's total sales volumes.	None.
<b>Notice for delivery volume changes</b>	8 hours	(same)
<b>Transok Lease</b>	MGE had no such option.	MGE acquired the option to take assignment of Transok Lease.

**CASE NO. GR - 96 - 450**  
**Monthly Load Factor**

	Apr-96	May-96	Jun-96	Jul-96	Aug-96	Sep-96	Oct-96	Nov-96	Dec-96	Jan-97	Feb-97	Mar-97
<b><u>Williams Natural Gas</u></b>												
Average Daily Volumes	135,738	53,974	36,105	30,951	35,518	53,204	102,126	254,793	309,979	410,658	275,727	170,634
Annual Maximum Daily Volumes	248,845	248,845	248,845	248,845	248,845	248,845	248,845	248,845	248,845	248,845	248,845	248,845
Load Factor	0.545	0.217	0.145	0.124	0.143	0.214	0.410	0.340	0.414	0.549	0.368	0.228
<b><u>Panhandle Eastern Pipeline Company</u></b>												
Average Daily Volumes	7,340	2,000	1,793	1,723	2,423	2,769	3,452	21,484	24,213	24,222	24,808	20,547
Annual Maximum Daily Volumes	17,881	17,881	17,881	17,881	17,881	17,881	17,881	17,881	17,881	17,881	17,881	17,881
Load Factor	0.410	0.112	0.100	0.096	0.136	0.155	0.193	0.706	0.796	0.796	0.815	0.675
<b><u>Kansas Pipeline Operating Company</u></b>												
Average Daily Volumes	15,913	12,008	9,943	9,572	4,878	-	4,627	25,983	45,889	46,259	45,849	22,698
Annual Maximum Daily Volumes	46,332	46,332	46,332	46,332	46,332	46,332	46,332	46,332	46,332	46,332	46,332	46,332
Load Factor	0.343	0.259	0.215	0.207	0.105	-	0.100	0.561	0.990	0.998	0.990	0.490

Source: Figure 25 of MGE Supplier Meeting Booklet



**CASE NO. GR - 96 - 450**  
**GAS INDEX PRICES**

Supplier	Jul-96	Aug-96	Sep-96	Oct-96	Nov-96	Dec-96	Jan-97	Feb-97	Mar-97	Apr-97	May-97	Jun-97
Williams Natural Gas (WNG)	2.18	2.14	1.67	1.68	2.50	3.68	4.30	2.81	1.63	1.70	1.92	2.11
Panhandle Eastern Pipeline Company - Mainline (PEPL)	2.18	2.13	1.67	1.69	2.51	3.61	4.10	2.77	1.64	1.71	1.95	2.13
Transok - Non-Fuser (TOK)	2.01	1.92	1.48	1.49	2.20	2.93	3.65	2.48	1.41	1.52	1.79	1.92
WNG/PEPL Avg. Vs. TOK Difference	0.170	0.215	0.190	0.195	0.305	0.715	0.550	0.310	0.225	0.185	0.145	0.200

Source: Inside F.E.R.C.'s Gas Market Report and Gas Daily Price Guide (First of Month Posted Prices)



*MISSOURI GAS ENERGY*

# *Supplier Meeting*

March 10 - 11, 1994



# *Supplier Meeting*

**March 10 - 11, 1994**

**Kansas City Airport Marriott Hotel  
Kansas City, Missouri  
816 / 464-2200**

**Thursday, March 10, 1994**

***5:00 P.M. to 7:00 P.M.***

**Reception**

**Friday, March 11, 1994**

***10:30 A.M. to 3:00 P.M.***

**Gas Supplier Meeting**

***Lunch will be provided***

**Dress: Casual**

***Agenda to follow***

***RSVP by February 25, 1994***

***512 / 370-8276***

***Please advise if attending Reception, Gas Supplier Meeting or both.***



**MISSOURI GAS ENERGY**

## *Supplier Meeting*

March 10 - 11, 1994

### **AGENDA**

- |                    |  |
|--------------------|--|
| 10:30 - 10:45 A.M. | Welcoming Remarks<br><i>Eugene Dubay</i><br><i>Executive Vice President, COO</i>   |
| 10:45 - 11:00 A.M. | Strategic Position<br><i>Michael T. Langston</i><br><i>Vice President, Gas Supply</i>  |
| 11:00 - 12:00 NOON | Southern Union Company Overview<br><i>Richard L. Herweck</i><br><i>Gas Supply Manager</i>  |
|                    | Southern Union Gas<br><i>Pat Anderson</i><br><i>Gas Supply Representative</i>  |
|                    | Missouri Gas Energy - Supply Requirements <ul style="list-style-type: none"><li>• Request for Proposal<ul style="list-style-type: none"><li>• Summer Storage Injection Gas</li><li>• Winter Peaking Supplies</li><li>• Capacity Release</li></ul></li></ul> <i>Richard L. Herweck</i><br><i>Donna Hadley</i><br><i>Gas Supply Representative</i> |
| 12:00 - 1:00 P.M.  | Lunch  |
| 1:00 - 2:30 P.M.   | Discussion   |
| 2:30 - 3:00 P.M.   | Staff Introduction   |
| 3:00 P.M.          | Adjournment  |

# TABLE OF CONTENTS

- I. Southern Union Company Overview
- II. Service Areas
- III. Missouri Acquisition Summary
- IV. Purchase Volumes by Pipeline
- V. Monthly Volumes by Pipeline
- VI. Contract Supply Compared to Historical Peak
- VII. Minimum and Maximum Daily Volumes
- VIII. Daily Volume Swings
- IX. Projected Volumes
- X. Request for Proposal
- XI. Contract Capacity
- Appendix
- Attendee List
- Prospectus
- Annual Report

**SOUTHERN UNION COMPANY**  
**CHECKLIST**

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**REGULATED PUBLIC UTILITY**



**COMMITTED TO PROFITABLE GROWTH**



**REINVESTS EARNINGS, NO CASH DIVIDEND**

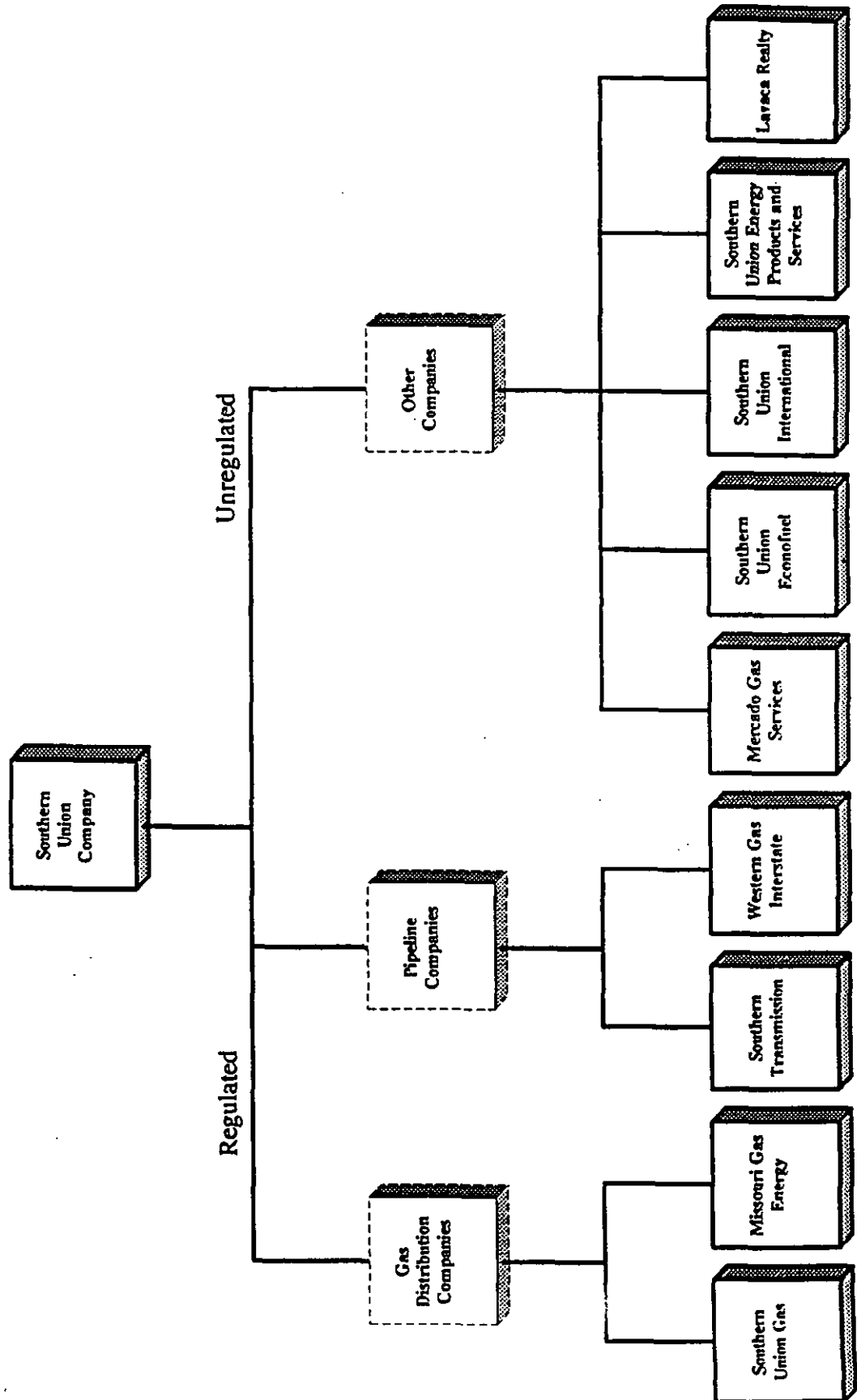


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**935,000 CUSTOMERS IN TEXAS, OKLAHOMA, AND MISSOURI**

# SOUTHERN UNION CORPORATE STRUCTURE



# **SOUTHERN UNION COMPANY PROFILE**

---

## **Regulated**

Southern Union Gas Co.

## **Product or Service**

Local Distribution Company, Texas and Oklahoma

Missouri Gas Energy

Local Distribution Company, Missouri  
(Missouri Public Service Commission)

Western Gas Interstate Co.

Natural gas transmission  
(Interstate and International)

Southern Transmission Co.

Natural gas transmission

Mercado Gas Service Co.

Gas marketing to end users and gas suppliers

## **Unregulated**

Southern Union Econofuel Co.

Markets, sells, and dispenses natural gas as a vehicular fuel

Natural Gas Technology Centers  
L.L.P. (50% Partner)

Automobile conversions to use natural gas fuel  
Emissions testing laboratory

Southern Union Energy Products  
& Service Co.

Natural gas industrial applications, equipment,  
design, consultation, sales, and service

Southern Union International Inc.

