

WHITE PAPER

FOR

**VIRGINIA'S LOCAL
GOVERNMENTAL OFFICIALS
ON
ELECTRIC UTILITY
DEREGULATION**

Prepared by
Virginia Energy Purchasing Governmental Association
an association of local governments within Dominion Virginia Power's service territory

August 2006

ELECTRICITY DEREGULATION IN VIRGINIA

Why Local Governments Need to Be Concerned about
Ensuring Fair Pricing for Electricity in Virginia

Critique of Electricity Deregulation in Virginia

The assumptions that support deregulation have been undermined by actual experience

<i>The assumptions</i> <i>(why Virginia should proceed with deregulation)</i>	<i>The reality</i> <i>(why Virginia should reconsider deregulation)</i>
<p><i>#1 Competition is good ...</i> <i>Deregulation helps Virginia utilities become leaner, more efficient, and better able to compete.</i></p>	<p><i>...for enriching shareholders and penalizing customers.</i> <i>Deregulation gives utilities the opportunity to increase rates while earning excessive revenues.</i></p>
<p><i>#2 A deal is a deal...</i> <i>It is unfair to change the rules in the middle of the game.</i></p>	<p><i>...except when the utilities change the rules.</i> <i>The Restructuring Act has been selectively revised in ways that harm customers and help utilities.</i></p>
<p><i>#3 Many states are further along in deregulation...</i> <i>Virginia will suffer competitively if it fails to deregulate while surrounding states are deregulating.</i></p>	<p><i>...and have suffered severe consequences.</i> <i>Neighboring states illustrate that deregulation has been disastrous for customers while regulation has been beneficial for customers.</i></p>
<p><i>#4 Regulation is inefficient and sends the wrong price signals...</i> <i>The market will send the proper price signals for needed investment.</i></p>	<p><i>...when state regulation over retail rates is replaced by FERC regulation and PJM oversight over wholesale rates.</i> <i>The market is an invitation for price gouging.</i></p>
<p><i>#5 Deregulation is a win/win proposition...</i> <i>Competition, free markets, and customer choice will benefit everyone.</i></p>	<p><i>...for power producers and a lose/lose proposition for the general public.</i> <i>Producers earn record profits, consumers endure rate shock, and industry is crippled.</i></p>

SUMMARY OF CONTENTS

INTRODUCTION

Why is VEPGA interested in electricity deregulation?p.1
Why should VEPGA members be concerned about electricity deregulation?p.1
What is the ultimate goal?p.1

CRITIQUE

Critique #1: Competition is good . . . for enriching shareholders and penalizing customers

The principal arguments cited in favor of deregulation is that it fosters competition and enables Virginia utilities to become leaner, more efficient, and better able to compete. Unfortunately, this goal is achieved by having shareholders reap the benefits and forcing customers to bear the burdens of competition.p.2

Issues Addressed

- How did deregulation from the outset give utilities the opportunity to increase rates while costs are decreasing?p.2
- How have the rules governing deregulation been revised to give utilities even more opportunities to increase rates while their costs are decreasing?.....p.2
- Is there any evidence that DVP shareholders have benefited under capped rates at the expense of customers?p.3
- Doesn't DVP have a frozen fuel factor?p.3
- Do studies show net benefits from deregulation for DVP's customers?p.4
- What about DVP's claim that its rates are about the same today as they were 1993?p.4

Critique #2: A deal is a deal . . . except when the utilities change the rules.

Another argument cited in favor of retaining electricity deregulation is that it is unfair to change the rules in the middle of the game. This argument ignores the fact that the Restructuring Act has been selectively revised in ways that harm customers and help utilities.....p.5

Critique #3: Many states are further along in deregulation . . . and have suffered severe consequences

Virginia is headed down the same road traveled by neighboring states that have deregulated, with disastrous consequences for customers and the public in general in those states. It is still possible to change course because Virginia lawmakers ensured that Virginia retained jurisdiction over generation assets owned by Virginia utilities.p.8

Issues Addressed:

- What nearby states are further along the path to deregulation, and what has been their experience?p.8
- What nearby states are not taking the path to deregulation, and what has been their experience?p.9
- How do Virginia’s circumstances differ from those of nearby states?.....p.10
- Haven’t there been sharp rate increases in states that have not deregulated?.....p.10
- What about studies that conclude that deregulation generally has benefited consumers well beyond Virginia?.....p.11

Critique #4 Regulation is inefficient and sends the wrong price signals.....when state regulation over retail rates is replaced by FERC regulation and PJM oversight over wholesale rates.

