

The information in this preliminary prospectus supplement is not complete and may be changed. This preliminary prospectus supplement and the accompanying prospectus are not an offer to sell these securities and are not soliciting an offer to buy these securities in any jurisdiction where the offer or sale is not permitted.

Filed Pursuant to Rule 424(b)(5)
Registration Statement No. 333-148136

**SUBJECT TO COMPLETION
PRELIMINARY PROSPECTUS SUPPLEMENT DATED MARCH 19, 2009**

PROSPECTUS SUPPLEMENT
(To Prospectus dated March 5, 2008)



Kansas City Power & Light Company
% Mortgage Bonds, Series 2009A due

We will pay interest on the bonds on _____ and _____ of each year, beginning _____, 2009. The bonds will mature on _____, 20____. We may redeem the bonds at any time in whole or from time to time in part at the price specified in this prospectus supplement.

The bonds are secured by the lien of our mortgage indenture and rank equally and ratably (except as to sinking funds and other analogous funds established for the exclusive benefit of a particular series) with all of our other general mortgage bonds from time to time outstanding. The lien of our mortgage indenture is discussed under “Description of General Mortgage Bonds — Security and Priority” on page 10 of the accompanying prospectus. The bonds will not be listed on any securities exchange.

Investing in the bonds involves risks that are described in the sections entitled “Risk Factors” beginning on page S-4 of this prospectus supplement and page 1 of the accompanying prospectus.

	<u>Per Bond</u>	<u>Total</u>
Public offering price(1)	%	\$
Underwriting discount	%	\$
Proceeds, before expenses, to KCP&L	%	\$

(1) Plus accrued interest from March _____, 2009, if settlement occurs after that date.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus supplement or the accompanying prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

The bonds will be ready for delivery in book-entry form only through The Depository Trust Company on or about March _____, 2009.

Joint Book-Running Managers

Banc of America Securities LLC

BNP PARIBAS

J.P. Morgan

Senior Co-Manager

Mitsubishi UFJ Securities

Co-Managers

BNY Mellon Capital Markets, LLC

Wachovia Securities

The date of this prospectus supplement is March _____, 2009.

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ABOUT THIS PROSPECTUS SUPPLEMENT

This document is in two parts. The first part is this prospectus supplement, which describes the terms of the offering of the bonds. The second part is the accompanying prospectus dated March 5, 2008, which we refer to as the “accompanying prospectus.” The accompanying prospectus contains a description of the bonds and gives more general information, some of which may not apply to the bonds.

You should rely only on the information contained or incorporated by reference in this prospectus supplement and the accompanying prospectus or in any written communication from us or any underwriter specifying the final terms of the offering of the bonds. We have not, and the underwriters have not, authorized anyone to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. We are not, and the underwriters are not, making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted. You should assume that the information appearing in this prospectus supplement, the accompanying prospectus and the documents incorporated by reference is accurate only as of their respective dates. Our business, financial condition, results of operations and prospects may have changed materially since those dates.

Before you invest in the bonds, you should carefully read the registration statement (including the exhibits thereto) of which this prospectus supplement and the accompanying prospectus form a part, this prospectus supplement, the accompanying prospectus and the documents incorporated by reference into this prospectus supplement and accompanying prospectus. The incorporated documents are described in this prospectus supplement under “Where You Can Find More Information.”

As described in more detail under “Where You Can Find More Information,” we and our parent company, Great Plains Energy Incorporated (Great Plains Energy), separately file combined annual, quarterly and current reports. However, only the information related to KCP&L and its consolidated subsidiaries is incorporated by reference in this prospectus supplement and the accompanying prospectus. You should not rely on any information relating solely to Great Plains Energy or its subsidiaries (other than the information provided separately by KCP&L or the subsidiaries of KCP&L) in determining whether to invest in the bonds. The bonds are not guaranteed by Great Plains Energy or any of its or our subsidiaries. None of those entities has any obligation to make any capital contribution or to advance funds to us for the purpose of paying the principal of, or premium, if any, and interest on the bonds or any other amount that may be required to be paid under the mortgage indenture or the bonds, preventing or curing an event of default under the terms of the mortgage indenture, complying with any other obligation under the mortgage indenture or the bonds or otherwise.

Unless the context otherwise requires or as otherwise indicated, when we refer to “Kansas City Power & Light,” “KCP&L,” the “Company,” “we,” “us” or “our” in this prospectus supplement or when we otherwise refer to ourselves in this prospectus supplement, we mean Kansas City Power & Light Company and not any of its subsidiaries.

WHERE YOU CAN FIND MORE INFORMATION

We file annual, quarterly and current reports, and proxy statements and other information with the Securities and Exchange Commission (SEC) through the SEC’s Electronic Data Gathering, Analysis and Retrieval system and these filings are publicly available through the SEC’s website (<http://www.sec.gov>). You may read and copy such material at the SEC’s Public Reference Room at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330.

The SEC allows us to “incorporate by reference” into this prospectus supplement the information we file with it. This means that we can disclose important information to you by referring you to the documents containing the information. The information we incorporate by reference is considered to be included in and an important part of this prospectus supplement and should be read with the same care. Information that we file later with the SEC that is incorporated by reference into this prospectus supplement will automatically update and supersede this information. We are incorporating by reference into this prospectus supplement the

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following documents that we have filed with the SEC and any subsequent filings we make with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Securities Exchange Act of 1934, as amended (the Exchange Act) (excluding information deemed to be furnished and not filed with the SEC) until the offering of the securities described in this prospectus supplement is completed:

- Our Annual Report on Form 10-K for the year ended December 31, 2008, filed with the SEC on February 27, 2009;
- Our Current Reports on Form 8-K dated February 10, 2009 (Item 8.01 only) and filed with the SEC on February 10, 2009; March 6, 2009 and filed with the SEC on March 12, 2009; and March 18, 2009 (Item 8.01 only) and filed with the SEC on March 19, 2009.

We and our parent company, Great Plains Energy, separately filed the combined Annual Report on Form 10-K and the Current Reports on Form 8-K listed above. However, the information contained in those combined reports relating solely to our parent and its subsidiaries (other than KCP&L and its consolidated subsidiaries), including KCP&L Greater Missouri Operations Company, was separately filed by Great Plains Energy on its behalf, and the information contained in those combined reports relating solely to KCP&L and its consolidated subsidiaries was separately filed by us. We do not intend to incorporate by reference into this prospectus the information relating to Great Plains Energy and its subsidiaries (other than KCP&L and its consolidated subsidiaries), and we make no representation as to the information relating to Great Plains Energy and its subsidiaries (other than KCP&L and its consolidated subsidiaries) contained in such combined reports. The only information you should rely upon in determining whether to invest in the securities offered hereby is the information of KCP&L and its consolidated subsidiaries contained in this prospectus supplement and the accompanying prospectus, the information separately provided by KCP&L and its consolidated subsidiaries in the documents incorporated by reference herein and any free writing prospectus used in connection with the offering of securities described in this prospectus supplement.

Our website is www.kcpl.com. Information contained on our website is not incorporated herein. We make available, free of charge, on or through our website, our annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, and amendments to those reports filed or furnished pursuant to Section 13(a) or 15(d) of the Exchange Act as soon as reasonably practicable after we electronically file such material with, or furnish it to, the SEC. In addition, we make available on or through our website all other reports, notifications and certifications filed electronically with the SEC. You may obtain a free copy of our filings with the SEC by writing or telephoning us at the following address: Kansas City Power & Light Company, 1201 Walnut Street, Kansas City, Missouri 64106-2124 (Telephone No.: 816-556-2200), Attention: Corporate Secretary, or by contacting us on our website.

PROSPECTUS SUPPLEMENT SUMMARY

Our Company

Kansas City Power & Light Company is an integrated, regulated electric utility, headquartered in Kansas City, Missouri, that engages in the generation, transmission, distribution and sale of electricity. As of December 31, 2008, we served approximately 509,000 customers located in western Missouri and eastern Kansas. Our customers included approximately 449,000 residences, 58,000 commercial firms, and 2,000 industrials, municipalities and other electric utilities as of December 31, 2008. Our retail revenues averaged approximately 82% of our total operating revenues over the last three calendar years. Wholesale firm power, bulk power sales and miscellaneous electric revenues accounted for the remainder of utility revenues. We are significantly impacted by seasonality with approximately one-third of our retail revenues recorded in the third quarter.

Our principal executive offices are located at 1201 Walnut Street, Kansas City, Missouri 64106-2124 and our telephone number is (816) 556-2200.

The Offering

The following summary contains basic information about the bonds. It does not contain all the information that is important to you. For a more complete understanding of the bonds, please refer to the section of this prospectus supplement entitled "Description of the Bonds" and the section of the accompanying prospectus entitled "Description of General Mortgage Bonds."

Issuer	Kansas City Power & Light Company
Bonds Offered	\$ aggregate principal amount of % Mortgage Bonds, Series 2009A due .
Maturity	, 20 .
Interest	The bonds will bear interest from March , 2009 at the rate of % per year.
Interest Payment Dates	and of each year, beginning , 2009.
Ranking and Security	The bonds will be secured by the lien of the mortgage indenture. They will rank equally and ratably (except as to sinking fund and other analogous funds established for the benefit of a particular series) with all our general mortgage bonds, regardless of series, from time to time outstanding under the mortgage indenture. As of December 31, 2008, we had approximately \$158.8 million aggregate principal amount of general mortgage bonds outstanding.
Optional Redemption	We may redeem the bonds at any time in whole or from time to time in part at the "make-whole premium" indicated under the section entitled "Description of the Bonds — Optional Redemption" in this prospectus supplement.
Further Issuances	We may at any time, without consent of the holders of the bonds offered by this prospectus supplement, issue additional general mortgage bonds having the same ranking, interest rate, maturity and other terms as the bonds being offered by this prospectus supplement. Any such additional general mortgage bonds will, together with the bonds offered by this prospectus supplement, constitute a single series of bonds under the mortgage indenture.
Use of Proceeds	We expect to use the net proceeds of this offering to repay a portion of our outstanding commercial paper and for general corporate

	purposes. Pending that use, we may invest the net proceeds of this offering in short-term marketable securities. See “Use of Proceeds” in this prospectus supplement.
Concurrent Issuances	Concurrently with the issuance of the bonds offered by this prospectus supplement, we are issuing and delivering \$196.5 million aggregate principal amount of additional general mortgage bonds to certain municipal bond insurers as collateral under municipal bond insurance policies. See “Description of the Bonds — Concurrent Issuances” in this prospectus supplement.
Risk Factors	See “Risk Factors” beginning on page S-4 of this prospectus supplement and page 1 of the accompanying prospectus for important information regarding us and an investment in the bonds.
Ratings	The bonds are expected to be rated A3 (Negative Outlook) by Moody’s Investors Service, Inc. and BBB+ (Negative Outlook) by Standard & Poor’s Ratings Services. A credit rating reflects an assessment by the rating agency of the creditworthiness associated with an issuer and particular securities that it issues. These ratings are not a recommendation to buy, sell or hold any securities of the Company. Such ratings may be subject to revisions or withdrawal by these agencies at any time and should be evaluated independently of each other and any other rating that may be assigned to the securities.
No Listing of the Bonds	We do not intend to make application to list the bonds on any national securities exchange or to include them in any automated quotation system.

Recent Developments

On March 13, 2009, the Kansas Corporation Commission (KCC) issued an order in the pending KCP&L Kansas rate case moving the expected effective date of the KCC’s order in that case from July 5, 2009 to August 14, 2009.

On March 18, 2009, the Missouri Public Service Commission (MPSC) issued an order in the pending KCP&L Missouri rate case moving the expected effective date of the MPSC’s order in that case from August 5, 2009 to September 5, 2009. KCP&L will evaluate potential alternatives to mitigate the financial impacts of this delay. However, there is no assurance that these impacts can be wholly or partially mitigated, and they could have a significant adverse effect on KCP&L’s results of operations.