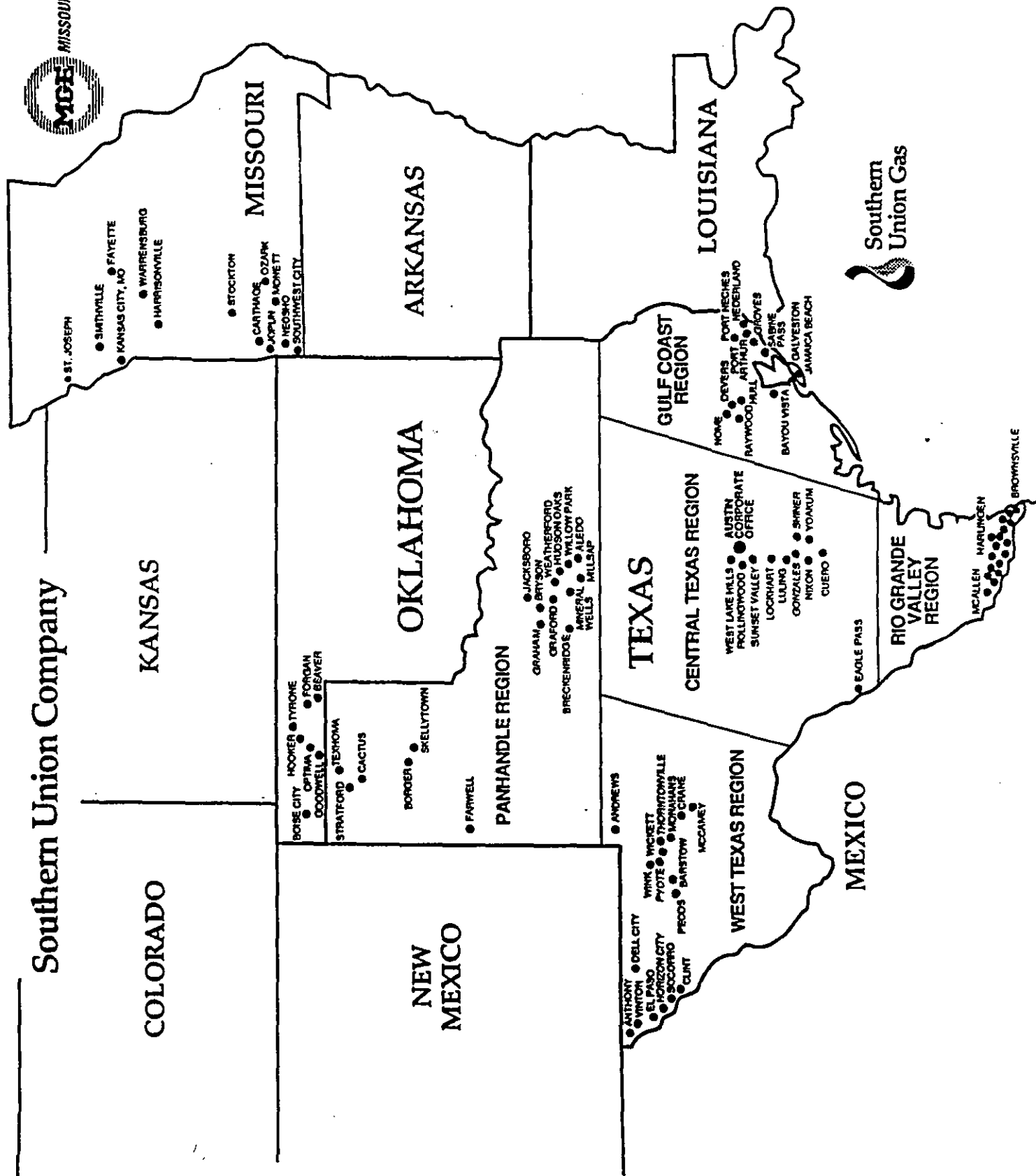
Natural gas sales and service  
outside the United States borders



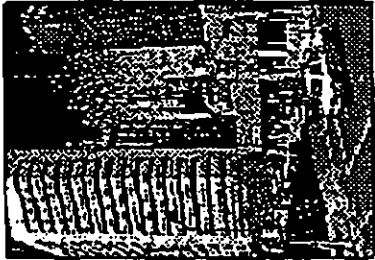
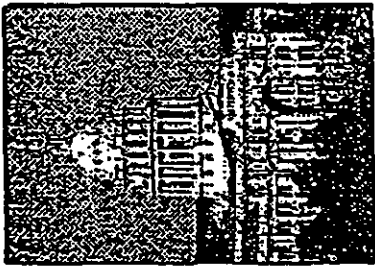
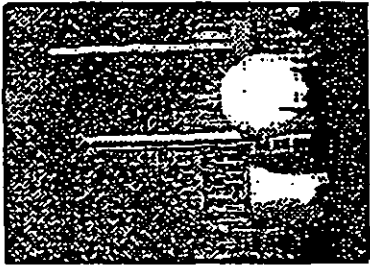
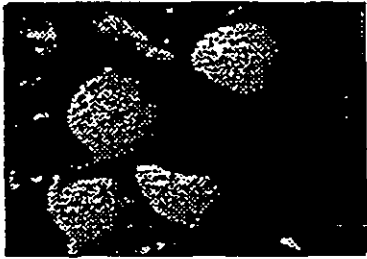



**Southern  
Union Gas**

**Schedule JBA 8**  
**Page 8 of 44**

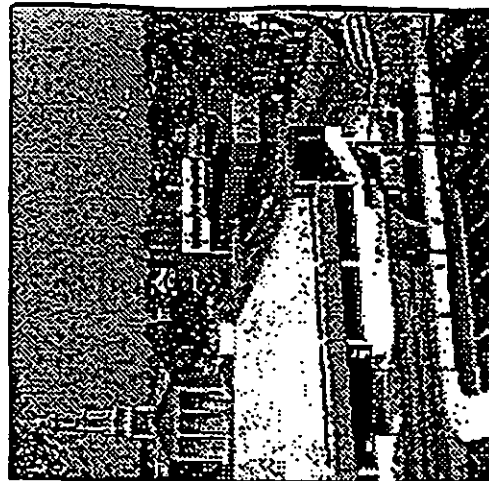
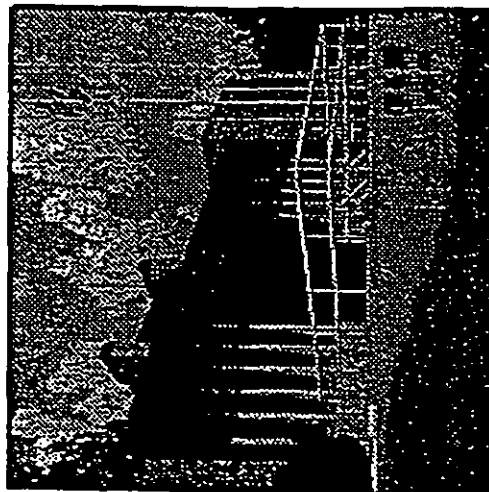
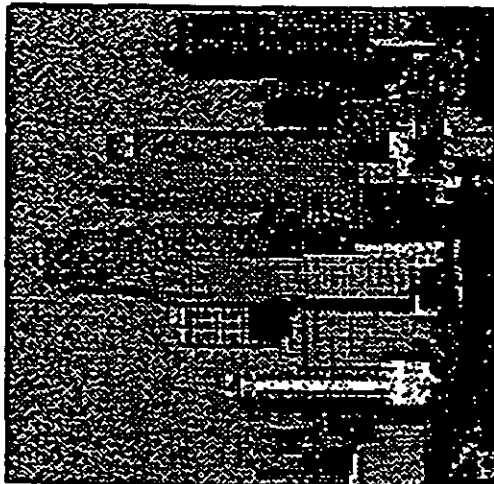


# **SOUTHERN UNION GAS COMPANY SERVICE AREAS**

					
<u>REGION</u>	WEST TEXAS	CENTRAL TEXAS	GULF COAST	RIO GRANDE VALLEY	PANHANDLE & NORTH TEXAS
<u>POPULATION</u>	620,000	533,000	322,000	254,000	77,000
<u>GAS CUSTOMERS</u>	166,000	150,000	52,250	74,250	33,000
<u>ANNUAL VOLUME</u>	17 Bcf	12 Bcf	4 Bcf	3.6 Bcf	5.3 Bcf
<u>PIPELINES</u>	EL PASO NATURAL GAS DELHI	VALERO TEXAS	HOUSTON PIPE LINE MIDCON TEXAS MITCHELL ENERGY	VALERO	EL PASO NATURAL GAS NORTHERN NATURAL WESTERN GAS INTERSTATE PANHANDLE EASTERN PIPE LINE COLORADO INTERSTATE GAS SOUTHWESTERN GAS PIPELINE

TRIDENT NGL, INC.