Deregulation was supposed to result in efficiencies and innovations that would lower costs and offer consumers a broad range of options. In fact, prices have increased and a broad range of innovative options has failed to materializep.12

Issues Addressed:

- Were price benefits from deregulation premised on lower natural gas prices?p.12
- What role have organized markets played in the failure of deregulation to result in lower prices?p.12
- Why is it likely that current market structures will result in deregulated prices being higher than regulated prices?p.13
- Is there evidence that deregulation has failed to result in innovations?p.13

Critique #5 Deregulation is a win/win proposition . . . for power producers and a lose/lose proposition for the general public.

When evaluating deregulation, it is important to look closely at who favors it and who opposes it. Those supporting it are those who benefit from selling power at higher prices. Those opposing it are customers who suffer when the price of electricity is sold at above-cost rates. Electricity is an indispensable commodity for industrial, commercial, residential, and local government customers, and it really matters for economic development whether Virginia has excessively high prices.....p.14

Issues Addressed:

- Who are the winners under deregulation?p.14
- Who are the losers under deregulation?p.14
- Is there any evidence that deregulation has currently harmed Virginia customers?.....p.15
- Is there any evidence that Virginia utilities will accept cost of service rates?.....p.15

CONCLUSION

What should VEPGA members be doing?.....p.16

INTRODUCTION

Why is VEPGA interested in electricity deregulation?

The Virginia Energy Purchasing Governmental Association (VEPGA) is organized more formally than its predecessor, the VML/VACO Virginia Power Steering Committee, in order to take advantage of the opportunity to competitively purchase electricity after the Virginia Electric Utility Restructuring Act was enacted. Some critics of electric deregulation in Virginia have been portrayed as those having a vested interest in preserving the status quo. This is not true of VEPGA, which was organized specifically to take advantage of competitive purchase opportunities.

These opportunities have not met expectations. In fact, VEPGA has determined that electric deregulation will undermine its objective of obtaining reasonable rates for electricity service for its members. VEPGA has prepared this White Paper to educate its members about the implications of moving from cost of service pricing to market pricing for electricity procurement.

Why should VEPGA members be concerned about electricity deregulation?

Recent experience in neighboring states has demonstrated that customers must pay significantly more for electricity when they are forced to stop paying regulated rates based on the average costs of all units generating electricity and to start paying market rates based on the highest cost of the most expensive unit generating electricity.

Virginia is about to cross that threshold, but it is in a unique situation to avoid this rate shock because its largest utilities still own their generating units. Unlike many states that have deregulated, Virginia can pull back from the precipice and ensure that its citizens do not suffer rate shock by being exposed to market-based rates. At a time when all Virginians are acutely aware of the impact of free market rates on gasoline prices, local governments should understand the risks of exposing their budgets and their citizens to market-based rates if the General Assembly fails to amend or repeal electric deregulation in Virginia.

What is the ultimate goal?

Virginians should seek to have electricity prices set at rates that are fair to consumers and utilities. The cost-of-service approach sets rates based on a utility's costs to generate the electricity plus an amount needed for the utility to earn a reasonable profit. Deregulation was meant to encourage competition and innovation that ultimately would lower rates, but these goals have not been achieved. Now is not too early for VEPGA members to become educated on these issues, consider what action is appropriate by individual VEPGA members, and determine how best to implement such action. The political fallout in Maryland and Delaware in the past few months is a vivid example of how not to approach deregulation. Virginia has the opportunity to deliberately assess the likely impact of deregulation and act well before a crisis develops.

CRITIQUE

Critique #1: Competition is good . . . for enriching shareholders and penalizing customers.

Summary:

The principal arguments cited in favor of deregulation is that it fosters competition and enables Virginia utilities to become leaner, more efficient, and better able to compete. Unfortunately, this goal is achieved in many instances by giving shareholders the benefits and forcing customers to bear the burdens of competition. Deregulation allows utilities to increase rates even when they decrease their costs, and that's precisely what Virginia electric utilities have done. This does not mean utilities are doing anything improper: the utilities are charged with maximizing returns for their shareholders, and utility commissions are charged with looking out for customers' interests. Deregulation at the state level removes the oversight function of utility commissions, and the inevitable result to date is that shareholders often benefit at the expense of customers.

How did deregulation from the outset give utilities the opportunity to increase rates while their costs are decreasing?