The order also contained certain conditions regarding adjustments to reserves and rate base amounts associated with Iatan Unit No. 1, as well as including a portion of Iatan Unit No. 1 costs in rates on an interim basis, subject to refund, pending a true-up of costs in KCP&L’s next Missouri rate case. The order does not provide sufficient detail for KCP&L to reasonably quantify the impact of these conditions. KCP&L believes that the MPSC exceeded its authority in establishing these conditions in a procedural order, and will seek rehearing and/or judicial review to remove or clarify these conditions. It is not possible to predict the outcome of these proceedings.

It is possible that the final orders from the KCC and the MPSC will authorize a lower rate increase than what KCP&L has requested, or no increase or a rate reduction. Management cannot predict or provide any assurances regarding the outcome of these proceedings.

Summary Consolidated Financial Data

The following consolidated summary financial data for the years ended December 31, 2006 through December 31, 2008 have been derived from our audited consolidated financial statements and related notes, incorporated by reference in this prospectus supplement and the accompanying prospectus. The information set forth below is qualified in its entirety by reference to, and therefore, should be read together with, management's discussion and analysis of financial condition and results of operations, the financial statements and related notes and other financial information incorporated by reference herein.

	Year Ended December 31,		
	<u>2008</u>	<u>2007</u> (\$ in millions)	<u>2006</u>
Income Statement Data:			
Operating revenues	\$1,343.0	\$1,292.7	\$1,140.4
Operating expenses	1,104.9	1,013.8	869.4
Operating income	<u>\$ 238.1</u>	<u>\$ 278.9</u>	<u>\$ 271.0</u>
Net income	<u>\$ 125.2</u>	<u>\$ 156.7</u>	<u>\$ 149.3</u>
Cash Flow Data:			
Cash flows from operating activities	\$ 419.0	\$ 354.8	\$ 299.2
Cash flows from investing activities	(846.3)	(537.2)	(470.1)
Cash flows from financing activities	429.5	183.8	169.7
Other Financial Data:			
Depreciation and amortization	\$ 204.3	\$ 175.6	\$ 152.7
Amortization of:			
Nuclear fuel	14.5	16.8	14.4
Other	11.1	4.6	6.6
Utility capital expenditures	810.5	511.5	475.9

Ratios of Earnings to Fixed Charges

The following table sets forth our ratios of earnings to fixed charges for the periods indicated.

<u>2008</u>	Year Ended December 31,			
	<u>2007</u>	<u>2006</u>	<u>2005</u>	<u>2004</u>
2.87x	3.53x	4.11x	3.87x	3.37x

For purposes of computing the ratios of earnings to fixed charges: (i) earnings consist of income before deducting net provisions for income taxes, adjustment for minority interest in subsidiaries and fixed charges; and (ii) fixed charges consist of interest on debt, amortization of debt discount, premium and expense, and the estimated interest component of lease payments and rentals.

RISK FACTORS

An investment in the bonds is subject to various risks. These risks should be considered carefully with the information provided elsewhere and incorporated by reference in this prospectus supplement and the accompanying prospectus before deciding to invest in the bonds. In addition, please read the information included or incorporated by reference under “Risk Factors” and “Cautionary Statements Regarding Certain Forward-Looking Information” in this prospectus supplement, the accompanying prospectus and our Annual Report on Form 10-K for the year ended December 31, 2008 for a description of additional uncertainties associated with our business, results of operations and financial condition and the forward-looking statements included or incorporated by reference in this prospectus supplement and the accompanying prospectus.

Risks Relating to the Bonds

Indebtedness — *Our indebtedness could adversely affect our ability to fulfill our obligations under the bonds and operate our business.*

Our indebtedness and debt service obligations are significant. For the year ended December 31, 2008, our actual interest expense was \$72.3 million. As of December 31, 2008, our total long-term debt was \$1.4 billion, excluding unused commitments and contractual obligations and other commitments, and our total shareholder’s equity was \$1.6 billion. Adjusted for this offering, as of December 31, 2008, our total debt would have been approximately \$ billion and our total shareholder’s equity would have been unchanged. We may incur additional short and long-term debt from time to time to finance our Comprehensive Energy Plan, other construction requirements, pension benefit plan funding requirements, dividends to our parent company, working capital, capital expenditures or other general corporate purposes, subject to the restrictions contained in the credit agreement that governs our senior unsecured revolving credit facility and in any other agreements under which we incur indebtedness. The mortgage indenture will not restrict our ability to incur additional debt or to guarantee debt of our affiliates.

Our debt could have important consequences to holders of the bonds, including the following:

- we are required to use a substantial portion of our cash flow from operations to pay principal and interest on our debt, thereby reducing the availability of our cash flow to fund our Comprehensive Energy Plan and other construction requirements, pension benefit plan funding requirements, dividends to our parent company, working capital, capital expenditures and other general corporate requirements;
- if prevailing interest rates increase, our interest expense could increase because any borrowings under our senior unsecured revolving credit facility will bear interest at floating rates;
- our leverage increases our vulnerability to economic downturns; and
- our debt service obligations could limit our flexibility in planning for, or reacting to, changes in our business and our industry and could limit our ability to pursue other business opportunities, borrow more money for operations or capital in the future and implement our business strategies.

No Guarantees — *Our parent company is not guaranteeing the bonds and you should not rely upon information relating to our parent company in determining whether to invest in the bonds.*

As described in more detail under “Where You Can Find More Information,” we and our parent company, Great Plains Energy, separately file combined annual, quarterly and current reports. However, only the information related to KCP&L and its consolidated subsidiaries is incorporated by reference in this prospectus. You should not rely on any information relating solely to Great Plains Energy or its subsidiaries (other than KCP&L and its subsidiaries) in determining whether to invest in the bonds. The bonds are not guaranteed by Great Plains Energy or any of its or our subsidiaries. None of those entities has any obligation to make any capital contribution or distribution to us for the purpose of paying the principal of, or premium, if

any, and interest on the bonds or any other amount that may be required to be paid under the mortgage indenture or the bonds, preventing or curing an event of default under the terms of the mortgage indenture, complying with any other obligation under the mortgage indenture or the bonds or otherwise.

No Prior Market for the Bonds — There is no prior market for the bonds, and if a market develops, it may not be liquid.

We do not intend to list the bonds on any national securities exchange or to seek their quotation on any automated dealer quotation system. We cannot assure holders of the bonds that any liquid market for the bonds will ever develop or be maintained. The underwriters have advised us that they currently intend to make a market in the bonds following the offering. However, the underwriters have no obligation to make a market in the bonds and they may stop at any time. Further, there can be no assurance as to the liquidity of any market that may develop for the bonds, holders' ability to sell their bonds or the price at which holders will be able to sell their bonds. Future trading prices of the bonds will depend on many factors, including prevailing interest rates, our financial condition and results of operations, the then-current ratings assigned to the bonds and the market for similar securities. Any trading market that develops would be affected by many factors independent of and in addition to the foregoing, including:

- the time remaining to the maturity of the bonds;
- the outstanding amount of the bonds;
- the terms related to optional redemption of the bonds; and
- the level, direction and volatility of market interest rates generally.

Rating of the Bonds — Rating of the bonds may change after issuance and affect the market price and marketability of the bonds.

We currently expect that, upon issuance, the bonds will be rated by Moody's Investors Service, Inc. (Moody's) and Standard & Poor's Ratings Services (S&P). Such ratings are limited in scope, and do not address all material risks relating to an investment in the bonds, but rather reflect only the view of each rating agency at the time the rating is issued. An explanation of the significance of such rating may be obtained from such rating agency. There is no assurance that such credit ratings will be issued or remain in effect for any given period of time or that such ratings will not be decreased, suspended or withdrawn entirely by the rating agencies, if, in each rating agency's judgment, circumstances so warrant. KCP&L's credit ratings could decrease as a result of events directly affecting Great Plains Energy and its subsidiaries (other than KCP&L), even though Great Plains Energy is not guaranteeing the bonds and is not generally obligated to provide credit support to us. Holders of bonds will have no recourse against us or any other parties in the event of a change in or suspension or withdrawal of such ratings. Any decrease, suspension or withdrawal of such ratings may have an adverse effect on the market price or marketability of the bonds.

USE OF PROCEEDS

We estimate the net proceeds to us from the sale of the bonds will be approximately \$ million, after deducting the underwriters' discounts and other expenses of the offering payable by us. We expect to use the net proceeds of this offering to repay a portion of our outstanding commercial paper bearing interest at a weighted average interest rate of 5.34% as of December 31, 2008, and for general corporate purposes. Pending that use, we may invest the net proceeds from the offering in short-term marketable securities.

CAPITALIZATION AND SHORT-TERM DEBT

The following table sets forth our consolidated capitalization as of December 31, 2008, and as adjusted to give effect to the issuance and sale of the bonds, the use of the proceeds from this offering as set forth under “Use of Proceeds” above and the concurrent issuance of \$196.5 million aggregate principal amount of general mortgage bonds as described under “Description of the Bonds — Concurrent Issuances.” This table should be read in conjunction with our consolidated financial statements and related notes incorporated by reference in this prospectus supplement and the accompanying prospectus. See “Where You Can Find More Information” in this prospectus supplement.

	December 31, 2008	
	<u>Actual</u>	<u>As Adjusted</u>
	(\$ in millions)	
Short-term debt (includes current maturities)	\$ 380.2	\$
Long-term debt:		
General Mortgage Bonds		
4.9%* EIRR bonds due 2012-2035	\$ 158.8	\$
Bonds offered hereby	—	
Senior Notes		
6.50% due 2011	150.0	
5.85% due 2017	250.0	
6.375% due 2018	350.0	
6.05% due 2035	250.0	
Unamortized discount	(1.8)	
EIRR Bonds		
4.65% Series 2005 due 2035	50.0	
5.125% Series 2007A-1 due 2035	63.3	
5.00% Series 2007A-2 due 2035	10.0	
5.375% Series 2007B due 2035	73.2	
4.90% Series 2008 due 2038	23.4	
Total debt	1,376.9	
Less current maturities	—	
Total long-term debt	<u>\$ 1,376.9</u>	<u>\$</u>
Shareholder's equity:		
Common stock (1,000 shares authorized without par value; 1 share issued, stated value)	\$ 1,315.6	\$
Retained earnings	353.2	
Accumulated other comprehensive loss	(46.9)	
Total shareholder's equity	<u>1,621.9</u>	
Total capitalization and short-term debt	<u><u>\$ 3,379.0</u></u>	<u><u>\$</u></u>

* Weighted-average interest rates as of December 31, 2008.

DESCRIPTION OF THE BONDS

The following description of the particular terms of the bonds supplements and, to the extent inconsistent therewith, replaces the description of the general terms and provisions of the general mortgage bonds set forth in the accompanying prospectus under the heading “Description of General Mortgage Bonds,” to which description reference is hereby made. Whenever a defined term is referred to and not herein defined, the definition thereof is contained in the accompanying prospectus or in the mortgage indenture referred to therein.

General

The bonds constitute a single series of general mortgage bonds to be issued under the General Mortgage Indenture and Deed of Trust, dated as of December 1, 1986, as supplemented from time to time, executed by the Company to UMB Bank, N.A. (formerly United Missouri Bank of Kansas City, N.A.), as trustee. We refer in this prospectus supplement to the general mortgage bonds as the “general mortgage bonds,” to the mortgage, as supplemented, as the “mortgage indenture” and to UMB Bank, N.A. as the “mortgage trustee.”