# MISSOURI GAS ENERGY SERVICE AREAS



## REGION

KANSAS CITY, MO. AREA

JOPLIN, MO. AREA

ST. JOSEPH, MO. AREA

## POPULATION

1,460,000

190,000

77,000

## GAS CUSTOMERS

360,000

70,000

30,000

## PIPELINES

WILLIAMS NATURAL GAS

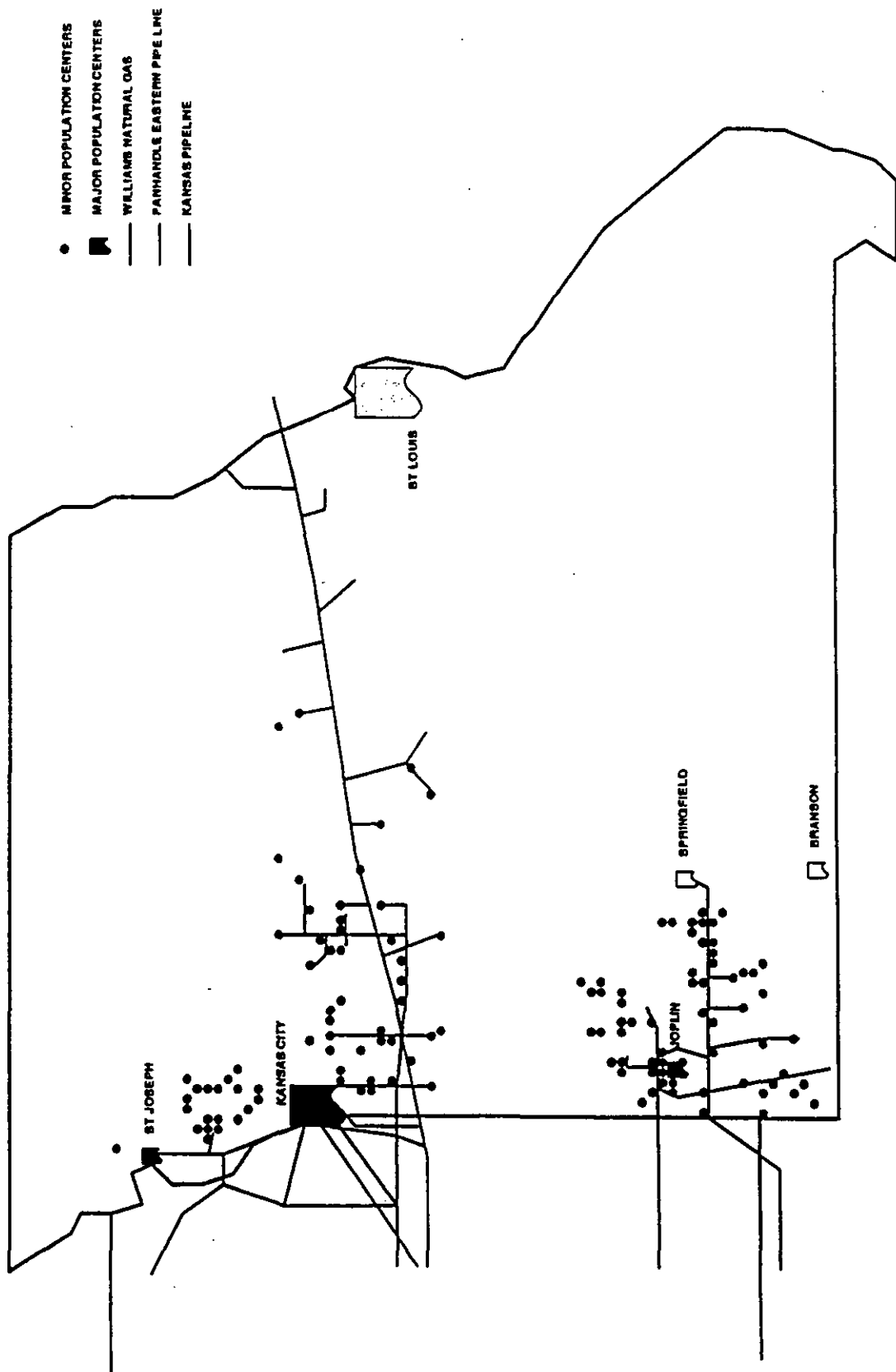
WILLIAMS NATURAL GAS

WILLIAMS NATURAL GAS

PANHANDLE EASTERN PIPE LINE COMPANY

KANSAS PIPELINE OPERATING COMPANY

# POPULATION CENTERS AND MAJOR PIPELINES (MISSOURI)



## **SOUTHERN UNION COMPANY MISSOURI ACQUISITION SUMMARY**

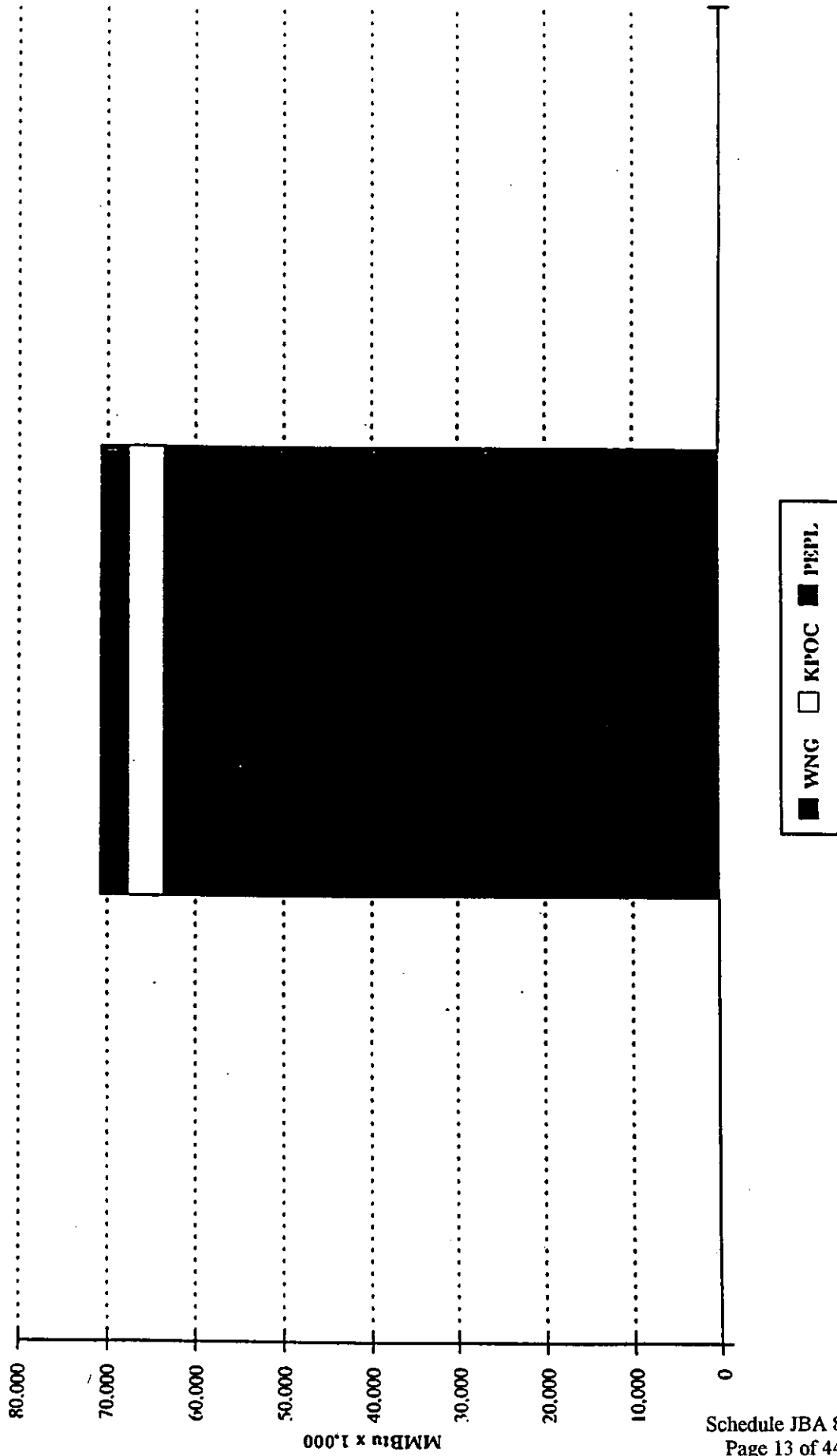
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July, 1993, Southern Union agreed to purchase Western Resources, Inc.'s Missouri natural gas operations for approximately \$360 million

December 29, 1993, Missouri Public Service commission approved the acquisition subject to certain stipulations and assignment of contracts

February 1, 1994, Southern Union began operating Missouri Gas Energy as a division with management of the new company in Kansas City, Missouri

# PURCHASE VOLUMES BY PIPELINE 1993



Schedule JBA 8  
Page 13 of 44

See Table 1

Table 1

## PURCHASE VOLUMES BY PIPELINE

Bcf

YEAR	TOTAL, WNG	TOTAL, KPOC	TOTAL, PEPL	TOTAL, MGE
1992	53.8	4.5	3.6	61.8
1993	63.7	3.9	3.2	70.8
1994	63.6	4.0	3.3	70.9 *
1995	65.2	4.0	3.4	72.6 *
1996	66.8	4.0	3.6	74.4 *