When the Restructuring Act was enacted in 1999, one of its main features was “capped rates.” The basic premise of capped rates is that the base rates of utilities cannot exceed the rates in effect when deregulation became effective on July 1, 1999, but rates could be increased for fuel charges. This means that base rates are essentially frozen while all increases in fuel are passed along to customers.

Having customers bear the full brunt of fuel costs means that their rates are not truly “capped” at all: they are constantly increasing. Having frozen base rates means that when utilities increase the efficiencies of their operations, the resulting cost savings cannot be passed along to customers. Cutting costs cannot reduce customers' rates and could adversely impact customer service by reducing the number of customer service representatives, charging for services that were formerly free, or providing less frequent maintenance. In all instances, the full cost-saving benefits of these reduced costs are being passed along to shareholders.

This is a win/win situation for shareholders, who get to enjoy all the savings, and a lose/lose situation for customers, who pay all the costs.

How have the rules governing deregulation been revised to give utilities even more opportunities to increase rates while their costs are decreasing?

In the 2004 General Assembly session, the Restructuring Act was amended to permit increases in base rate cases for all Virginia utilities, except for Dominion Virginia Power (“DVP”), provided, however, that the rate case is initiated by the utility. The Act still prohibits the SCC from initiating a base rate case on its own or from initiating a rate case after receiving a

complaint from a customer or consumer advocate. This means that even if the SCC believes that a utility's base rates are excessive and need to be reduced to a more reasonable level, the Restructuring Act prohibits the SCC from initiating a rate case to reduce those rates. As a result, even base rates are no longer frozen: they become "floor" rates because the only times such rates get adjusted are when a utility files a rate case seeking to increase rates. The 2004 amendment allows any utility except DVP to file one general rate case prior to July 1, 2007, and another one between July 1, 2007, and December 31, 2010. In addition, such utilities may annually file for increases in their base rates for costs to comply with environmental regulations and certain costs for reliability. As a result of such multiple exceptions to the "capped" rates, American Electric Power ("AEP") will likely have three significant rate increases, all during 2006. Its first increase was a significant fuel factor increase of 3/10¢ per kWh effective January 1, 2006. Its second increase will be effective upon issuance of a final order in a pending environmental and reliability adjustment case. Its third increase will be an interim increase resulting from the filing of its general rate case application on May 3, 2006, which interim increase will be effective on October 2, 2006.

Is there any evidence that DVP shareholders have benefited under capped rates at the expense of customers?

DVP makes an annual financial filing (called an "annual informational filing," or "AIF") with the SCC, and the SCC Staff reviews it and issues a report. The SCC Staff recently completed its review of DVP's 2004 AIF. (The Staff has not, as of this time, reviewed DVP's 2005 AIF.) That review finds that, from 1998 through 2004, DVP had accumulated \$1.57 billion available for the recovery of costs that might be left unrecoverable as a result of deregulation (*i.e.*, so-called "stranded costs"). Because DVP has not experienced any "stranded costs," this is powerful evidence of excess earnings resulting from deregulation. DVP's unrecovered fuel expenses in 2005 (discussed below) have offset, but fallen well short, of this amount. It is clear that DVP has benefited greatly from the "capped rates" at the expense of its customers.

Doesn't DVP have a frozen fuel factor?

As initially enacted, the Restructuring Act provided for rate adjustments for a utility's recovery of its fuel costs to be an exception to "capped rates." Thus, DVP's fuel rate rose between 1999 and 2004 from 1.152¢ to 1.891¢ per kWh.

In 2004, the General Assembly amended the Restructuring Act by freezing DVP's fuel factor from January 1, 2004, through December 31, 2010, except for only one adjustment to be made on July 1, 2007, based upon the SCC's determination of projected fuel costs for DVP for the 42-month period between July 1, 2007, and December 31, 2010. DVP's actual fuel costs so far have exceeded its frozen fuel rate, and they are expected to do so through June 30, 2007. For that reason, customers have benefited from the frozen fuel rate.

Re-setting DVP's fuel rate for the period from July 1, 2007 to December 31, 2010, however, was likely to increase it sharply because of significant increases in fuel costs since the fuel factor was frozen as of January 1, 2004. Accordingly, in 2006, the General Assembly amended the Virginia Code provisions relating to the fuel factor to reinstate annual fuel factor

changes, commencing July 1, 2007, with traditional “true-ups,” or adjustments for prior over- or under-recovery of fuel costs. (No “true-up” is permitted for fuel costs prior to July 1, 2007.) The 2006 amendment allows the SCC to “phase-in” a portion of such an increase during the 42-month period between July 1, 2007 and December 31, 2010.