The bonds will bear interest at the rate of % per year from the date of issuance or from the most recent interest payment date to which interest has been paid or provided for, payable semi-annually in arrears on and of each year, beginning , 2009, to the persons in whose names the bonds are registered at the close of business on the immediately preceding and , respectively, whether or not such day is a business day. Interest will be computed on the basis of a 360-day year comprised of twelve 30-day months. If any date on which interest is payable on the bonds is not a business day, then payment of the interest payable on that date will be made on the next succeeding day which is a business day (and without any additional interest or other payment in respect of any delay).

The bonds will be issued only in registered form in minimum denominations of \$1,000 and in integral multiples of \$1,000.

We will initially offer \$ aggregate principal amount of bonds. Subject to the terms of the mortgage indenture, we may, at any time, without consent of the holders of the bonds, issue additional general mortgage bonds having the same ranking, interest rate, maturity and other terms as the bonds being offered hereby; provided that such additional bonds must be part of the same issue and fungible with the initially issued bonds for U.S. federal income tax purposes. Any such additional general mortgage bonds, together with the bonds offered hereby, will constitute a single series of bonds under the mortgage indenture.

Basis for Issuance of the Bonds

We will issue the bonds under the mortgage indenture based upon retirements of previously issued general mortgage bonds and prior lien bonds (as defined under “Description of General Mortgage Bonds — Issuance of Additional Mortgage Bonds” in the accompanying prospectus). As of December 31, 2008, we could issue under the mortgage indenture:

- based upon the value of unbonded bondable property, up to \$4.694 billion of additional general mortgage bonds;
- based upon retirements of previously issued general mortgage bonds and prior lien bonds, up to \$679 million of additional general mortgage bonds (\$ million after giving effect to this offering and the concurrent issuance of \$196.5 million aggregate principal amount of general mortgage bonds as described under “— Concurrent Issuances”).

For more information, see “Description of General Mortgage Bonds — Issuance of Additional Mortgage Bonds” in the accompanying prospectus.

Ranking and Security

The bonds will be secured by the lien of the mortgage indenture and will rank equally and ratably (except as to sinking funds and other analogous funds established for the exclusive benefit of a particular series) with all general mortgage bonds, regardless of series, from time to time issued and outstanding under the mortgage indenture. For more information, see “Description of General Mortgage Bonds — Security and Priority” in the accompanying prospectus. As of December 31, 2008, we had approximately \$158.8 million aggregate principal amount of general mortgage bonds outstanding. Concurrently with the issuance of the bonds offered by this prospectus supplement, we are issuing \$196.5 million aggregate principal amount of general mortgage bonds as described under “— Concurrent Issuances.”

Optional Redemption

The bonds will be redeemable at any time in whole or from time to time in part, at our option, each at a “make-whole premium” redemption price calculated by us equal to the greater of:

- 100% of the principal amount of the bonds to be redeemed; and
- the sum of the present values of the remaining scheduled payments of principal and interest thereon (not including any portion of such payments of interest accrued as of the date of redemption), discounted to the date of redemption on a semi-annual basis (assuming a 360-day year consisting of twelve 30-day months) at the Treasury Rate, plus basis points

plus, in each case, accrued interest thereon to the date of redemption. Notwithstanding the foregoing, installments of interest on bonds that are due and payable on interest payment dates falling on or prior to a redemption date will be payable on the interest payment date to the registered holders as of the close of business on the relevant record date according to the bonds and the mortgage indenture.

“Comparable Treasury Issue” means the United States Treasury security selected by the Quotation Agent as having an actual or interpolated maturity comparable to the remaining term of the bonds to be redeemed that would be utilized, at the time of selection and in accordance with customary financial practice, in pricing new issues of corporate debt securities of comparable maturity to the remaining term of such bonds.

“Comparable Treasury Price” means, with respect to any redemption date:

- the average of the four Reference Treasury Dealer Quotations for such redemption date, after excluding the highest and lowest such Reference Treasury Dealer Quotations, or
- if the Quotation Agent obtains fewer than four such Reference Treasury Dealer Quotations, the average of all such quotations, or
- if only one Reference Treasury Dealer Quotation is received, such quotation.

“Quotation Agent” means the Reference Treasury Dealer appointed by us.

“Reference Treasury Dealer” means

- each of Banc of America Securities LLC, BNP Paribas Securities Corp. and J.P. Morgan Securities Inc., or their affiliates, and their respective successors, unless any of them ceases to be a primary U.S. Government securities dealer in the United States of America (“Primary Treasury Dealer”), in which case we will substitute therefor another Primary Treasury Dealer, and
- one other Primary Treasury Dealer that we select.

“Reference Treasury Dealer Quotations” means, with respect to each Reference Treasury Dealer and any redemption date, the average, as determined by the Quotation Agent, of the bid and asked prices for the Comparable Treasury Issue (expressed in each case as a percentage of its principal amount) quoted in writing

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to the Quotation Agent by such Reference Treasury Dealer at 5:00 p.m., New York City time, on the third business day preceding such redemption date.

“Treasury Rate” means, with respect to any redemption date, the rate per annum equal to the semi-annual equivalent yield to maturity of the Comparable Treasury Issue, assuming a price for the Comparable Treasury Issue (expressed as a percentage of its principal amount) equal to the Comparable Treasury Price for such redemption date.

Notice of any redemption will be mailed at least 30 days but not more than 40 days before the redemption date to each holder of the bonds to be redeemed. Unless we default in payment of the redemption price, on and after the redemption date, interest will cease to accrue on the bonds or portions thereof called for redemption. If less than all of the bonds are to be redeemed, the particular bonds or portions of such bonds to be redeemed will be selected by The Depository Trust Company in such manner as it shall determine.

Notwithstanding the foregoing, if at the time of mailing any notice of redemption, we have not irrevocably directed the mortgage trustee to apply funds to redeem all the bonds called for redemption, such notice of redemption at our option may state that such redemption is subject to the receipt by the mortgage trustee on or prior to the date fixed for such redemption, of money sufficient to pay the principal of and premium, if any, and interest on, such bonds and that such notice will be of no effect unless moneys are so received before the date fixed for redemption.

Concurrent Issuances

We are the obligor with respect to \$146.5 million aggregate principal amount of unsecured Environmental Improvement Revenue Refunding (EIRR) Bonds Series 2007A-1, Series 2007A-2 and Series 2007B, which are insured by a municipal bond insurance policy issued by Financial Guaranty Insurance Company (FGIC). The insurance agreement between KCP&L and FGIC provides that if we issue debt secured by liens not permitted by the insurance agreement, we are required to issue and deliver to FGIC mortgage bonds or similar securities equal in principal amount to the principal amount of the EIRR Bonds Series 2007A-1, 2007A-2 and 2007B then outstanding.

We are also the obligor with respect to \$50.0 million aggregate principal amount of unsecured EIRR Bonds Series 2005, which are insured by a municipal bond insurance policy issued by Syncora Guarantee, Inc. (formerly XL Capital Assurance, Inc.) (Syncora). The insurance agreement between KCP&L and Syncora requires us to provide Syncora with \$50.0 million aggregate principal amount of general mortgage bonds as collateral for our obligations under the insurance agreement in the event we issue general mortgage bonds (other than refundings of outstanding general mortgage bonds) resulting in the aggregate amount of outstanding general mortgage bonds exceeding 10% of our total capitalization.

Therefore, as a consequence of issuing the bonds offered by this prospectus supplement, we are concurrently issuing and delivering \$146.5 million aggregate principal amount of general mortgage bonds to FGIC and \$50.0 million aggregate principal amount of general mortgage bonds to Syncora.

Sinking Fund

The bonds will not be entitled to the benefit of any sinking fund, or to a special redemption by operation of a sinking fund.

No Guarantees

The bonds are not guaranteed by our parent company, Great Plains Energy, or any of its or our subsidiaries. None of those entities has any obligation to make capital contribution or distributions to KCP&L for the purpose of paying the principal of, or premium, if any, and interest on the bonds or any other amount that may be required to be paid under the mortgage indenture or the bonds, preventing or curing an event of default under the terms of the mortgage indenture or complying with any other obligation under the mortgage indenture or the bonds or otherwise.

Book-Entry System

Upon issuance, the bonds will be represented by one or more global securities deposited with, or on behalf of the depositary. The global securities representing the bonds will be registered in the name of the depositary or its nominee. Except under the circumstances described in the accompanying prospectus under “Book-Entry System,” the bonds will not be issuable in definitive form. So long as the bonds are represented by one or more global securities, the depositary or its nominee will be considered the sole owner or holder of such bonds for all purposes under the mortgage indenture, and the beneficial owners of such bonds will be entitled only to those rights and benefits afforded to them in accordance with the depositary’s regular operating procedures. The depositary has confirmed to the Company, the underwriters and the mortgage trustee that it intends to follow such procedures with respect to the bonds. A further description of the depositary’s procedures with respect to global securities is set forth in the accompanying prospectus under “Book-Entry System.”

UNDERWRITING

Subject to the terms and conditions of the underwriting agreement, the underwriters named below, for whom Banc of America Securities LLC, BNP Paribas Securities Corp. and J.P. Morgan Securities Inc. are acting as representatives, have severally agreed to purchase from us, and we have agreed to sell, the principal amount of bonds listed opposite their names below at the public offering price less the underwriting discount set forth on the cover page of this prospectus supplement.

Underwriter	Principal Amount of Bonds
Banc of America Securities LLC	\$
BNP Paribas Securities Corp.	
J.P. Morgan Securities Inc.	
Mitsubishi UFJ Securities (USA), Inc.	
BNY Mellon Capital Markets, LLC	
Wachovia Capital Markets, LLC	
Total	\$

The underwriting agreement provides that the obligations of the several underwriters to purchase the bonds offered hereby are subject to certain conditions and that the underwriters will purchase all the bonds offered by this prospectus supplement if any of these bonds are purchased.

We have been advised by the representatives that the underwriters propose to offer the bonds directly to the public at the public offering price set forth on the cover page of this prospectus supplement and to certain dealers at such price less a concession not in excess of % of the principal amount of the bonds. The underwriters may allow, and such dealers may re-allow, a concession not in excess of % of the principal amount of the bonds to certain other dealers. After the initial public offering, representatives of the underwriters may change the offering price and other selling terms.

We estimate that our share of the total expenses of this offering, excluding the underwriting discount, will be approximately \$1.3 million.

We have agreed to indemnify the underwriters against certain liabilities, including liabilities under the Securities Act of 1933, and to contribute to payments the underwriters may be required to make in respect of any of these liabilities.

The bonds are a new issue of securities with no established trading market. The bonds will not be listed on any securities exchange or on any automated dealer quotation system. The underwriters may make a market in the bonds after completion of the offering, but will not be obligated to do so and may discontinue any market-making activities at any time without notice. No assurance can be given as to the liquidity of the trading market for the bonds or that an active public market for the bonds will develop. If an active public trading market for the bonds does not develop, the market price and liquidity of the bonds may be adversely affected.

In connection with the offering of the bonds, the representatives may engage in transactions that stabilize, maintain or otherwise affect the price of the bonds. Specifically, the representatives may overallocate in connection with the offering, creating a short position. In addition, the representatives may bid for, and purchase, the bonds in the open market to cover short positions or to stabilize the price of the bonds. Any of these activities may stabilize or maintain the market price of the bonds above independent market levels, but no representation is made hereby of the magnitude of any effect that the transactions described above may have on the market price of the bonds. The underwriters will not be required to engage in these activities, and may engage in these activities or may end any of these activities, at any time, without notice.