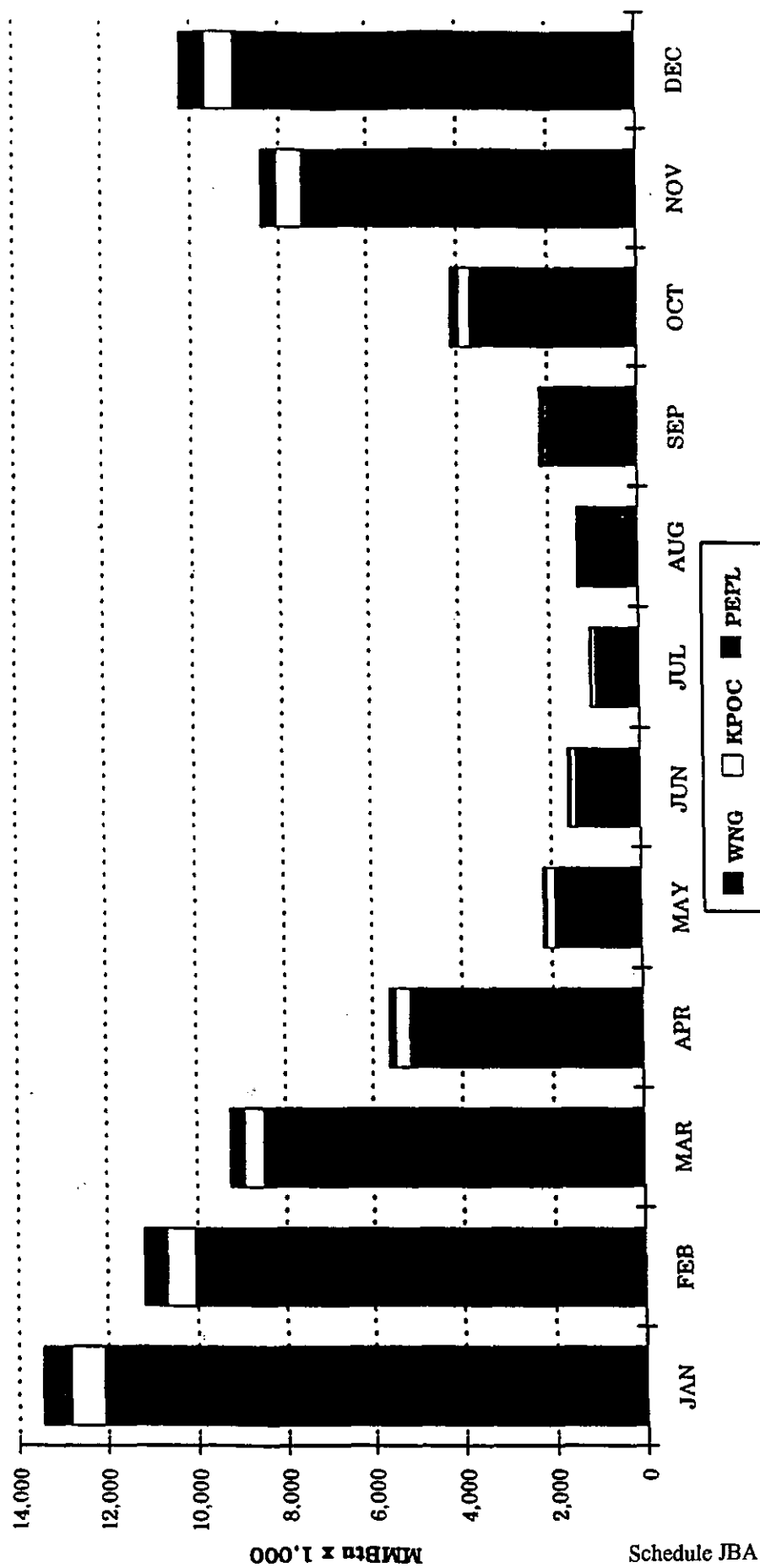
\* Projected



MISSOURI GAS ENERGY

# MONTHLY VOLUMES BY PIPELINE

1993





# HISTORICAL PEAK DAY

CONTRACT SUPPLY COMPARED TO HISTORICAL PEAK

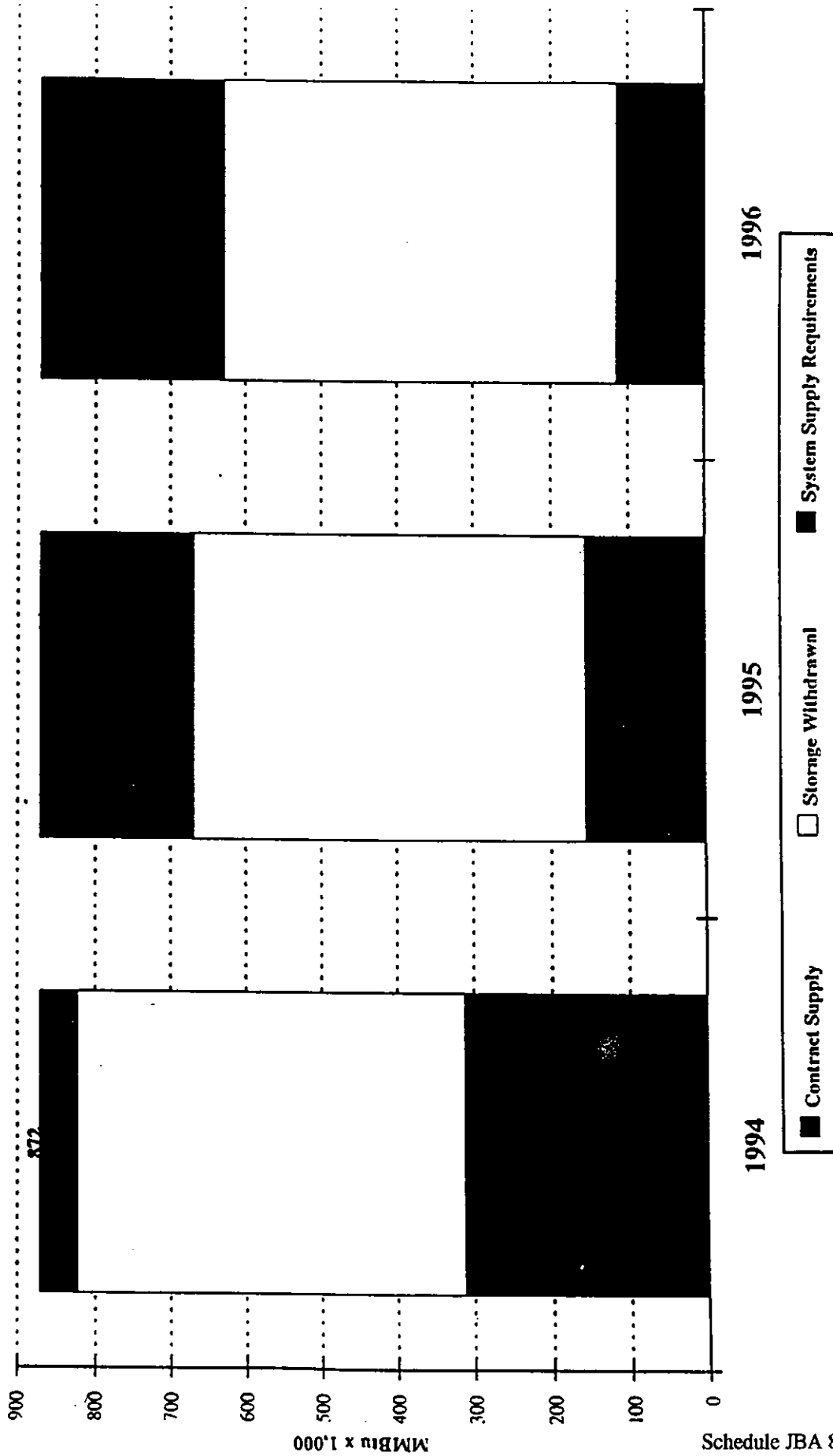


Table 3

# MINIMUM AND MAXIMUM DAILY VOLUMES

MMBtu

## KANSAS PIPELINE OPERATING COMPANY

	Jan-93	Feb-93	Mar-93	Apr-93	May-93	Jun-93	Jul-93	Aug-93	Sep-93	Oct-93	Nov-93	Dec-93
MAX	26,589	27,222	17,911	16,081	8,390	4,669	3,408	726	5,675	9,638	25,294	20,301
MIN	20,474	17,319	5,021	4,021	3,996	1,791	1,569	146	762	4,090	12,668	14,590
AVG	23,966	21,457	13,571	10,515	6,096	3,473	3,027	484	2,285	7,793	18,537	19,829

## WILLIAMS NATURAL GAS

	Jan-93	Feb-93	Mar-93	Apr-93	May-93	Jun-93	Jul-93	Aug-93	Sep-93	Oct-93	Nov-93	Dec-93
MAX	710,747	477,517	519,381	394,377	198,260	115,584	99,679	109,024	145,403	287,854	457,841	686,133
MIN	251,631	185,244	99,832	97,701	20,600	16,078	10,419	13,951	22,424	85,388	170,184	100,313
AVG	389,202	346,433	274,037	171,402	61,800	48,234	31,258	41,854	67,271	119,484	249,332	291,230

## PANHANDLE EASTERN PIPE LINE

	Jan-93	Feb-93	Mar-93	Apr-93	May-93	Jun-93	Jul-93	Aug-93	Sep-93	Oct-93	Nov-93	Dec-93
MAX	26,159	22,856	18,356	13,365	13,062	10,639	5,918	5,772	10,245	13,380	18,818	25,195
MIN	21,243	15,730	9,962	5,158	2,365	2,120	1,016	1,434	2,981	3,960	11,089	17,335
AVG	21,385	17,916	11,655	5,952	2,893	2,415	1,284	1,840	3,403	6,785	12,974	19,227

Source: IBA 8  
Page 18 of 44

Total Throughput minimum and maximum less estimated Third Party Transportation



MISSOURI GAS ENERGY

Table 2

# HISTORICAL PEAK DAY

## CONTRACT SUPPLY COMPARED TO HISTORICAL PEAK

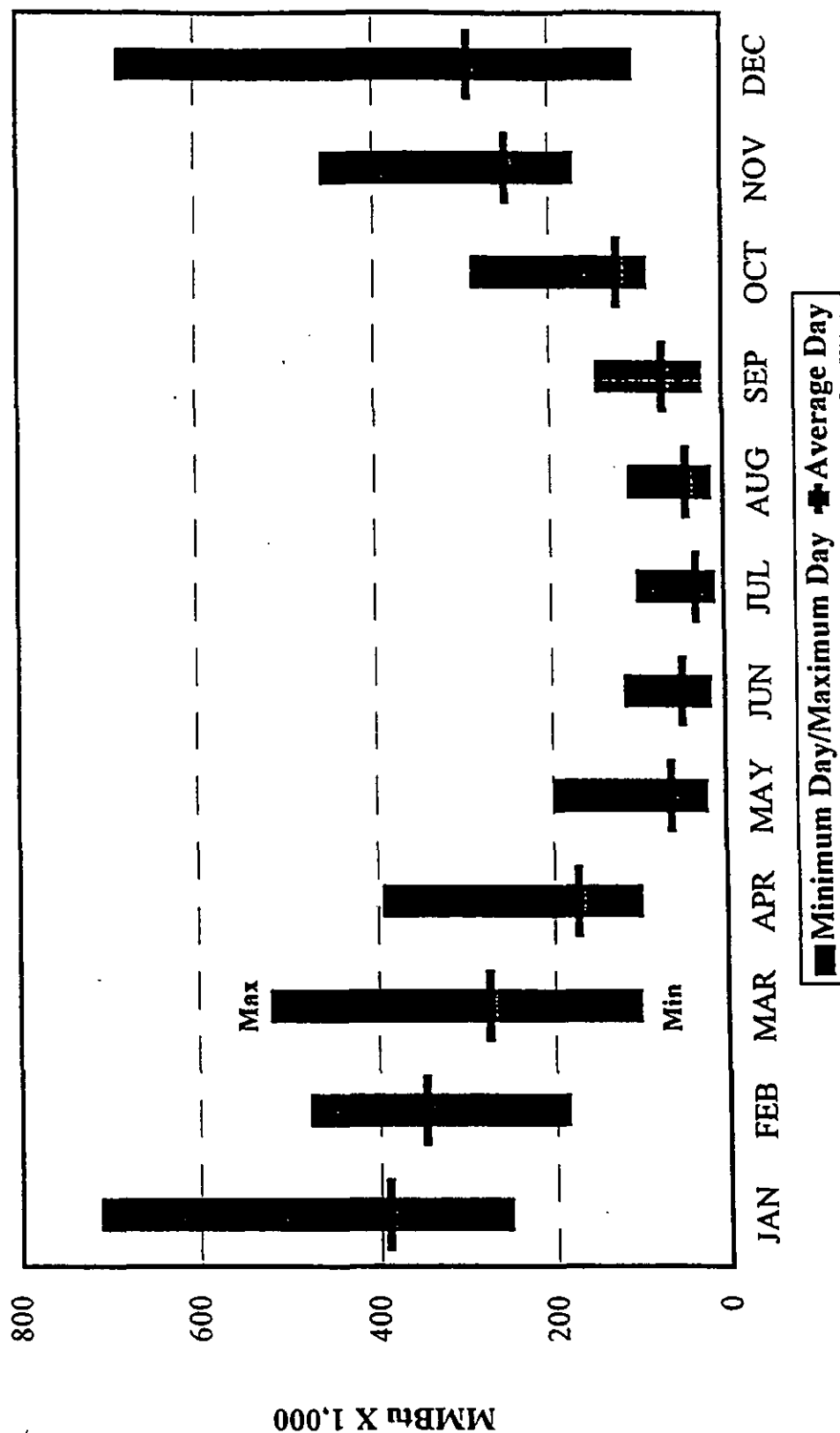
MMBtu x 1,000

	1994	1995	1996
Historical Peak Day	872	872	872
Contract Supply	311	156	115
Storage Withdrawal	512	512	512
Supply Requirements	49	204	245



MISSOURI GAS ENERGY

# MINIMUM AND MAXIMUM DAILY VOLUMES WILLIAMS NATURAL GAS COMPANY 1993



# DAILY VOLUME SWINGS

APRIL 1993

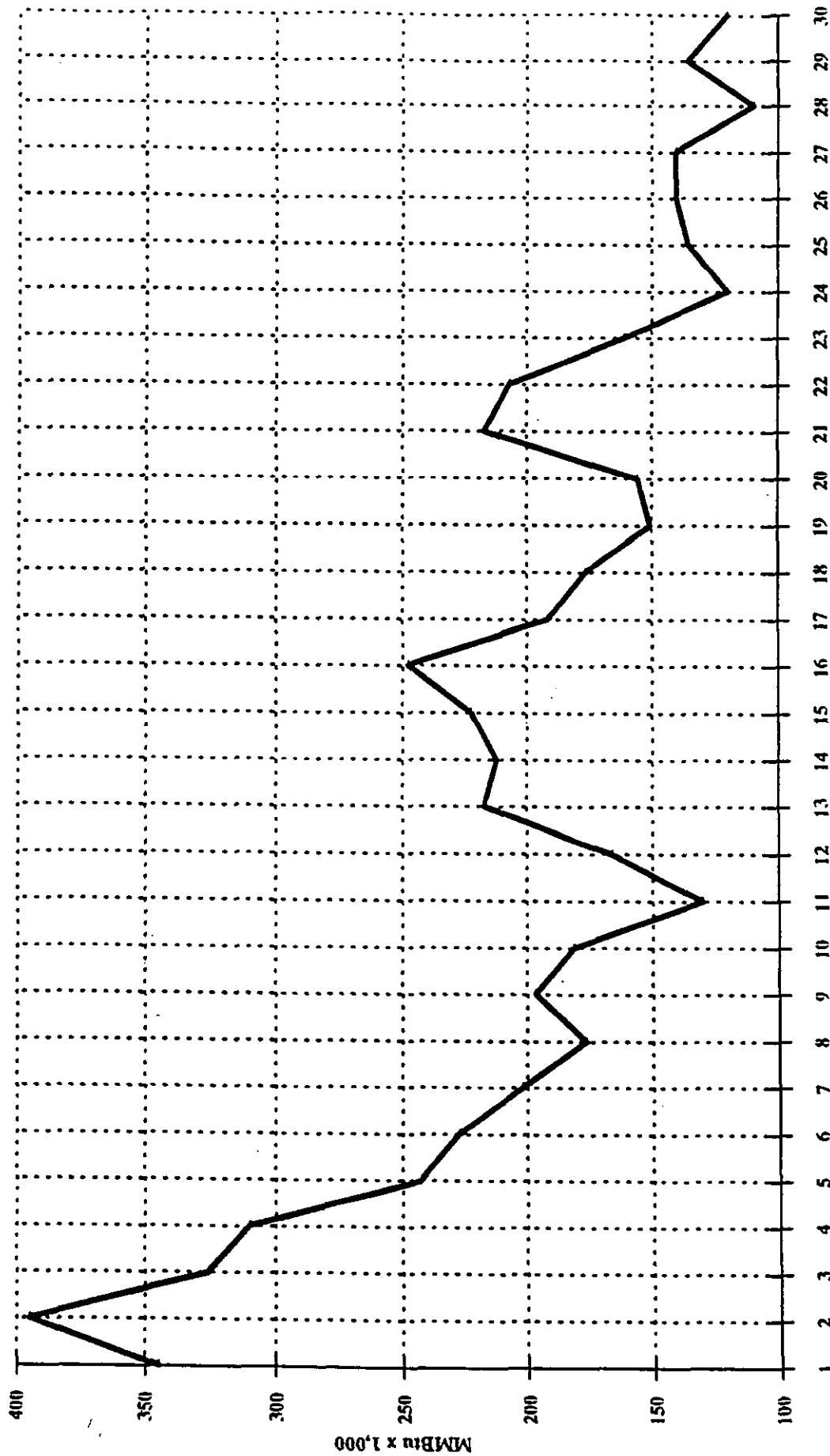


Table 4

## PROJECTED VOLUMES

1994

MMBtu x 1,000

	Jan-94	Feb-94	Mar-94	Apr-94	May-94	Jun-94
Customer Demand	13,745	10,503	8,114	5,158	2,919	1,686
Storage Injection	0	0	0	932	3,805	3,488
System Supply Requirement	13,745	10,503	8,114	6,090	6,724	5,174
Monthly Contract Quantity	9,641	8,708	9,331	4,230	3,379	3,270
Storage Withdrawal	4,252	3,749	2,130	0	0	0
Available Supply	13,893	12,457	11,461	4,230	3,379	3,270
System Supply Requirement	13,745	10,503	8,114	6,090	6,724	5,174
Available Supply	13,893	12,457	11,461	5,340	4,681	4,530
New Contract Requirement	na	na	na	1,860	3,345	1,904
Peak Day	625	573	467	364	397	193

	Jul-94	Aug-94	Sep-94	Oct-94	Nov-94	Dec-94
Customer Demand	1,842	1,684	2,130	3,791	7,148	12,230
Storage Injection	3,362	2,270	1,298	1,281	0	0
System Supply Requirement	5,204	3,954	3,428	5,072	7,148	12,230
Monthly Contract Quantity	3,348	3,379	3,270	3,441	4,680	4,836
Storage Withdrawal	0	0	0	0	2,452	3,853
Available Supply	3,348	3,379	3,270	3,441	7,132	8,689
System Supply Requirement	5,204	3,954	3,428	5,072	7,148	12,230
Available Supply	4,681	4,681	4,530	4,681	7,132	8,689
New Contract Requirement	1,856	575	158	1,631	16	3,541
Peak Day	59	55	92	188	323	543



Table 5

## PROJECTED VOLUMES

1995

MMBtu x 1,000

	Jan-95	Feb-95	Mar-95	Apr-95	May-95	Jun-95
Customer Demand	13,248	10,928	8,267	5,472	2,996	1,916
Storage Injection	0	0	0	1,028	3,734	3,486
System Supply Requirement	13,248	10,928	8,267	6,500	6,730	5,402
Monthly Contract Quantity	4,836	4,368	4,836	2,730	1,643	1,560
Storage Withdrawal	4,234	3,783	2,115	0	0	0
Available Supply	9,070	8,151	6,951	2,730	1,643	1,560
System Supply Requirement	13,248	10,928	8,267	6,500	6,730	5,402
Available Supply	9,070	8,151	6,951	2,730	1,643	1,560
New Contract Requirement	4,178	2,777	1,316	3,770	5,087	3,842
Peak Day	644	559	475	377	404	202

	Jul-95	Aug-95	Sep-95	Oct-95	Nov-95	Dec-95
Customer Demand	1781	1743	2153	3729	7899	12555
Storage Injection	3360	2257	1290	1281	0	0
System Supply Requirement	5,141	4,000	3,443	5,010	7,899	12,555
Monthly Contract Quantity	1612	1612	1320	1457	3450	3565
Storage Withdrawal	0	0	0	0	2452	3853
Available Supply	1,612	1,612	1,320	1,457	5,902	7,418
System Supply Requirement	5,141	4,000	3,443	5,010	7,899	12,555
Available Supply	1,612	1,612	1,320	1,457	5,902	7,418
New Contract Requirement	3,529	2,388	2,123	3,553	1,997	5,137
Peak Day	58	56	93	187	350	555



Table 6

## PROJECTED VOLUMES

1994 - 1998

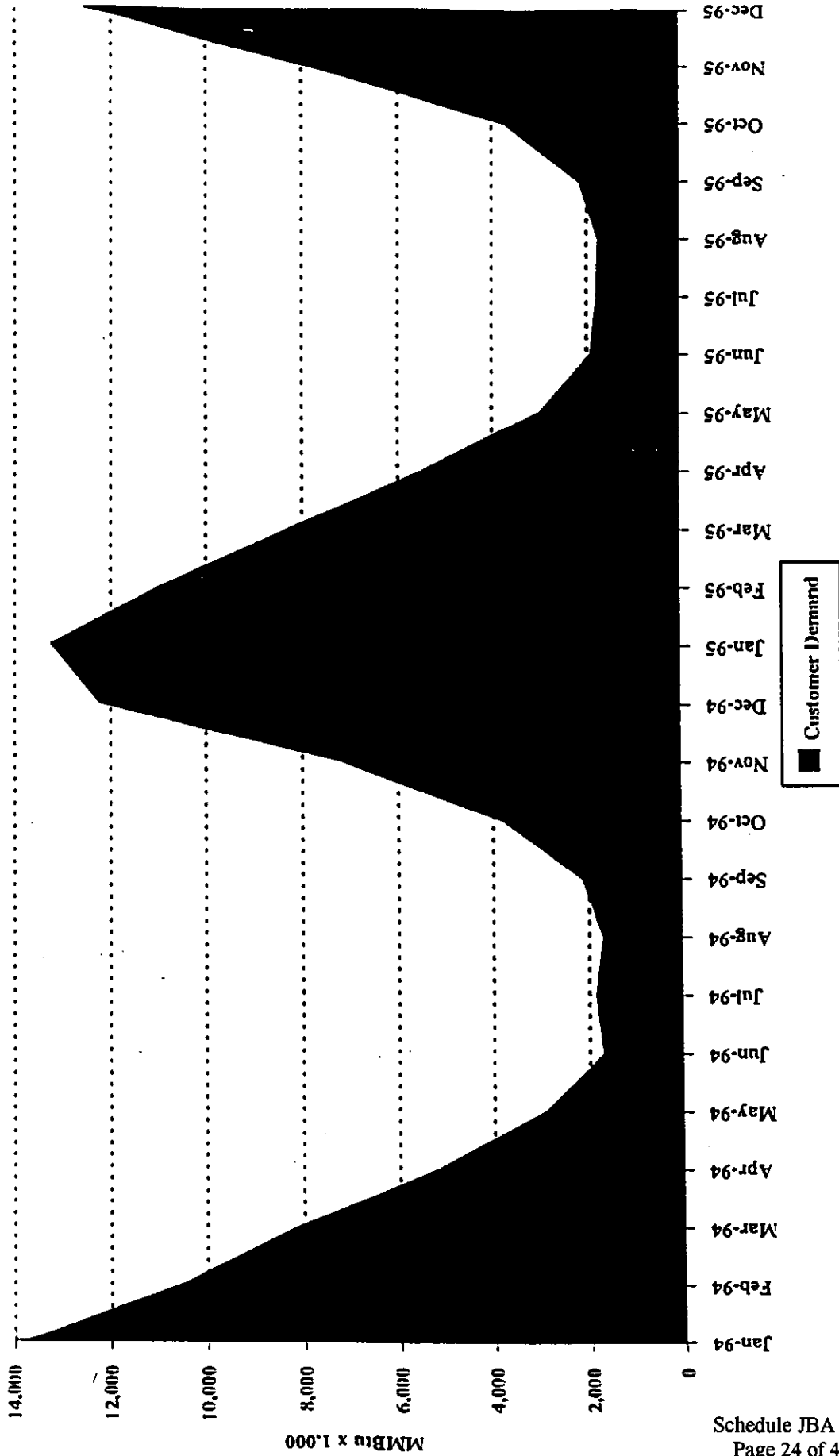
MMBtu x 1,000

	1994	1995	1996	1997	1998
Customer Demand	70,950	72,687	74,869	77,104	79,394
Storage Injection	16,436	16,436	16,436	16,436	16,436
System Supply Requirement	87,386	89,123	91,305	93,540	95,830
Monthly Contract Quantity	61,513	32,989	27,200	27,085	25,438
Storage Withdrawal	16,436	16,437	16,437	16,437	16,437
Available Supply	77,949	49,426	43,637	43,522	41,875
System Supply Requirement	87,386	89,123	91,305	93,540	95,830
Available Supply	77,949	49,426	43,637	43,522	41,875
New Contract Requirement	14,886	39,697	47,668	50,018	53,955