Affiliates of certain of the underwriters are lenders under revolving credit agreements entered into separately with Great Plains Energy and KCP&L in May 2006. In connection with each of these arrangements, JPMorgan Chase Bank, N.A., an affiliate of J.P. Morgan Securities Inc., acted as syndication agent, Banc of

America Securities LLC and J.P. Morgan Securities Inc. acted as joint-lead arrangers, Bank of America, N.A., an affiliate of Banc of America Securities LLC, acted as a lender and administrative agent, each of BNP Paribas Securities Corp., The Bank of Tokyo-Mitsubishi UFJ, Chicago Branch, an affiliate of Mitsubishi UFJ Securities (USA), Inc. and Wachovia Bank, N.A., an affiliate of Wachovia Capital Markets, LLC, acted as a lender and co-documentation agent and The Bank of New York, an affiliate of BNY Mellon Capital Markets, LLC, acted as a lender. The underwriters and their affiliates have provided and in the future may continue to provide investment banking, commercial banking and other financial services, including the provision of credit facilities, to us and our affiliates in the ordinary course of business for which they have received and may in the future receive customary compensation.

Affiliates of certain of the underwriters participate in the commercial paper program of KCP&L and may from time to time hold KCP&L's commercial paper. As a result, more than 10% of the net offering proceeds may be paid to underwriters or affiliates and, accordingly, the offering will be made in reliance upon Rule 5110(h) of the Conduct Rules of the Financial Industry Regulatory Authority, Inc.

LEGAL MATTERS

Mark English, Assistant General Counsel and Assistant Secretary, will pass upon the authorization and validity of the bonds as a matter of Kansas and Missouri law. Certain legal matters in connection with the offering of the bonds will be passed upon for us by Dewey & LeBoeuf LLP, New York, New York. Certain legal matters will be passed upon for the underwriters by Davis Polk & Wardwell, Menlo Park, California.

At February 27, 2009, Mr. English owned beneficially 7,149 shares of Great Plains Energy common stock, including restricted stock, and 4,842 performance shares, which may be paid in shares of Great Plains Energy common stock at a later date based on our performance.

EXPERTS

The consolidated financial statements, the related financial statement schedules, and the effectiveness of internal control over financial reporting of Kansas City Power & Light Company and its subsidiaries, incorporated by reference in this prospectus supplement and the accompanying prospectus from the Annual Report on Form 10-K of Kansas City Power & Light Company for the year ended December 31, 2008, have been audited by Deloitte & Touche LLP, an independent registered public accounting firm, as stated in their reports (which reports (1) express an unqualified opinion on the consolidated financial statements and financial statement schedules and include an explanatory paragraph regarding the adoption of new accounting standards SFAS No. 158, *Employers' Accounting for Defined Benefit Pension and Other Postretirement Plans — an amendment of FASB Statements No. 87, 88, 106, and 132(R)* and FIN No. 48, *Accounting for Uncertainty in Income Taxes — an interpretation of FASB Statement No. 109*, and (2) express an unqualified opinion on the Company's internal control over financial reporting), which are incorporated herein by reference, and have been so incorporated in reliance upon the reports of such firm given upon their authority as experts in accounting and auditing.

PROSPECTUS

KANSAS CITY POWER & LIGHT COMPANY

Notes

General Mortgage Bonds

Kansas City Power & Light Company, or the Company, may offer and sell, from time to time, up to \$900,000,000 aggregate offering price of notes and general mortgage bonds in one or more offerings. We may offer the securities simultaneously or at different times, in one or more separate series, in amounts, at prices and on terms to be determined at or prior to the time or times of sale.

This prospectus provides you with a general description of these securities. We will provide specific information about the offering and the terms of these securities in one or more supplements to this prospectus. The supplements may also add, update or change information contained in this prospectus. This prospectus may not be used to offer and sell our securities unless accompanied by a prospectus supplement. You should read this prospectus and the related supplements before you invest in these securities.

Our principal executive offices are located at 1201 Walnut Street, Kansas City, Missouri 64106-2124 and our telephone number is (816) 556-2200.

Investing in these securities involves risks. You should carefully consider the information referred to under the heading “Risk Factors” beginning on page 1 of this prospectus.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

We may offer and sell these securities through one or more underwriters or agents. We will set forth in the related prospectus supplement the name of the underwriters or agents, the discount or commission received by them from us as compensation, our other expenses for the offering and sale of these securities, and the net proceeds we receive from the sale. See “Plan of Distribution.”

The date of this prospectus is March 5, 2008.

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ABOUT THIS PROSPECTUS

This prospectus is part of a registration statement we have filed with the Securities and Exchange Commission, or SEC, using a “shelf” registration process. By using this process, we may, from time to time, sell any combination of the securities described in this prospectus in one or more offerings.

This prospectus provides you with a general description of the securities we may offer. Each time we sell securities, we will provide you with a supplement to this prospectus that will describe the specific terms of that offering. The prospectus supplement may also add, update or change the information contained in this prospectus. If there is any inconsistency between the information in this prospectus and the prospectus supplement, you should rely on the information in the prospectus supplement. The registration statement we filed with the SEC includes exhibits that provide more detail on descriptions of the matters discussed in this prospectus. Before you invest in our securities, you should carefully read the registration statement (including the exhibits) of which this prospectus forms a part, this prospectus, the applicable prospectus supplement and the documents incorporated by reference into this prospectus. The incorporated documents are described under “Where You Can Find More Information.”

You should rely only on the information contained or incorporated by reference in this prospectus or in any free writing prospectus. We have not, and the underwriters have not, authorized anyone to provide you with different information and neither we nor the underwriters of any offering of securities will authorize anyone else to provide you with different information. If anyone provides you with different or inconsistent information, you should not rely on it. We are not, and the underwriters are not, making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted. You should assume that the information appearing in this prospectus and the documents incorporated by reference is accurate only as of their respective dates. Our business, financial condition, results of operations and prospects may have changed materially since those dates.

As described in more detail below under “Where You Can Find More Information”, we and Great Plains Energy Incorporated, our parent company, separately file combined annual, quarterly and current reports. However, only the information related to KCP&L and its consolidated subsidiaries is incorporated by reference in this prospectus. You should not rely on any information relating solely to Great Plains Energy Incorporated or its subsidiaries (other than the information provided separately by KCP&L or the subsidiaries of KCP&L) in determining whether to invest in any securities offered hereby.

Unless the context otherwise requires or as otherwise indicated, when we refer to “Kansas City Power & Light,” “KCP&L,” the “Company,” “we,” “us” or “our” in this prospectus or when we otherwise refer to ourselves in this prospectus, we mean Kansas City Power & Light Company and not any of its subsidiaries.

CAUTIONARY STATEMENTS REGARDING CERTAIN FORWARD-LOOKING INFORMATION

This prospectus and the documents incorporated or deemed incorporated by reference as described under the heading “Where You Can Find More Information” contain forward-looking statements that are not based on historical facts. In some cases, you can identify forward-looking statements by use of the words “may,” “should,” “expect,” “plan,” “anticipate,” “estimate,” “predict,” “potential,” or “continue.” Forward-looking statements include, but are not limited to, statements regarding projected delivery volumes and margins, the outcome of regulatory proceedings, cost estimates for our Comprehensive Energy Plan and other matters affecting future operations. These forward-looking statements are based on assumptions, expectations, and assessments made by our management in light of their experience and their perception of historical trends, current conditions, expected future developments and other factors they believe to be appropriate. Any forward-looking statements are not guarantees of our future performance and are subject to risks and uncertainties, including those described or referred to under the heading “Risk Factors” in this prospectus, in any prospectus supplement, and in our other SEC filings. These risks and uncertainties could cause actual results, developments and business decisions to differ materially from those contemplated or implied by forward-looking statements. Consequently, you should recognize these statements for what they are and we caution you not to rely upon them as facts. We claim the protection of the safe harbor for forward-looking statements contained in the Private Securities Litigation Reform Act of 1995 for all forward-looking statements. We disclaim any duty to update the forward-looking statements, which apply only as of the date of this prospectus. Some of the factors that may cause actual results, developments and business decisions to differ materially from those contemplated by these forward-looking statements include the following:

- future economic conditions in the regional, national and international markets, including but not limited to regional and national wholesale electricity markets
- market perception of the energy industry and the Company
- changes in business strategy, operations or development plans
- effects of current or proposed state and federal legislative and regulatory actions or developments, including, but not limited to, deregulation, re-regulation and restructuring of the electric utility industry
- decisions of regulators regarding rates the Company can charge for electricity
- adverse changes in applicable laws, regulations, rules, principles or practices governing tax, accounting and environmental matters including, but not limited to, air and water quality
- financial market conditions and performance including, but not limited to, changes in interest rates and credit spreads and in availability and cost of capital and the effects on pension plan assets and costs
- credit ratings
- inflation rates
- effectiveness of risk management policies and procedures and the ability of counterparties to satisfy their contractual commitments
- impact of terrorist acts
- increased competition including, but not limited to, retail choice in the electric utility industry and the entry of new competitors
- ability to carry out marketing and sales plans
- weather conditions including weather-related damage
- cost, availability, quality and deliverability of fuel

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- ability to achieve generation planning goals and the occurrence and duration of planned and unplanned generation outages
- delays in the anticipated in-service dates and cost increases of additional generating capacity and environmental projects
- nuclear operations
- workforce risks including compensation and benefits costs
- variations between the stated assumptions on which forward-looking statements are based and our actual experience
- other risks and uncertainties

This list of factors is not all-inclusive because it is not possible to predict all factors. You should also carefully consider the information referred to under the heading “Risk Factors” in this prospectus, any prospectus supplement, and in our other SEC filings.

KANSAS CITY POWER & LIGHT COMPANY

Kansas City Power & Light Company is an integrated, regulated electric utility, headquartered in Kansas City, Missouri, that engages in the generation, transmission, distribution and sale of electricity. As of December 31, 2007, we served approximately 506,000 customers located in all or portions of 24 counties in western Missouri and eastern Kansas. Our customers included approximately 446,100 residences, 57,600 commercial firms, and 2,300 industrials, municipalities, and other electric utilities as of December 31, 2007. Our retail revenues averaged approximately 81% of our total operating revenues over the last three calendar years. Wholesale firm power, bulk power sales and miscellaneous electric revenues accounted for the remainder of utility revenues. We are significantly impacted by seasonality, with approximately one-third of our retail revenues recorded in the third quarter.

RISK FACTORS

Investing in our securities involves risks. Our business is influenced by many factors that are difficult to predict, involve uncertainties that may materially affect actual results and are often beyond our control. You should carefully consider the information under the heading "Risk Factors" in:

- any prospectus supplement relating to any securities we are offering;
- our annual report on Form 10-K for the fiscal year ended December 31, 2007, which is incorporated by reference into this prospectus; and
- documents we file with the SEC after the date of this prospectus and which are deemed incorporated by reference into this prospectus.

USE OF PROCEEDS

Unless we inform you otherwise in a supplement to this prospectus, we anticipate using any net proceeds received by us from the issuance of any of the offered securities for general corporate purposes, including, among others:

- repayment of debt;
- repurchase, retirement or refinancing of other securities;
- funding of construction expenditures; and
- acquisitions.

Pending such uses, we may also invest the proceeds in certificates of deposit, United States government securities or certain other interest-bearing securities. If we decide to use the net proceeds from a particular offering of securities for a specific purpose, we will describe that in the related prospectus supplement.

DESCRIPTION OF NOTES

General

The notes will represent unsecured obligations of the Company. We will issue each series of notes under the Indenture, dated as of May 1, 2007, between the Company and The Bank of New York Trust Company, N.A., as trustee. We refer to this Indenture in this prospectus as the “Indenture” and to The Bank of New York Trust Company, N.A. as the “trustee.” If at any time there is more than one trustee under the Indenture, the term “trustee” as used in this section with respect to the notes of any series means the trustee with respect to the notes of that series.