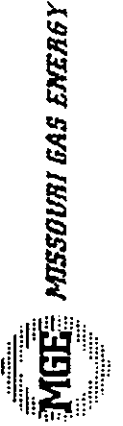


# PROJECTED CUSTOMER DEMAND 1994 - 1995

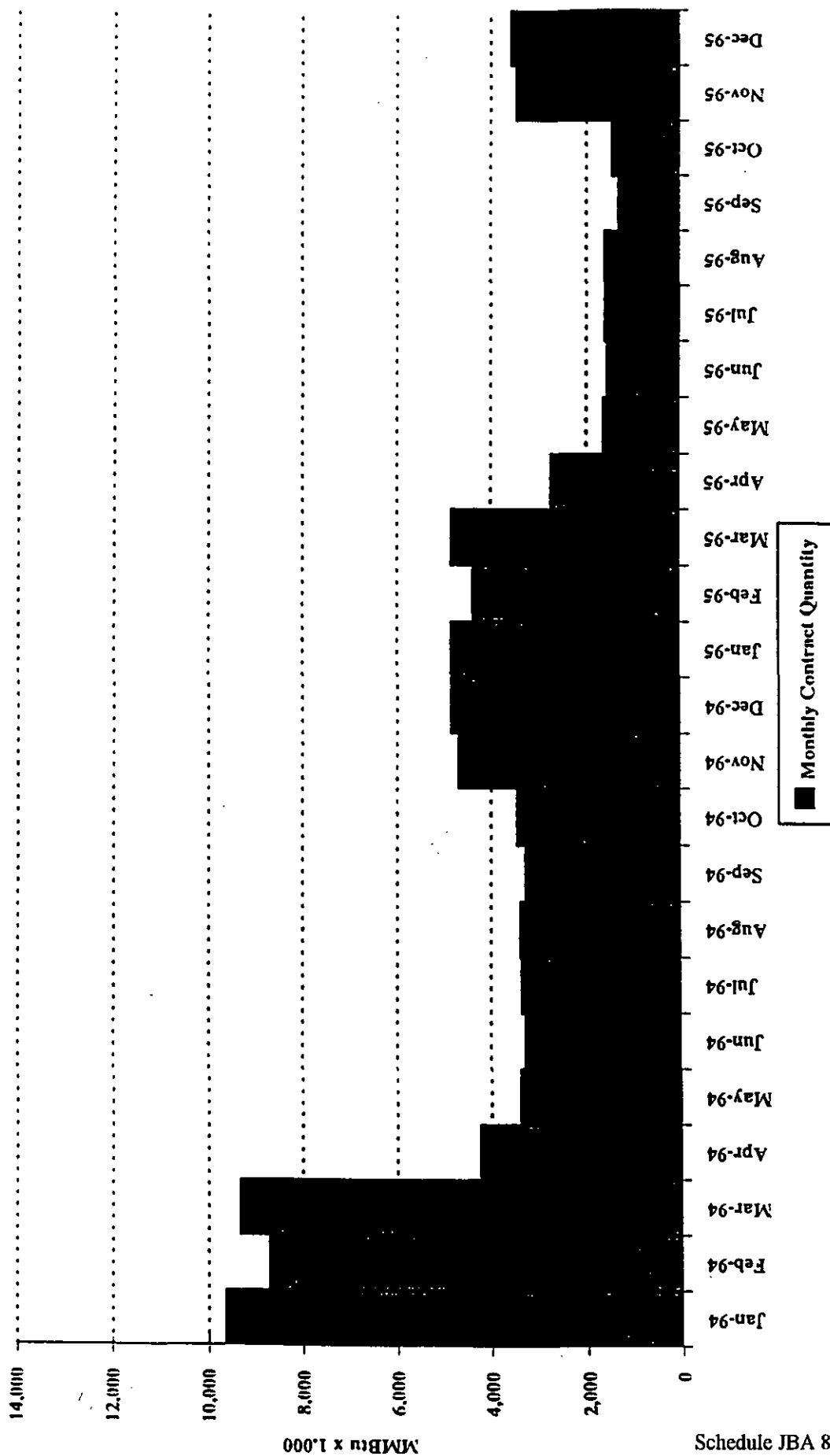


Schedule JBA 8  
Page 24 of 44

See Table 4 and 5



# PROJECTED CONTRACT SUPPLY 1994 - 1995



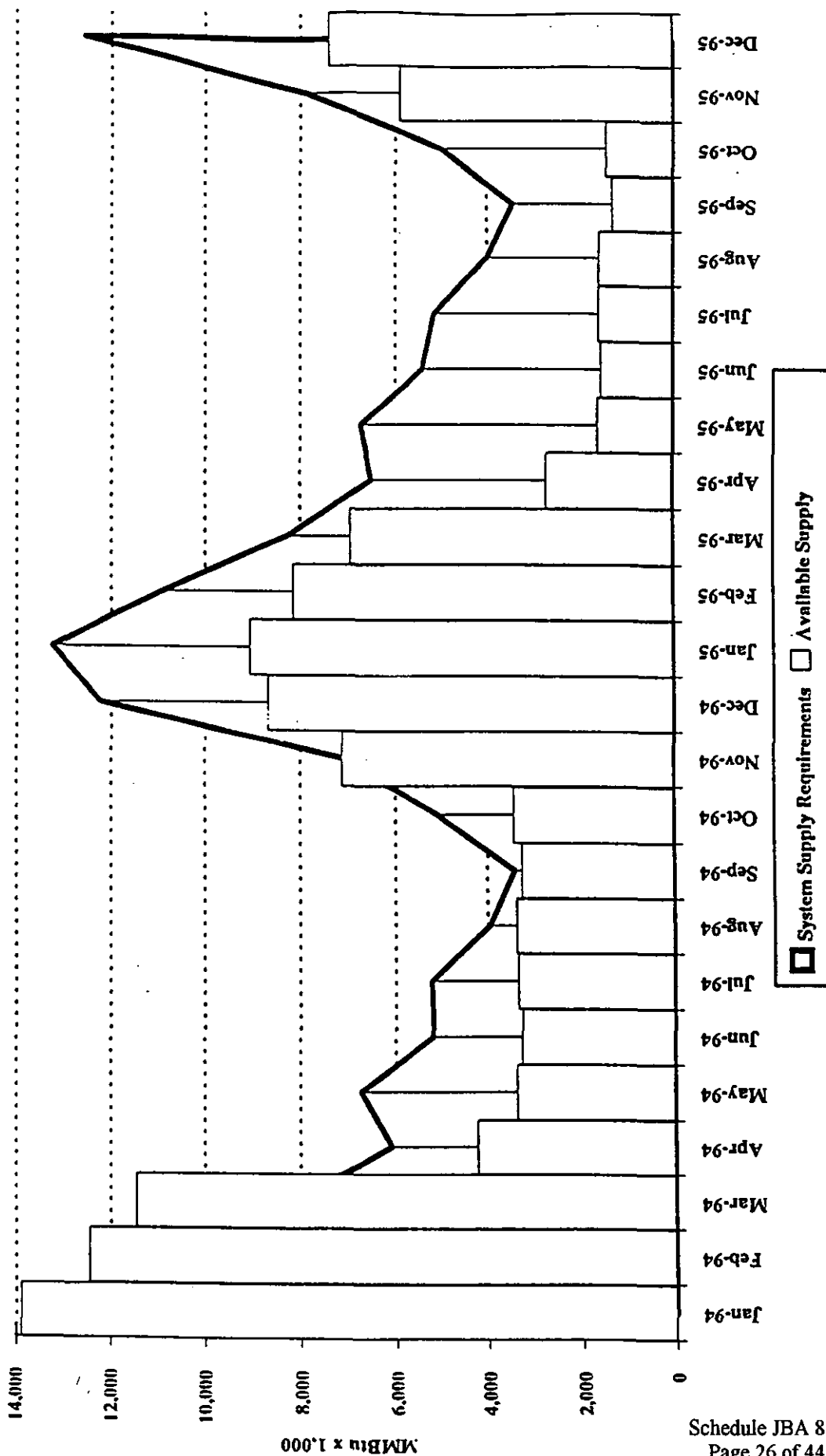
Schedule JBA 8  
Page 25 of 44

See Table 4 and 5



MISSOURI GAS ENERGY

# PROJECTED VOLUMES 1994 - 1995



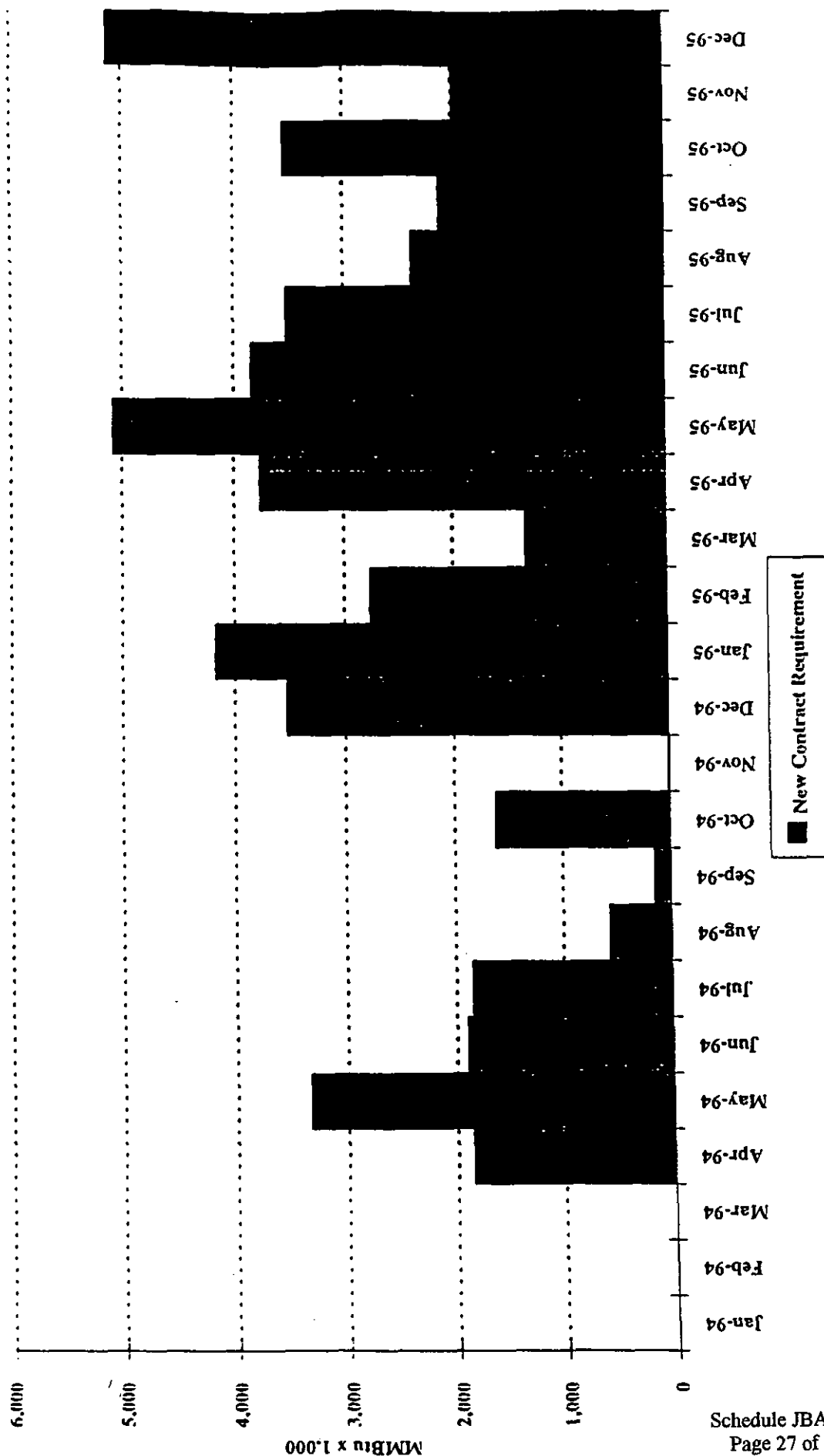
Schedule JBA 8  
Page 26 of 44

See Table 4 and 5



MISSOURI GAS ENERGY

# NEW CONTRACT REQUIREMENT 1994 - 1995



Schedule JBA 8  
Page 27 of 44

See Table 4 and 5



MISSOURI GAS ENERGY

# REQUEST FOR PROPOSAL

## Package #1

## Package #2

1. Term	April 1, 1994 - September 30, 1994	November 1, 1994 - December 31, 1998
2. Price	Fixed or Indexed	Indexed
3. Delivery Obligation	Firm / Variable	Firm / Variable
4. Firm Contract Quantity	6,735 MMBtu / Season	24,800 MMBtu / Year
5. Variable / Spot Quantity	2,963 MMBtu / Season	8,207 MMBtu / Year
6. Points of Delivery	Master Receipt Points on Williams or Panhandle for both Packages	
7. Alternate Proposals	The balance of New Contract Requirement will be purchased either as Variable volumes under new contracts or on the spot market	

# MISSOURI GAS ENERGY

## SUPPLY PACKAGE #1 STORAGE FILL PURCHASE PROJECTED VOLUMES MMBtu x 1,000

<u>Month/ Year</u>	<u>Contract Requirement</u>	<u>Contract Quantity</u>	<u>Variable Spot</u>
Jan-94			
Feb-94			
Mar-94			
Apr-94	1,860	900	960
May-94	3,345	2,325	1,020
Jun-94	1,904	1,500	404
Jul-94	1,856	1,550	306
Aug-94	575	310	265
Sep-94	158	150	8
Oct-94			
Nov-94			
Dec-94			

# MISSOURI GAS ENERGY

## SUPPLY PACKAGE #2 TERM SUPPLY CONTRACT PROJECTED VOLUMES MMBtu x 1,000

<u>Month/ Year</u>	<u>Contract Requirement</u>	<u>Contract Quantity</u>	<u>Variable Spot</u>
Dec-94	3,541	2,945	596
Jan-95	4,178	3,100	1,078
Feb-95	2,777	2,660	117
Mar-95	1,316	930	386
Apr-95	3,770	3,000	770
May-95	5,087	4,185	902
Jun-95	3,842	3,000	842
Jul-95	3,529	2,635	894
Aug-95	2,388	2,015	373
Sep-95	2,123	1,650	473
Oct-95	3,553	2,015	1,538
Nov-95	1,997	1,650	347
Dec-95	5,137	4,650	487
1996	47,669		
1997	50,019		
1998	53,956		