We have summarized selected provisions of the Indenture below. However, the following statements are summaries only, do not purport to be complete and are subject to, and qualified in their entirety by, all of the provisions of the Indenture, which is incorporated by reference herein. Certain of the terms used below are used herein with the meanings ascribed to such terms by the Indenture. You should carefully read the summary below and the provisions of the Indenture that may be important to you before investing. The Indenture, and not this description, defines the rights of the holders of the notes. Copies of the Indenture will be available at the offices of the trustee at 2 North LaSalle Street, Suite 1020, Chicago, Illinois 60602.

The following sets forth certain general terms and provisions of the notes. The particular terms of the series of notes offered by any prospectus supplement will be described in that prospectus supplement. The Indenture provides that the notes may be issued in one or more series, may be issued at various times, may have differing maturity dates, may bear interest at differing rates and may have other differing terms and conditions, as described below. We need not issue all notes of one series at the same time and, unless otherwise provided, we may reopen a series, without the consent of the holder of the notes of that series for issuances of additional notes. One or more series of the notes may be issued with the same or various maturities at par, above par or at a discount. Notes bearing no interest or interest at a rate which, at the time of issuance, is below the market rate (“Original Issue Discount Securities”) will be sold at a discount (which may be substantial) below their stated principal amount. Federal income tax consequences and other special considerations applicable to any such Original Issue Discount Securities will be described in the prospectus supplement relating to those securities. Unless otherwise described in the applicable prospectus supplement, the Indenture does not limit the aggregate amount of debt, including secured debt, that we or our subsidiaries may incur. There is no limitation of the amount of debt we may issue under the Indenture. The Indenture also permits us to merge or consolidate or to transfer or lease our assets, subject to certain conditions (see “Consolidation, Merger and Sale” below).

Ranking

Each series of notes will be our direct unsecured general obligations and will rank equally with all of our other unsecured and unsubordinated debt. As of December 31, 2007, our aggregate outstanding debt that would have ranked equally with the notes was approximately \$844.6 million.

Unless otherwise provided in a prospectus supplement, the notes will effectively rank junior to our mortgage bonds which were issued under our Mortgage Indenture. The Mortgage Indenture constitutes a first mortgage lien upon substantially all of our fixed property and franchises. At December 31, 2007, there was approximately \$158.8 million aggregate principal amount of mortgage bonds outstanding. We have agreed with the issuer of certain bond insurance policies to not issue additional mortgage bonds if, after giving effect to such additional mortgage bonds, the proportion of secured debt to total indebtedness exceeded 75%. Additionally, if the long term rating for such mortgage bonds by Standard & Poor’s or Moody’s Investors Service would be at or below A- or A3, respectively, such agreements would prohibit us from issuing additional mortgage bonds if, after giving effect to such additional mortgage bonds, the proportion of secured debt to total indebtedness exceeded 50%. At December 31, 2007, the proportion of secured debt to total indebtedness was approximately 12%.

Provisions of a Particular Series

The prospectus supplement applicable to each issuance of notes will specify, among other things:

- the title and any limitation on aggregate principal amount of the notes;
- the original issue date of the notes;
- the date or dates on which the principal of any of the notes is payable;
- the fixed or variable interest rate or rates, or method of calculation of such rate or rates, for the notes, and the date from which interest will accrue;
- the terms, if any, regarding the optional or mandatory redemption of any notes, including the redemption date or dates, if any, and the price or prices applicable to such redemption;
- whether the notes are to be issued in whole or in part in the form of one or more global securities and, if so, the identity of the Depository for such global security or global securities;
- the denominations in which such notes will be issuable;
- the maximum annual interest rate, if any, of the notes;
- the period or periods within which, the price or prices at which and the terms and conditions upon which any notes may be repaid, in whole or in part, at the option of the holder thereof;
- the place or places where the principal of, and premium, if any, and interest, if any, on the notes shall be payable;
- any addition, deletion or modification to the events of default applicable to that series of notes and the covenants for the benefit of the holders of that series;
- the terms, if any, pursuant to which notes may be converted into or exchanged for shares of our capital stock or other securities;
- our obligation, if any, to redeem, purchase, or repay the notes, including, but not limited to, pursuant to any sinking fund or analogous provision or at the option of a holder thereof and the period or periods within which, the price or prices at which, and the terms and conditions upon which the notes shall be redeemed, purchased, or repaid pursuant to such obligation;
- any remarketing features of the notes;
- any collateral, security, assurance, or guarantee for the note;
- if other than the principal amount thereof, the portion of the principal amount of the notes payable upon declaration of acceleration of the maturity of the notes;
- the securities exchange(s), if any, on which the notes will be listed;
- any interest deferral or extension provisions;
- the terms of any warrants we may issue to purchase notes;
- the right, if any, for us to extend the interest payment periods of the notes, including the maximum duration of any extension and additional interest payable upon exercise of such right; and
- any other terms of the notes not inconsistent with the provisions of the Indenture.

Registration, Transfer and Exchange

Unless otherwise indicated in the applicable prospectus supplement, each series of notes will initially be issued in the form of one or more global securities, in registered form, without coupons, as described under “Book-Entry System.” The global securities will be registered in the name of a depository, or its nominee, and deposited with, or on behalf of, the depository. Except in the circumstances described under “Book-Entry

System,” owners of beneficial interests in a global security will not be entitled to have notes registered in their names, will not receive or be entitled to receive physical delivery of any notes and will not be considered the registered holders thereof under the Indenture.

Notes of any series will be exchangeable for other notes of the same series of any authorized denominations and of a like aggregate principal amount and tenor. Subject to the terms of the Indenture and the limitations applicable to global securities, notes may be presented for exchange or registration of transfer — duly endorsed or accompanied by a duly executed instrument of transfer — at the office of any transfer agent we may designate for such purpose, without service charge but upon payment of any taxes and other governmental charges, and upon satisfaction of such other reasonable requirements as are described in the Indenture.

Unless otherwise indicated in the applicable prospectus supplement, the transfer agent will be the trustee under the Indenture. We may at any time designate additional transfer agents or rescind the designation of any transfer agent or approve a change in the office through which any transfer agent acts, except that we will be required to maintain a transfer agent in each place of payment for the notes of each series.

Payment and Paying Agents

Principal of and interest and premium, if any, on notes issued in the form of global securities will be paid in the manner described under “Book-Entry System.”

Unless otherwise indicated in the applicable prospectus supplement, the principal of and any premium and interest on notes of a particular series in the form of certificated securities will be payable at the office of the trustee or at the authorized office of any paying agent or paying agents upon presentation and surrender of such notes. We may at any time designate additional paying agents or rescind the designation of any paying agent or approve a change in the office through which any paying agent acts, except that we will be required to maintain a paying agent in each place of payment for the notes of a particular series. Unless otherwise indicated in the applicable prospectus supplement, interest on the notes of a particular series, other than interest at maturity, that are in the form of certificated securities will be paid by check payable in clearinghouse funds mailed to the person entitled thereto at such person’s address as it appears on the register for such notes maintained by the trustee. All monies we pay to the trustee or a paying agent for the payment of the principal of, and premium or interest, if any, on, any note which remain unclaimed at the end of two years after such principal, premium or interest shall have become due and payable will be repaid to us, and the holder of such note thereafter may look only to us for payment thereof. However, any such payment shall be subject to escheat pursuant to state abandoned property laws.

Redemption

Any terms for the optional or mandatory redemption of the notes will be set forth in the applicable prospectus supplement. Unless otherwise indicated in the applicable prospectus supplement, notes will be redeemable by us only upon notice by mail not less than 30 nor more than 60 days prior to the date fixed for redemption, and, if less than all the notes of a series are to be redeemed, the particular notes to be redeemed will be selected by such method as shall be provided for any particular series, or in the absence of any such provision, by the trustee in such manner as it shall deem fair and appropriate.

Any notice of redemption at our option may state that such redemption will be conditional upon receipt by the trustee or the paying agent or agents, on or prior to the date fixed for such redemption, of money sufficient to pay the principal of and premium, if any, and interest on, such notes and that if such money has not been so received, such notice will be of no force and effect and we will not be required to redeem such notes.

Consolidation, Merger and Sale or Disposition of Assets

We may not, without the consent of the holders of any notes, consolidate with or merge into any other corporation or sell, transfer, lease or otherwise dispose of our properties as or substantially as an entirety to any person, unless:

- the successor or transferee corporation or the person which receives such properties pursuant to such sale, transfer, lease or other disposition is a corporation organized and existing under the laws of the United States of America, any state thereof or the District of Columbia;
- the successor or transferee corporation or the person which receives such properties pursuant to such sale, transfer, lease or other disposition assumes by supplemental Indenture, in a form reasonably satisfactory to the trustee, the due and punctual payment of the principal of and premium and interest, if any, on all the notes outstanding under the Indenture and the performance of every covenant of the Indenture to be performed or observed by us;
- we have delivered to the trustees for such notes an officer's certificate and an opinion of counsel, each stating that the transaction complies with the Indenture and the applicable conditions precedent; and
- immediately after giving effect to the transaction, no Event of Default (see "Events of Default") or event that, after notice or lapse of time, or both, would become an Event of Default, shall have occurred and be continuing.

Upon any such consolidation, merger, sale, transfer, lease or other disposition of our properties as or substantially as an entirety, the successor corporation formed by such consolidation or into which we are merged or the person to which such sale, transfer, lease or other disposition is made shall succeed to, and be substituted for, and may exercise every right and power of, us under the Indenture with the same effect as if such successor corporation or person had been named as us therein, and we will be released from all obligations under the Indenture.

Modification

Without the consent of any holder of notes, the trustee for such notes and we may enter into one or more supplemental indentures for any of the following purposes:

- to supply omissions, cure any ambiguity or inconsistency or correct defects, which actions, in each case, are not prejudicial to the interests of the holders of notes of any series in any material respect;
- to change or eliminate any provision of the Indenture, provided that any such change or elimination will become effective with respect to such series only when there is no note of such series outstanding created prior to the execution of such supplemental indenture which is entitled to the benefit of such provision, or such change or elimination is applicable only to notes of such series issued after the effective date of such change or elimination;
- to establish the form or terms of notes of any series as permitted by the Indenture;
- to evidence the succession of another corporation to us, and the assumption of our covenants in the Indenture and the notes by any permitted successor;
- to grant to or confer upon the trustee for any notes for the benefit of the holders of such notes, any additional rights, remedies, powers or authority;
- to permit the trustee for any notes to comply with any duties imposed upon it by law;
- to specify further the duties and responsibilities of, and to define further the relationship among, the trustee for any notes, any authenticating agent and any paying agent, and to evidence the succession of a successor trustee as permitted under the Indenture;

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- to add to our covenants for the benefit of the holders of all or any series of outstanding notes, to add to the security of all notes, to surrender any right or power conferred upon us by the Indenture or to add any additional events of default with respect to all or any series of outstanding notes; and
- to make any other change that is not prejudicial to the holders of any notes.

Except as provided above, and except as otherwise provided in the applicable prospectus supplement, the consent of the holders of a majority in aggregate principal amount of the notes of all series then outstanding, considered as one class, is required for the purpose of adding any provisions to, or changing in any manner, or eliminating any of the provisions of, the Indenture pursuant to one or more supplemental indentures or of modifying or waiving in any manner the rights of the holders of the notes; provided, however, that if less than all of the series of notes outstanding are directly affected by a proposed supplemental indenture, then the consent only of the holders of a majority in aggregate principal amount of the outstanding applicable notes of all series so directly affected, considered as one class, will be required.

Notwithstanding the foregoing, no such amendment or modification may, without the consent of each holder of outstanding notes affected thereby:

- change the maturity date of the principal of any note;
- reduce the rate of interest or change the method of calculating such rate, or extend the time of payment of interest, on any note;
- reduce the principal amount of, or premium payable on, any note;
- change the coin or currency of any payment of principal of, or any premium or interest on any note;
- change the date on which any note may be redeemed or adversely affect the rights of a holder to institute suit for the enforcement of any payment of principal of or any premium or interest on any note; or
- modify the foregoing requirements or reduce the percentage of outstanding notes necessary to modify or amend the Indenture or to waive any past default.

A supplemental indenture which changes or eliminates any covenant or other provision of the Indenture which has expressly been included solely for the benefit of one or more series of notes, or which modifies the rights of the holders of notes of such series with respect to such covenant or provision, will be deemed not to affect the rights under the Indenture of the holders of the notes of any other series.

Events of Default

Unless specifically deleted in a supplemental indenture or board of directors resolution under which a series of notes is issued, or modified in any such supplemental indenture, each of the following will constitute an event of default under the Indenture with respect to notes of any series:

- failure to pay interest on the notes of such series within 30 days after the same becomes due and payable;
- failure to pay principal of or premium, if any, on any note of such series, as the case may be, within one day after the same becomes due and payable;
- failure to perform or breach of any of our other covenants or warranties in the Indenture (other than a covenant or warranty solely for the benefit of one or more series of notes other than such series) for 60 days after written notice to us by the trustee or to us and the trustee by the holders of at least 33% in aggregate principal amount of the outstanding applicable notes of such series;
- certain events of bankruptcy, insolvency, reorganization, assignment or receivership; or
- any other event of default specified in the applicable prospectus supplement with respect to notes of a particular series.

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No event of default with respect to the notes of a particular series necessarily constitutes an event of default with respect to the notes of any other series issued under the Indenture.

If an event of default with respect to any series of notes occurs and is continuing, then either the trustee for such series or the holders of a majority in aggregate principal amount of the outstanding notes of such series, by notice in writing, may declare the principal amount of and interest on all of the notes of such series to be due and payable immediately; provided, however, that if an event of default occurs and is continuing with respect to more than one series of notes under the Indenture, the trustee for such series or the holders of a majority in aggregate principal amount of the outstanding notes of all such series, considered as one class, may make such declaration of acceleration and not the holders of the notes of any one of such series.

At any time after an acceleration with respect to the notes of any series has been declared, but before a judgment or decree for the payment of the money due has been obtained, the event or events of default giving rise to such acceleration will be waived, and the acceleration will be rescinded and annulled, if

- we pay or deposit with the trustee for such series a sum sufficient to pay all matured installments of interest on all notes of such series, the principal of and premium, if any, on the notes of such series which have become due otherwise than by acceleration and interest thereon at the rate or rates specified in such notes, interest upon overdue installments of interest at the rate or rates specified in such notes, to the extent that payment of such interest is lawful, and all amounts due to the trustee for such series under the Indenture; and
- any other event or events of default with respect to the notes of such series, other than the nonpayment of the principal of and accrued interest on the notes of such series which has become due solely by such acceleration, have been cured or waived as provided in the Indenture.

However, no such waiver or rescission and annulment shall extend to or shall affect any subsequent default or impair any related right.

Subject to the provisions of the Indenture relating to the duties of the trustee in case an event of default shall occur and be continuing, the trustee generally will be under no obligation to exercise any of its rights or powers under the Indenture at the request or direction of any of the holders unless such holders have offered to the trustee reasonable security or indemnity satisfactory to it. Subject to such provisions for the indemnification of the trustee and certain other limitations contained in the Indenture, the holders of a majority in aggregate principal amount of the outstanding notes of any series will have the right to direct the time, method and place of conducting any proceeding for any remedy available to the trustee, or of exercising any trust or power conferred on the trustee, with respect to the notes of that series; provided, however, that if an event of default occurs and is continuing with respect to more than one series of notes, the holders of a majority in aggregate principal amount of the outstanding notes of all those series, considered as one class, will have the right to make such direction, and not the holders of the notes of any one series. Any direction provided by the holders shall not be in conflict with any rule of law or with the Indenture and will not involve the trustee in personal liability in circumstances where reasonable indemnity would not, in the trustee's sole discretion, be adequate and the trustee may take any other action it deems proper that is not inconsistent with such direction.

The holders of a majority in aggregate principal amount of the outstanding notes of any series may waive any past default under the Indenture on behalf of all holders of notes of that series with respect to the notes of that series, except a default in the payment of principal of or any premium or interest on such notes. No holder of notes of any series may institute any proceeding with respect to the Indenture, or for the appointment of a receiver or a trustee, or for any other remedy, unless such holder has previously given to the trustee for such series written notice of a continuing event of default with respect to the notes of such series, the holders of a majority in aggregate principal amount of the outstanding notes of all series in respect of which an event of default has occurred and is continuing, considered as one class, have made written request to the trustee for such series to institute such proceeding and have offered such reasonable indemnity as the trustee may require, and the trustee for such series has failed to institute such proceeding within 60 days after such notice, request and offer. Furthermore, no holder of notes of any series will be entitled to institute any such action if and to the extent that such action would disturb or prejudice the rights of other holders of those notes.

Notwithstanding the foregoing, each holder of notes of any series has the right, which is absolute and unconditional, to receive payment of the principal of and premium, if any, and interest on such notes when due and to institute suit for the enforcement of any such payment, and such rights may not be impaired without the consent of that holder of notes.

The trustee, within 90 days after it receives notice of the occurrence of a default with respect to the notes of any series, is required to give the holders of the notes of that series notice of such default, unless cured or waived, but, except in the case of default in the payment of principal of, or premium, if any, or interest on, the notes of that series, the trustee may withhold such notice if it determines in good faith that it is in the interest of such holders to do so. We will be required to deliver to the trustees for the notes each year a certificate as to whether or not, to the knowledge of the officers signing such certificate, we are in compliance with all conditions and covenants under the Indenture, determined without regard to any period of grace or requirement of notice under the Indenture.

Defeasance and Discharge

Unless the applicable prospectus supplement states otherwise, we may elect either:

1. to defease and be discharged from any and all obligations in respect of the notes of any series then outstanding under the Indenture (except for certain obligations to register the transfer or exchange of the notes of such series, replace stolen, lost or mutilated notes, maintain paying agencies and hold monies for payment in trust); or
2. to be released from the obligations of the Indenture with respect to the notes of any series under any covenants applicable to the notes of such series which are subject to covenant defeasance as described in the Indenture, supplemental indenture or other instrument establishing such series.

In the case of either (1) or (2), the following conditions must be met:

- we will be required to deposit, in trust, with the trustee money or U.S. government obligations, which through the payment of interest on those obligations and principal of those obligations in accordance with their terms will provide money, in an amount sufficient, without reinvestment, to pay all the principal of, premium, if any, and interest on the notes of such series on the dates payments are due (which may include one or more redemption dates designated by us),
- no event of default or event which with the giving of notice or lapse of time, or both, would become an event of default under the Indenture must have occurred and be continuing on the date of the deposit, and 91 days must have passed after the deposit has been made and, during that period, certain events of default must not have occurred and be continuing as of the end of that period,
- the deposit must not cause the trustee to have any conflicting interest with respect to our other securities,
- we must have delivered an opinion of counsel to the effect that the holders will not recognize income, gain or loss for federal income tax purposes (and, in the case of paragraph (1) above, such opinion of counsel must be based on a ruling of the Internal Revenue Service or other change in applicable federal income tax law) as a result of the deposit or defeasance and will be subject to federal income tax in the same amounts, in the same manner and at the same times as if the deposit and defeasance had not occurred, and
- we must have delivered an officer's certificate to the trustee as provided in the Indenture.

We may exercise our defeasance option under paragraph (1) with respect to notes of any series notwithstanding our prior exercise of our covenant defeasance option under paragraph (2). If we exercise our defeasance option for notes of any series, payment of the notes of such series may not be accelerated because of a subsequent event of default. If we exercise our covenant defeasance option for notes of any series, payment of the notes of such series may not be accelerated by reference to a subsequent breach of any of the covenants noted under clause (2) in the preceding paragraph. In the event we fail to comply with our

remaining obligations with respect to the notes of any series under the Indenture after exercising our covenant defeasance option and the notes of such series are declared due and payable because of the subsequent occurrence of any event of default, the amount of money and U.S. government obligations on deposit with the trustee may be insufficient to pay amounts due on the notes of such series at the time of the acceleration resulting from that event of default. However, we will remain liable for those payments.

Resignation or Removal of Trustee

The trustee may resign at any time upon written notice to us specifying the day upon which the resignation is to take effect and such resignation will take effect immediately upon the later of the appointment of a successor trustee and such specified day. The trustee may be removed at any time with respect to notes of any series by an instrument or concurrent instruments in writing filed with the trustee and signed by the holders, or their attorneys-in-fact, of a majority in aggregate principal amount of that series of notes then outstanding. In addition, so long as no event of default or event which, with the giving of notice or lapse of time or both, would become an event of default has occurred and is continuing, we may remove the trustee upon notice to the holder of each note outstanding and the trustee, and appoint a successor trustee.

Concerning the Trustee

As of December 31, 2007, the trustee and its affiliates were the trustee for \$1,005.3 million of our secured and unsecured debt under twelve separate indentures, including Environmental Improvement Revenue Refunding debt issued by certain governmental entities. In addition, an affiliate of the trustee is one of the lenders under credit agreements with us and our parent under which an aggregate of \$1 billion may be borrowed. An affiliate of the trustee is also a depository for funds and performs other services for, and transacts other banking business with our affiliates and us in the normal course and may do so in the future. The Indenture provides that our obligations to compensate the trustee and reimburse the trustee for expenses, disbursements and advances will be secured by a lien prior to that of the notes upon the property and funds held or collected by the trustee as such, except funds held in trust for the benefit of the holders of particular notes.

Governing Law

The Indenture and the related notes will be governed by New York law.

DESCRIPTION OF GENERAL MORTGAGE BONDS

We will issue each series of general mortgage bonds under the General Mortgage Indenture and Deed of Trust, dated as of December 1, 1986, as supplemented from time to time, executed by the Company to UMB Bank, N.A. (formerly United Missouri Bank of Kansas City, N.A.), as trustee. We refer in this prospectus to the general mortgage bonds as the “mortgage bonds,” to the mortgage as the “Mortgage Indenture” and to UMB Bank, N.A. as the “Mortgage Trustee.”

We have summarized selected provisions of the Mortgage Indenture below. However, the following statements are an outline only, do not purport to be complete, and are qualified in their entirety by reference to the Mortgage Indenture (copies of which are filed as exhibits to the registration statement of which this prospectus is a part). This outline incorporates by reference certain articles and sections of the Mortgage Indenture specifically enumerated below and is qualified in its entirety by such reference. Certain of the terms used below are used in this prospectus with the meanings ascribed to such terms by the Mortgage Indenture.

The following sets forth certain general terms and provisions of the mortgage bonds. The particular terms of the series of mortgage bonds offered by any prospectus supplement will be described in that prospectus supplement. Any terms of the mortgage bonds that are not summarized herein will be described in the applicable prospectus supplement.

Security and Priority

The Company’s principal plants and properties, insofar as they constitute real estate, are owned; certain other facilities of the Company are located on premises held by the Company under leases, permits or easements; and the Company’s electric transmission and distribution lines and systems (which constitute a substantial portion of the Company’s investment in physical property) are for the most part located over or under highways, streets, other public places or property owned by others for which permits, grants, easements, licenses or franchises (deemed satisfactory but without examination of underlying land titles) have been obtained.