# CONTRACT CAPACITY COMPARED TO HISTORICAL PEAK

MMBtu x 1,000

## Kansas Pipeline Operating Company

Flowing Capacity  
Storage Withdrawal  
Total

46,332  
0  
46,332

## Panhandle Eastern Pipe Line

Flowing Capacity  
Storage Withdrawal  
Total

17,881  
12,717  
30,717 30 598

## Williams Natural Gas

Flowing Capacity  
Storage Withdrawal  
Total

298,815  
499,750  
798,565

## TOTAL CAPACITY

875,495

## HISTORICAL PEAK DAY

872,000



MISSOURI GAS ENERGY



## **CAPACITY RELEASE AGREEMENT**

- Competitive Market Rates
- Recallable during Peak Day or Injection Cycle
- Capacity will be posted on Electronic Bulletin Board for bids
- Pre-Arranged Releases will be considered
- Contract in place prior to releasing Capacity

Table A

# 1993 CUSTOMERS and SALES VOLUMES (MMcf)

RESIDENTIAL	400,544	41,856
COMMERCIAL	57,828	21,115
INDUSTRIAL	251	1,202
TRANSPORTATION	239	26,381
TOTAL	458,862	90,554



MISSOURI GAS ENERGY

Table B

# 1994 PROJECTED PURCHASE VOLUMES BY PIPELINE

WILLIAMS  
NATURAL  
GAS

PANHANDLE  
EASTERN  
PIPE LINE

KANSAS PIPELINE  
OPERATING  
COMPANY

## PURCHASE FOR RESALE

VOLUME  
PERCENT

63.6 Bcf  
89.7%

3.3 Bcf  
4.6%

4.0 Bcf  
5.7%

## CUSTOMER TRANSPORTATION

VOLUME  
PERCENT

26 Bcf  
83.0%

0  
0

4.0 Bcf  
17%

## TOTAL

VOLUME  
PERCENT

89.6 Bcf  
87.0%

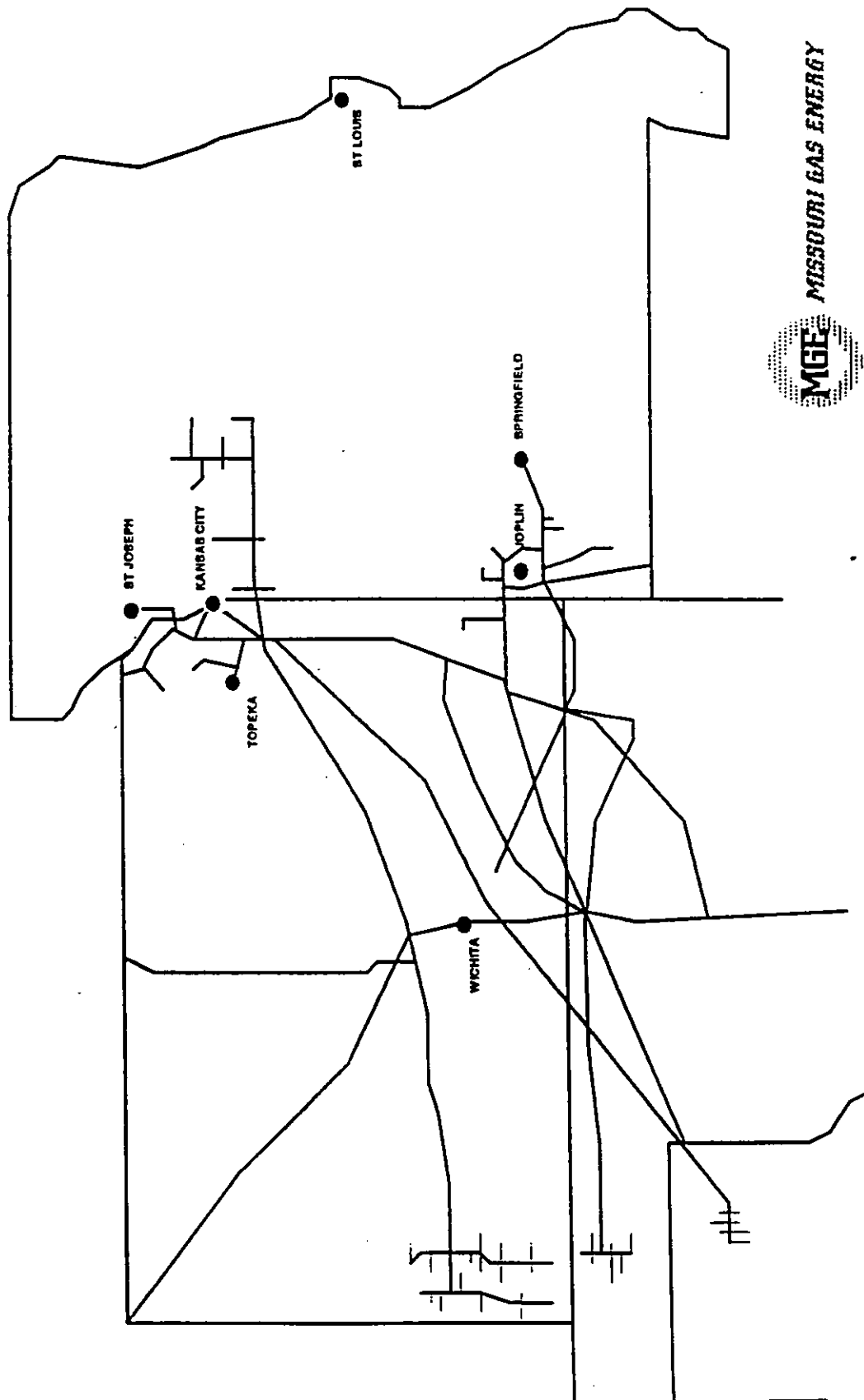
3.3 Bcf  
3.0%

9.7 Bcf  
10.0%



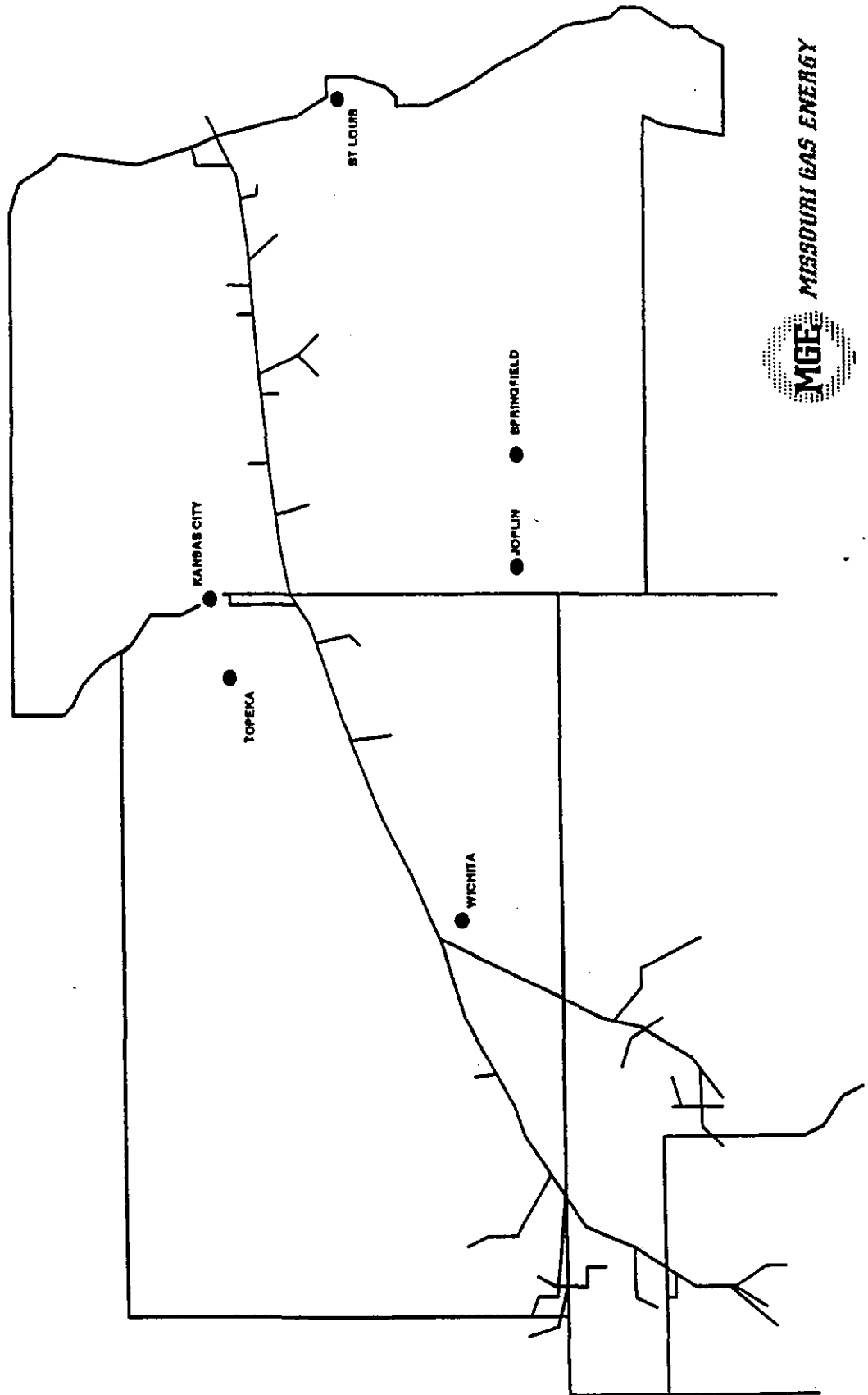
MISSOURI GAS ENERGY

WILLIAMS NATURAL GAS COMPANY  
INTERSTATE SYSTEM

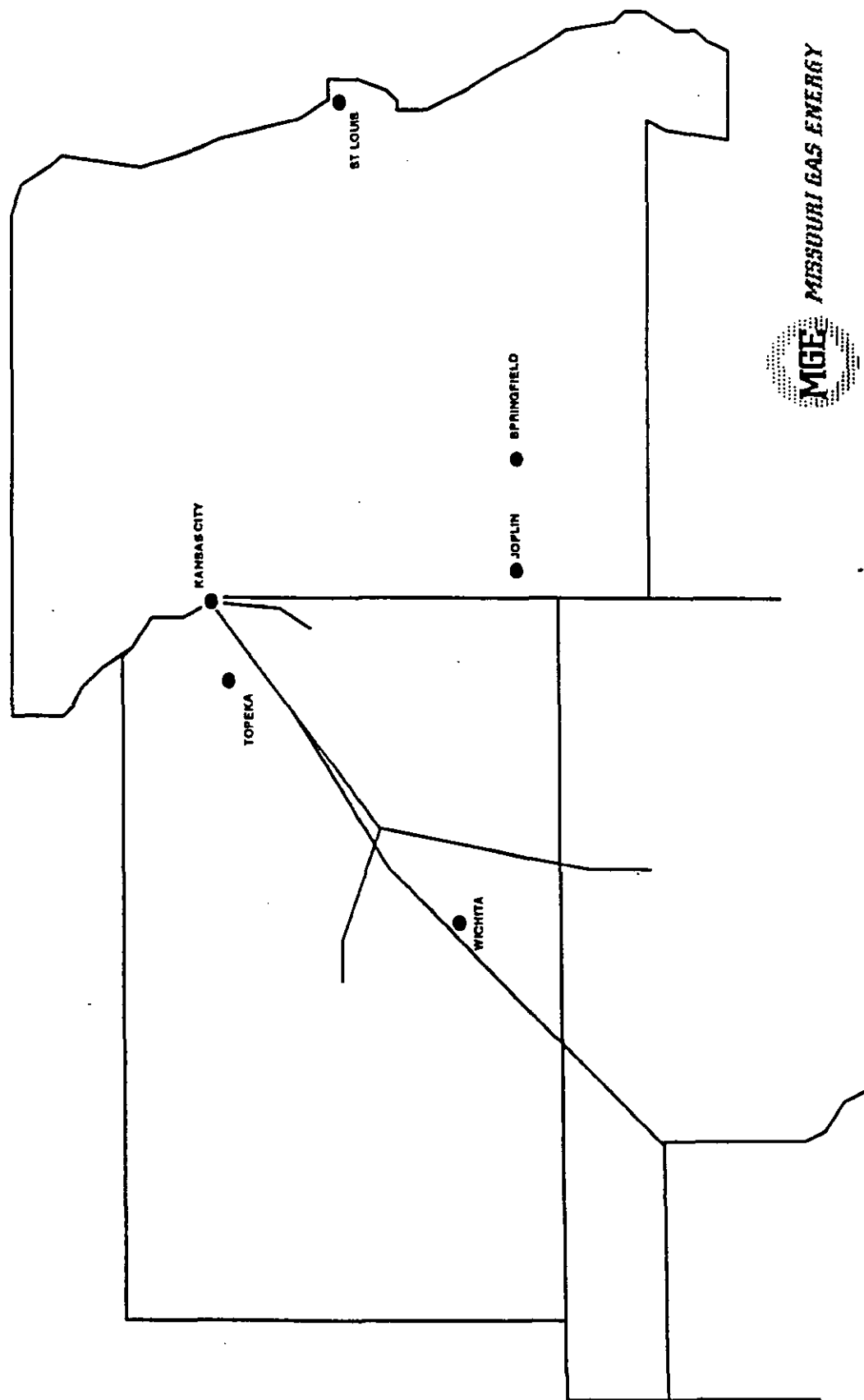


MISSOURI GAS ENERGY

PANHANDLE EASTERN PIPE LINE COMPANY  
INTERSTATE SYSTEM



KANSAS PIPELINE OPERATING COMPANY  
INTRASTATE SYSTEM





## **GAS SUPPLY / GAS MEASUREMENT CONTACTS**

### **PERSONNEL LIST**

Mike Langston	V.P. Gas Supply	(512) 370-8277
Janet Jeanes	Administrative Assistant	(512) 370-8276
Richard Herweck	Manager, Gas Supply	(512) 370-8278
Pat Anderson	Gas Supply Representative	(512) 370-8280
Donna Hadley	Gas Supply Representative	(512) 370-8661
Pam Leigh	Contract Administrator	(512) 370-8279
David Twichell	Gas Dispatch Supervisor	(512) 370-8281
Jon Steffens	Gas Supply Analyst (Dispatching)	(512) 370-8283
Verlenne Monroe	Gas Supply Analyst (Forecasting)	(512) 370-8282
Rick Tompkins	Manager, Gas Measurement	(512) 370-8270
Wally Nix	Senior Measurement Specialist	(512) 370-8272
Val Henry	Telemetry Coordinator	(512) 370-8273
Naomi Perales	Secretary/Measurement Analyst	(512) 370-8271
Gas Supply Facsimile Number		(512) 476-4966
Gas Measurement Facsimile Number		(512) 370-8259
24 Hour Emergency Dispatch Number		(512) 476-5035

## **AREAS OF RESPONSIBILITY**

### **GAS SUPPLY**

Regulatory Issues: Richard Herweck

Supply Issues: Donna Hadley; Pat Anderson

Contract Negotiations: Richard Herweck

Contract Administration: Pam Leigh

Contract Balances: Pam Leigh

Contract Compliance: Pam Leigh

GAS CONTROL/GAS DISPATCH: 24 Hour Emergency Line - (512) 476-5035

Pipeline Nominations: Jon Steffens

Pipeline Balancing: Jon Steffens

Volume Control: Jon Steffens

Volume Reporting: Jon Steffens

Curtailment Issues: David Twichell

FORECASTING/INTEGRATED RESOURCE PLANNING

Supply Forecasting: Verienne Monroe

Demand Forecasting: Verienne Monroe

Peak Day Forecasting: Verienne Monroe





**MISSOURI GAS ENERGY**

## *Supplier Meeting*

March 10 - 11, 1994

### **ATTENDEES**

*Paul A. Andrae*  
**PG&E Resources Company**  
6688 N. Central Expy., Suite 1000  
Dallas, Texas 75206

*Lee Bennett*  
**MidCon Gas Services Corp.**  
701 East 22nd Street  
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*John Fogg*  
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Houston, Texas 77210-4758

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**VASTAR**  
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Dallas, Texas 75201-3499

*Griff Jones*  
**Natural Gas Clearinghouse**  
One West Third Street #700  
Tulsa, Oklahoma 74103

*Larry Jordan*  
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First Interstate Tower  
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Houston, Texas 77056

*Keith Kelly*  
**Vesta Energy Company**  
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100 West Fifth Street  
Tulsa, Oklahoma 74103

*E.P. (Tripp) Kerr, III*  
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First Interstate Tower  
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Houston, Texas 77019

*Jim Kuhn*  
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Tulsa, Oklahoma 74101

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**KN Energy**  
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*Randy Randolph*  
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*Dave Ritter*  
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Houston, Texas 77060

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*Dick Saunders*  
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*Robert R. Seten*  
**Tri-Power Fuels**  
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*William E. Shanahan*  
**GEDI Incorporated**  
**Rangeline Corporation**  
7666 East 61st Street, Suite 370  
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*Chris Skoog*  