The Mortgage Indenture constitutes a first mortgage lien upon substantially all of the fixed property and franchises of the Company (except property which is released from the lien of the Mortgage Indenture, as described below), consisting principally of electric generating plants, electric transmission and distribution lines and systems, and buildings, subject to encumbrances permitted under the Mortgage Indenture. (*Mortgage Indenture Section 1.03(ff).*) The Mortgage Indenture subjects to the lien thereof property, of the character initially mortgaged, which is acquired by the Company subsequent to December 1, 1986. Such after-acquired property may be subject to prior liens which secure debt outstanding at the time of such acquisition in an amount not in excess of 75% of the cost or fair value, whichever is less, of such after-acquired property at such time. (*Mortgage Indenture Section 1.03(ff)(xv).*)

The property excepted from the lien of the Mortgage Indenture consists principally of: cash and securities (unless deposited with the Mortgage Trustee); accounts receivable; contracts and operating agreements not pledged or required to be pledged with the Mortgage Trustee; equipment, spare parts, tools, materials, supplies and fuel held for sale or lease in the ordinary course of business or for use or consumption in, or the operation of, any properties of, or for the benefit of, the Company, or held in advance of use thereof for maintenance or fixed capital purposes; electricity, gas, steam, water, ice and other materials, products or services for sale, distribution or use; vehicles; leasehold interests and leasehold improvements; minerals and mineral rights; nuclear fuel, cores and materials; communications equipment, computers and office furniture; and other real and personal property which is not an integral part of the electric and any steam generating, transmission and distribution operations of the Company. (*Mortgage Indenture Section 1.03(s).*)

The mortgage bonds will rank equally and ratably (except as to sinking funds and other analogous funds established for the exclusive benefit of a particular series) with all mortgage bonds, regardless of series, from time to time issued and outstanding under the Mortgage Indenture.

The Mortgage Indenture provides that the Mortgage Trustee shall have a lien on the mortgaged property, prior to the mortgage bonds, for the payment of its reasonable compensation and expenses and for indemnity against certain liabilities. (*Mortgage Indenture Section 14.09.*)

Issuance of Additional Mortgage Bonds

The maximum principal amount of mortgage bonds which may be issued under the Mortgage Indenture is not limited. Mortgage bonds of any series may be issued from time to time in principal amounts:

- not exceeding 75% of the amount of unbonded “bondable property;”
- equal to the principal amount of mortgage bonds and “prior lien bonds” which have been retired or purchased or acquired by the Company since the date of the Mortgage Indenture or are then being retired or purchased or acquired by the Company, and which have not theretofore been bonded; or
- equal to the amount of cash deposited with the Mortgage Trustee for such purpose.

(Mortgage Indenture Articles III, IV, V and VI.)

“Bondable property” includes: the Company’s electric and any steam generating, transmission and distribution properties; construction work in progress; property in the process of purchase to which the Company has legal title; fractional and undivided interests of the Company in certain property owned jointly or in common with other persons; engineering, financial, economic, environmental, geological and legal or other surveys, data processing equipment and software associated with the acquisition or construction of property; paving, grading and other improvements to property owned by others but used by the Company; and certain property owned by the Company located on property owned by others, including governments. (*Mortgage Indenture Section 1.03(h)*)

“Prior lien bonds” means any indebtedness secured by a lien ranking prior to, or on a parity with, the lien of the Mortgage Indenture. (*Mortgage Indenture Section 1.03(ii)*)

The amount of bondable property is the lesser of its cost or fair value determined in accordance with generally accepted accounting principles in effect at December 1, 1986 or, at the option of the Company, at the date of their determination, minus 133¹/₃% of the principal amount of all prior lien bonds which are (a) outstanding and secured by a prior lien on bondable property owned by the Company at December 1, 1986, and (b) outstanding and secured by a prior lien, other than due solely to an after-acquired property clause, on bondable property at the date of its acquisition by the Company after such date. (*Mortgage Indenture Section 1.03(h).*) In determining generally accepted accounting principles, the Company may conform to accounting orders from any governmental regulatory commission. (*Mortgage Indenture Section 1.03(u).*)

Withdrawal of Certain Cash

Cash deposited with the Mortgage Trustee as a basis for the issue of additional mortgage bonds may be withdrawn by the Company in the amount of 75% of the lesser of the cost or fair value of unbonded bondable property that is bonded, after deducting 133¹/₃% of the principal amount of all prior lien bonds which are (a) outstanding and secured by a prior lien on such bondable property owned by the Company at December 1, 1986, and (b) outstanding and secured by a prior lien, other than due solely to an after-acquired property clause, on bondable property at the date of its acquisition by the Company after such date.

Any other cash deposited with the Mortgage Trustee may be withdrawn by the Company in the amount of:

- 100% of the lesser of the cost or fair value of unbonded bondable property that is bonded, after deducting 133¹/₃% of the principal amount of all prior lien bonds which are (a) outstanding and secured by a prior lien on such bondable property owned by the Company at December 1, 1986, and (b) outstanding and secured by a prior lien, other than due solely to an after-acquired property clause, on bondable property at the date of its acquisition by the Company after such date; or

- the principal amount of mortgage bonds and prior lien bonds which have been retired or purchased or acquired by the Company since the date of the Mortgage Indenture or are then being retired or purchased or acquired by the Company, and which have not theretofore been bonded.

(Mortgage Indenture Article XI.)

Release and Substitution of Property

Mortgaged property may be released from the lien of the Mortgage Indenture:

- if after such release the fair value of the remaining mortgaged property equals or exceeds a sum equal to 133 $\frac{1}{3}$ % of the aggregate principal amount of outstanding mortgage bonds and prior lien bonds outstanding; or
- if, with some limitations, the fair value of the mortgaged property to be released is less than $\frac{1}{2}$ of 1% of the aggregate principal amount of mortgage bonds and prior lien bonds outstanding, provided that the aggregate fair value of mortgaged property released in this manner in any period of 12 consecutive calendar months shall not exceed 1% of the aggregate principal amount of the outstanding mortgage bonds and prior lien bonds outstanding; or
- on the basis of (a) the deposit of cash, governmental obligations or purchase money obligations, (b) bondable property to be acquired by the Company with the proceeds of, or otherwise in connection with, such release, or (c) a waiver of the right to issue mortgage bonds on the basis of mortgage bonds or prior lien bonds which have been retired or purchased or acquired by the Company after December 1, 1986, and have not theretofore been bonded.

(Mortgage Indenture Article X.)

Events of Default

The Mortgage Indenture provides generally that a default occurs upon:

- failure for 90 days to pay interest when due on any mortgage bonds;
- failure to pay when due the principal of, and premium, if any, on any mortgage bonds issued under the Mortgage Indenture or the principal of, premium, if any, or interest on any outstanding prior lien bonds, beyond any specified grace period;
- failure to perform or observe for 90 days after notice of such failure any other of the covenants or conditions of the Company in the Mortgage Indenture, any applicable supplemental indenture, or any of the mortgage bonds issued under the Mortgage Indenture or any applicable supplemental indenture; and
- the occurrence of insolvency, bankruptcy, receivership or similar events.

In case of default, the Mortgage Trustee or the holders of a majority in principal amount of the outstanding mortgage bonds may declare the principal of and interest on all mortgage bonds to be immediately due and payable, but the holders of a majority in principal amount of the outstanding mortgage bonds may rescind such declaration if such default has been cured. (*Mortgage Indenture Sections 12.02 and 12.04.*)

The Company is required to file with the Mortgage Trustee such information, documents and reports with respect to compliance by the Company with the conditions and covenants of the Mortgage Indenture as may be required by the rules and regulations of the SEC. (*Mortgage Indenture Section 17.02.*) The Company is not required to furnish any statement as to the absence of any default.

Modification of the Mortgage Indenture

In general, modifications or alterations of the Mortgage Indenture and any applicable supplemental indenture and of the rights or obligations of the Company and of the bondholders, as well as waivers of compliance with the Mortgage Indenture (including any applicable supplemental indenture) may be made, with

the consent of the holders of a majority in principal amount of the outstanding mortgage bonds affected by the proposed action, if approved by the Company. Provisions relating to such modifications or alterations and waivers of compliance are subject to certain restrictions designed to safeguard the positions of the bondholders and the Mortgage Trustee with respect to certain matters of basic importance, including payment of principal of and interest and premium (if any) on mortgage bonds and creation of liens ranking prior to or on a parity with the lien of the Mortgage Indenture as to any mortgaged property. (*Mortgage Indenture Section 12.24 and Article XV.*)

Concerning the Mortgage Trustee

The Company and its officers and directors have no material relationships with the Mortgage Trustee except that

- the Company maintains general banking accounts with the Mortgage Trustee and
- the Mortgage Trustee is one of the lenders under credit agreements with us and our parent aggregating \$1 billion.

The Mortgage Indenture provides that the holders of a majority in principal amount of the outstanding mortgage bonds have the right to require the Mortgage Trustee to take certain action on behalf of the bondholders, but under certain circumstances the Mortgage Trustee may decline to follow such directions or to exercise certain of its powers. (*Mortgage Indenture Section 12.05.*) Prior to taking any such action the Mortgage Trustee is entitled to indemnity satisfactory to the Mortgage Trustee against costs, expenses and liabilities which may be incurred in the course of such action. (*Mortgage Indenture Section 12.16.*) This right does not, however, impair the absolute right of any holder of mortgage bonds to enforce payment of the principal of, premium, if any, and interest on such mortgage bonds when due. (*Mortgage Indenture Section 12.23.*) The Company has the right to remove the Mortgage Trustee and appoint a successor Mortgage Trustee not more frequently than once in any ten-year period. (*Mortgage Indenture Section 14.18.*)

BOOK-ENTRY SYSTEM

Unless otherwise indicated in the applicable prospectus supplement, each series of bonds or notes initially be issued in the form of one or more global securities, in registered form, without coupons. The global security will be deposited with, or on behalf of, the depository, and registered in the name of the depository or a nominee of the depository. Unless otherwise indicated in the applicable prospectus supplement, the depository for any global securities will be The Depository Trust Company, or DTC.

DTC will act as depository for the global securities. The global securities will be issued as fully-registered securities registered in the name of Cede & Co., DTC's partnership nominee, or such other name as may be requested by an authorized representative of DTC. One fully-registered global security certificate will be issued for each issue of the global securities, each in the aggregate principal amount of such issue, and will be deposited with DTC. If, however, the aggregate principal amount of any issue of a series of bonds or notes exceeds \$500 million, one certificate will be issued with respect to each \$500 million of principal amount and an additional certificate will be issued with respect to any remaining principal amount of such issue.

The following descriptions of operations and procedures of DTC are provided solely as a matter of convenience. These operations and procedures are solely within DTC's control and are subject to changes by DTC from time to time. We take no responsibility for these operations and procedures and urge you to contact DTC or its participants directly to discuss these matters. DTC has advised us as follows:

- DTC is a limited-purpose trust company organized under the New York Banking Law, a "banking organization" within the meaning of the New York Banking Law, a member of the Federal Reserve System, a "clearing corporation" within the meaning of the New York Uniform Commercial Code, and a "clearing agency" registered pursuant to the provisions of Section 17A of the Securities Exchange Act of 1934.
- DTC holds and provides asset servicing for securities that its direct participants deposit with DTC. DTC also facilitates the post-trade settlement among direct participants of sales and other securities transactions in deposited securities through electronic computerized book-entry transfers and pledges between direct participants' accounts. This eliminates the need for physical movement of securities certificates.
- Direct participants include both U.S. and non-U.S. securities brokers and dealers, banks, trust companies, clearing corporations and certain other organizations.
- DTC is a wholly-owned subsidiary of The Depository Trust & Clearing Corporation, or DTCC. DTCC, in turn, is owned by a number of direct participants of DTC and Members of the National Securities Clearing Corporation, Fixed Income Clearing Corporation, and Emerging Markets Clearing Corporation, each also a subsidiary of DTCC, as well as by the New York Stock Exchange, Inc., the American Stock Exchange LLC, and the National Association of Securities Dealers, Inc.
- Access to the DTC system is also available to others such as both U.S. and non-U.S. securities brokers and dealers, banks, trust companies and clearing corporations that clear through or maintain a custodial relationship with a direct participant, either directly or indirectly, which are referred to as indirect participants and, together with the direct participants, the participants. The underwriters, dealers or agents of any of the securities may be direct participants of DTC.
- DTC has Standard & Poor's highest rating: AAA. The DTC rules applicable to its participants are on file with the SEC. More information about DTC can be found at www.dtcc.com and www.dtc.org.