**Arkla Energy Marketing**  
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Houston, Texas 77251-2628

*Christopher P. Snedden*  
**Rangeline Corporation**  
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*Jim Stilling*  
**MidCon Gas Services Corp.**  
701 East 22nd Street  
Lombard, Illinois 60148-5072

*Damir Vrce*  
**Oxy USA Inc.**  
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Tulsa, OK 74119-1036

*Larry A. Wall, Jr.*  
**Mobil Natural Gas Inc.**  
12450 Greenspoint Drive  
Houston, Texas 77060-1991

*Tom Warmath*  
**Richardson Products Company**  
1100 Milam Street, Suite 3030  
Houston, Texas 77002

*Mike Wicker*  
**GPM Gas Corporation**  
First Interstate Tower  
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Houston, Texas 77056

*Hershel Wolfe*  
**Mesa Limited Partnership**  
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Irving, Texas 75039-3746

## MISSOURI PUBLIC SERVICE COMMISSION

*Craig A. Jones*  
**Missouri Public Service Commission**  
Truman State Office Building  
301 West High Street  
Jefferson City, MO 65102

*Carmen Morrissey*  
**Missouri Public Service Commission**  
H.S. Truman State Office Building  
301 West High Street  
Jefferson City, MO 65102

*Kenneth J. Rademan*  
**Missouri Public Service Commission**  
Truman State Office Building, Suite 840  
301 West High Street  
Jefferson City, MO 65102

*Jim Rudolph*  
**Missouri Public Service Commission**  
H.S. Truman State Office Building  
301 West High Street  
Jefferson City, MO 65102

*Tom Shaw*  
**Missouri Public Service Commission**  
Truman State Office Building  
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Jefferson City, MO 65102

*Dave Sommerer*  
**Missouri Public Service Commission**  
Truman State Office Building  
301 West High Street  
Jefferson City, MO 65102

*Mike Wallace*  
**Missouri Public Service Commission**  
Truman State Office Building  
301 West High Street  
Jefferson City, MO 65102



**MGE**

MISSOURI GAS ENERGY

**SUPPLIER MEETING**

**August 1997**

# TABLE OF CONTENTS

## FIGURE

## PAGE

1. Southern Union Company .....	1
2. Southern Union Corporate Structure .....	2
3. Southern Union Company Profile .....	3
4. Gas Supply Department .....	4
5. Gas Supply Contacts .....	5
6. Natural Gas Pipeline Systems .....	6
7. Southern Union Company Service Areas .....	7
8. Southern Union Company Service Areas - Detail .....	8
9. Southern Union Gas Company Service Areas .....	9
10. Southern Union Gas Company Service Areas .....	10
11. Missouri Gas Energy Service Areas .....	11
12. MGE Customers And Sales Volumes, Fiscal 1996 .....	12
13. Williams Natural Gas, Interstate System .....	14
14. Riverside Pipeline Company, Interstate System .....	15
15. Panhandle Eastern Pipe Line Company, Interstate System .....	16
16. Pony Express Pipeline, Interstate System .....	17
17. Geographic Diversity of Supply .....	18
18. Monthly Purchase Volumes By Pipeline, 12 Months Ending 3/31/97 .....	20
19. Monthly Purchase Volumes By Pipeline, 12 Months Ending 3/31/97 - Graph .....	21

# CONTENTS

## FIGURE

## PAGE

20. Purchase Volumes By Pipeline, 12 Months Ending 3/31/97 - Graph.....	22
21. Purchase Volumes By Pipeline, 1996 - 1998 .....	23
22. Purchase Volumes By Pipeline, Projected 1998 Fiscal Year .....	24
23. Supply Compared To Projected Historic Peak Day .....	25
24. Supply Compared To Projected Historic Peak Day - Graph.....	26
25. Minimum and Maximum Daily Volumes, 12 Months Ending 3/31/97 .....	27
26. Daily Volume Swings, April.....	28
27. Projected Supply Requirements, Design Day By Month .....	29
28. Projected Supply Requirements, Average Monthly Demand .....	30
29. Customer Demand - Graph.....	31
30. System Demand - Graph .....	32
31. Monthly Contract Quantity - Graph.....	33
32. Available Supply - Graph .....	34
33. Projected Supply Requirements - Graph.....	35
34. Projected Supply And Demand - Graph.....	36
35. Contract Supply Requirement.....	37
36. Request For Proposal.....	38
37. Daily Transportation Capacity Compared to Historic Peak Day .....	39
38. Capacity Release Agreement.....	40
Notes .....	41



Figure 1

# SOUTHERN UNION COMPANY

- ⌘ Regulated Public Utility
- ⌘ Management and insiders own 49% common stock
- ⌘ The Company issues an annual stock dividend of 5%
- ⌘ Common stock appreciated 262% during the five year period ending March 31, 1997
- ⌘ The nations' 15th largest natural gas distributor
- ⌘ 968,000 Customers in Texas and Missouri



Figure 3

# SOUTHERN UNION COMPANY PROFILE

- Southern Union Gas Co. Local distribution company in Texas
- Missouri Gas Energy Local distribution company in Missouri
- Southern Transmission Co. Natural gas transmission
- Norteno Pipeline Co. Natural gas pipeline
- Mercado Gas Services Gas marketing to end users and gas suppliers
- Southern Union Total Energy Systems Co. Natural gas industrial applications, equipment, design, consultation, sales, and service
- Southern Union Energy International, Inc. Natural gas sales and service outside the United States
- Energy WorX Inc. Develops computer-based training programs for LDCs
- ConTigo Inc. Customer service company
- SUPro Energy Co. Manages and operates propane companies

Figure 4

# Gas Supply Department