Purchases of global securities under the DTC system must be made by or through direct participants, which will receive a credit for such purchases of global securities on DTC's records. The ownership interest of each actual purchaser of each global security, or the beneficial owner, is in turn to be recorded on the direct and indirect participants' records. Beneficial owners will not receive written confirmation from DTC of their purchase. Beneficial owners are, however, expected to receive written confirmations providing details of the

transaction, as well as periodic statements of their holdings, from the direct or indirect participant through which the beneficial owner entered into the transaction. Transfers of ownership interests in the global securities are to be accomplished by entries made on the books of direct and indirect participants acting on behalf of beneficial owners. Beneficial owners will not receive certificates representing their ownership interests in the global securities, except in the event that use of the book-entry system for the global securities is discontinued.

To facilitate subsequent transfers, all global securities deposited by direct participants with DTC are registered in the name of DTC's partnership nominee, Cede & Co. or such other name as may be requested by an authorized representative of DTC. The deposit of global securities with DTC and their registration in the name of Cede & Co. or such other nominee do not effect any change in beneficial ownership. DTC has no knowledge of the actual beneficial owners of the global securities; DTC's records reflect only the identity of the direct participants to whose accounts such global securities are credited, which may or may not be the beneficial owners. The participants will remain responsible for keeping account of their holdings on behalf of their customers.

Conveyance of notices and other communications by DTC to direct participants, by direct participants to indirect participants, and by direct participants and indirect participants to beneficial owners will be governed by arrangements among them, subject to any statutory or regulatory requirements as may be in effect from time to time. Beneficial owners of global securities may wish to take certain steps to augment transmission to them of notices of significant events with respect to the global securities, such as redemptions, tenders, defaults, and proposed amendments to the security documents. For example, beneficial owners of global securities may wish to ascertain that the nominee holding the global securities for their benefit has agreed to obtain and transmit notices to beneficial owners; in the alternative, beneficial owners may wish to provide their names and addresses to the registrar and request that copies of the notices be provided directly to them.

If the global securities are redeemable, redemption notices shall be sent to DTC. If less than all of the global securities within an issue are being redeemed, DTC's practice is to determine by lot the amount of the interest of each direct participant in such issue to be redeemed.

Neither DTC nor Cede & Co. (nor any other DTC nominee) will consent or vote with respect to the global securities unless authorized by a direct participant in accordance with DTC's procedures. Under its usual procedures, DTC mails an omnibus proxy to us as soon as possible after the record date. The omnibus proxy assigns Cede & Co.'s consenting or voting rights to those direct participants whose accounts the global securities are credited on the record date, identified in a listing attached to the omnibus proxy.

Principal, interest and premium payments, if any, on the global securities will be made to Cede & Co., or such other nominee as may be requested by an authorized representative of DTC. DTC's practice is to credit direct participants' accounts upon DTC's receipt of funds and corresponding detail information from us or the Trustee, on the payable date in accordance with the respective holdings shown on DTC's records. Payments by participants to beneficial owners will be governed by standing instructions and customary practices, as is the case with securities held for the accounts of customers in bearer form or registered in "street name," and will be the responsibility of such participant and not of DTC, its nominee, the Trustee, or us, subject to any statutory or regulatory requirements as may be in effect from time to time. Payment of principal, interest and premium, if any, on any of the aforementioned securities represented by global securities to Cede & Co. (or such other nominee as may be requested by an authorized representative of DTC) is the responsibility of the Trustee and us. Disbursement of such payments to direct participants will be the responsibility of DTC, and disbursement of such payments to the beneficial owners will be the responsibility of the participants.

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DTC may discontinue providing its services as securities depository with respect to the global securities at any time by giving reasonable notice to us or the Trustee. Under such circumstances, in the event that a successor securities depository is not obtained, certificates representing the securities are required to be printed and delivered.

The information in this section concerning DTC and DTC's book-entry system has been obtained from sources, including DTC, that we believe to be reliable, but we take no responsibility for the accuracy thereof.

None of the Trustee, any successor trustee, us or any agent for payment on or registration of transfer or exchange of any global security will have any responsibility or liability for any aspect of the records relating to or payments made on account of beneficial interests in such global security or for maintaining, supervising or reviewing any records relating to such beneficial interests.

PLAN OF DISTRIBUTION

We may sell the securities in one or more of the following ways from time to time: (i) to underwriters for resale to the public or to institutional investors; (ii) directly to institutional investors; or (iii) through agents to the public or to institutional investors. The prospectus supplement with respect to each series of securities will set forth the terms of the offering of such securities, including the name or names of any underwriters or agents, the purchase price of such securities, and the proceeds to us from such sale, any underwriting discounts or agency fees and other items constituting underwriters' or agents' compensation, any initial public offering price, any discounts or concessions allowed or reallocated or paid to dealers and any securities exchange on which such securities may be listed.

If underwriters participate in the sale, such securities will be acquired by the underwriters for their own account and may be resold from time to time in one or more transactions, including negotiated transactions, at a fixed public offering price or at varying prices determined at the time of sale. The securities may be offered to the public either through underwriting syndicates represented by one or more managing underwriters or directly by one or more of those firms. The specific managing underwriter or underwriters, if any, will be named in the prospectus supplement relating to the particular securities together with the members of the underwriting syndicate, if any.

Unless otherwise set forth in the applicable prospectus supplement, the obligations of the underwriters to purchase any series of securities will be subject to certain conditions precedent and the underwriters will be obligated to purchase all of such securities being offered, if any are purchased.

We may sell the securities directly or through agents we designate from time to time. The applicable prospectus supplement will set forth the name of any agent involved in the offer or sale of the securities in respect of which such prospectus supplement is delivered and any commissions payable by us to such agent. Unless otherwise indicated in the applicable prospectus supplement, any agent will be acting on a best efforts basis for the period of its appointment.

Underwriters and agents may be entitled under agreements entered into with us to indemnification against certain civil liabilities, including liabilities under the Securities Act of 1933, as amended. Underwriters and agents may engage in transactions with, or perform services for, us in the ordinary course of business.

Each series of securities will be a new issue of securities and will have no established trading market. Any underwriters to whom securities are sold for public offering and sale may make a market in such securities, but such underwriters will not be obligated to do so and may discontinue any market making at any time without notice. The securities may or may not be listed on a national securities exchange.

LEGAL MATTERS

Unless otherwise specified in the applicable prospectus supplement, legal matters with respect to the securities offered under this prospectus will be passed upon for us by Mark English, General Counsel and Assistant Corporate Secretary of our parent, Great Plains Energy Incorporated, and Sidley Austin LLP, Chicago, Illinois, and for the underwriters, dealers, purchasers or agents by Davis Polk & Wardwell, Menlo Park, California. At February 15, 2008, Mr. English owned beneficially 6,718 shares of our common stock, including restricted stock, and 4,424 performance shares, which may be paid in shares of common stock at a later date based on the performance of our parent.

EXPERTS

The consolidated financial statements, the related financial statement schedules, and the effectiveness of internal control over financial reporting of Kansas City Power & Light Company and its subsidiaries, incorporated by reference in this prospectus from the Annual Report on Form 10-K of Kansas City Power & Light Company for the year ended December 31, 2007, have been audited by Deloitte & Touche LLP, an independent registered public accounting firm, as stated in their reports (which reports (1) express an unqualified opinion on the consolidated financial statements and financial statement schedules and include an explanatory paragraph regarding the adoption of new accounting standards SFAS No. 158, *Employers' Accounting for Defined Benefit Pension and Other Postretirement Plans — an amendment of FASB Statements*

No. 87, 88, 106, and 132(R) and FIN No. 48, *Accounting for Uncertainty in Income Taxes — an interpretation of FASB Statement No. 109*, and (2) express an unqualified opinion on the Company's internal control over financial reporting), which are incorporated herein by reference, and have been so incorporated in reliance upon the reports of such firm given upon their authority as experts in accounting and auditing.

WHERE YOU CAN FIND MORE INFORMATION

We file annual, quarterly and current reports and other information with the SEC through the SEC's Electronic Data Gathering, Analysis and Retrieval system and these filings are publicly available through the SEC's website (<http://www.sec.gov>). You may read and copy such material at the Public Reference Room of the SEC at 100 F Street, N.E., Washington, D.C. 20549. You may obtain information on the operation of the Public Reference Room by calling the SEC at 1-800-SEC-0330.

The SEC allows us to "incorporate by reference" into this prospectus the information we file with it. This means that we can disclose important information to you by referring you to the documents containing the information. The information we incorporate by reference is considered to be included in and an important part of this prospectus and should be read with the same care. Information that we file later with the SEC that is incorporated by reference into this prospectus will automatically update and supersede this information. We are incorporating by reference into this prospectus the following documents that we have filed with the SEC and any subsequent filings we make with the SEC under Sections 13(a), 13(c), 14 or 15(d) of the Securities Exchange Act of 1934 (excluding information deemed to be furnished and not filed with the SEC) until the offering of the securities described in this prospectus is completed:

- Our Annual Report on Form 10-K for the year ended December 31, 2007; and
- Our Current Reports on Form 8-K dated:
 - January 31, 2008 and filed with the SEC on January 31, 2008;
 - February 20, 2008 and filed with the SEC on February 21, 2008; and
 - February 25, 2008 (Item 8.01 only) and filed with the SEC on February 26, 2008.

We and our parent company, Great Plains Energy Incorporated, separately filed the combined Annual Report on Form 10-K, Quarterly Reports on Form 10-Q and the Current Reports on Form 8-K listed above. However, the information contained in those combined reports relating solely to our parent and its subsidiaries (other than KCP&L and its consolidated subsidiaries), including Strategic Energy, was separately filed by Great Plains Energy Incorporated on its behalf, and the information contained in those combined reports relating solely to KCP&L and its consolidated subsidiaries was separately filed by us. We do not intend to incorporate by reference into this prospectus the information relating to Great Plains Energy Incorporated and its subsidiaries (other than KCP&L and its consolidated subsidiaries), and we make no representation as to the information relating to Great Plains Energy Incorporated and its subsidiaries (other than KCP&L and its consolidated subsidiaries) contained in such combined reports. The only information you should rely upon in determining whether to invest in the securities offered hereby is the information of KCP&L and its consolidated subsidiaries contained in this prospectus, the information separately provided by KCP&L and its consolidated subsidiaries in the documents incorporated by reference herein and any free writing prospectus used in connection with the offering of securities described in this prospectus.

Our website is www.kcpl.com. Information contained on our website is not incorporated herein. We make available, free of charge, on or through our website, our annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K, and amendments to those reports filed or furnished pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 as soon as reasonably practicable after we electronically file such material with, or furnish it to, the SEC. In addition, we make available on or through our website all other reports, notifications and certifications filed electronically with the SEC. You may obtain a free copy of our filings with the SEC by writing or telephoning us at the following address: Kansas City Power & Light Company, 1201 Walnut Street, Kansas City, Missouri 64106-2124 (Telephone No.: 816-556-2200), Attention: Corporate Secretary, or by contacting us on our website.



Kansas City Power & Light Company

% General Mortgage Bonds, Series 2009A due

PROSPECTUS SUPPLEMENT

March , 2009

Joint Book-Running Managers

Banc of America Securities LLC

BNP PARIBAS

J.P. Morgan

Senior Co-Manager

Mitsubishi UFJ Securities

Co-Managers

BNY Mellon Capital Markets, LLC

Wachovia Securities