In sum, the fuel rate freeze has benefited DVP’s customers, but the freeze is temporary – it is scheduled to expire next year. In addition, the benefits from the fuel rate freeze have been more than offset by excessive non-fuel rates. The non-fuel, or “base,” rates continue in effect through 2010, and, as indicated above, those rates have been collecting revenue well in excess of DVP’s costs.

Do studies show net benefits from deregulation for DVP’s customers?

DVP has claimed that the “capped rates” are saving residential customers \$61 to \$74 annually. This claim is based on a study performed in 2002, and later updated in 2004, by Chmura Economics & Analytics (“Chmura”), a Richmond economic consulting firm, that was hired by DVP to study the impact of “capped rates” on residential utility consumers during the period in which “capped rates” will be in effect. The study is based on a macro-economic forecasting model. Thus it ignores the most basic fact of ratemaking: that the SCC sets rates to cover operating costs plus a reasonable return on the utility’s investment in assets that provide service. Instead of analyzing DVP’s costs in order to determine what its rates would have been if set by the SCC, the study estimates what DVP’s rates would have been on the basis of such factors as national employment rates and short-term national interest rates that have never been the basis for setting DVP’s rates.

Moreover, the study’s findings have been contradicted by the detailed annual reports on DVP’s costs and revenues conducted by the SCC Staff. These reports show that DVP’s “capped rates” have produced revenues significantly in excess of those that would have been produced by rates set by the SCC according to cost-of-service rate setting principles.

What about DVP’s claim that its rates are about the same today as they were 1993?

Whether DVP’s rates are higher or lower than they were in 1993 is irrelevant to whether electric deregulation, which was enacted in 1999, has benefited its customers. As discussed above, DVP’s rates are higher than they would have been in the absence of deregulation, and DVP’s shareholders have benefited greatly at its customers’ expense as a result. In any case, DVP’s current, base (non-fuel) rates resulted from a traditional SCC rate case, which was decided in 1998. That case resulted in an SCC order that substantially reduced DVP’s rates. Thus, the base rates that current customers now pay resulted from a rate reduction produced by traditional regulation, not deregulation, and, as discussed above, absent deregulation, such rates likely would have been lower still.

Critique #2: A deal is a deal . . . except when the utilities change the rules.

Summary:

Another argument cited in favor of retaining electricity deregulation is that it is unfair to change the rules in the middle of the game. This argument ignores the fact that, in each session of the General Assembly since the Restructuring Act was enacted, the Act has been selectively revised in ways that, all too often, harm customers and help utilities. Sometimes this process has been characterized as “mid course corrections” that demonstrate close regulatory and legislative oversight of the impacts of deregulation. In reality, these corrections have severely constrained the SCC’s authority to protect customers. On the other hand, “mid-course corrections” that could have helped consumers have generally not been enacted.

Here are some of the key legislative changes since the Restructuring Act was enacted in 1999:

Recovery of Stranded Benefits is Prohibited

The Restructuring Act contains provisions designed to permit incumbent utilities to recover costs that otherwise would be left un-recovered as a result of customers exercising their right to choose alternative suppliers (i.e., so-called “stranded costs”). Such costs may be recovered through the “capped rates,” described above, or through “wires charges” imposed on customers electing to choose competitive suppliers of generation services. (So far, as indicated above, DVP has not incurred its first dollar of “stranded costs.”) As originally enacted in 1999, the Restructuring Act arguably permitted wires charges to be “negative.” That is, just as the Act permitted the utility to recover its “stranded costs” through wires charges, it arguably permitted shopping customers to recover from utilities “stranded benefits” associated with such shopping. In the 2000 Session, the General Assembly amended the Act explicitly to prohibit such “negative” wires charges.

Imposition of Greater Obstacles for Suppliers Entering the Market

Also during the 2000 Session, the General Assembly amended provisions in the Restructuring Act that addressed the calculation of the “wires charges,” specifically, the calculation of certain transmission costs included in their calculation. The effect of the amendment was to make it more difficult for competitive service providers to enter Virginia’s retail market and offer to provide service to DVP’s customers.

Default Rates Must Be Market Rates, not Cost of Service Rates

During the 2001 Session, the General Assembly amended provisions in the Act related to the provision of “default service,” which is generation service available to customers upon expiration of the so-called “capped rates” if such customers do not elect to take service from a competitive generation supplier. Prior to the amendment, the SCC possessed the authority to set rates for such “default service” based on traditional cost-of-service ratemaking – i.e., based on the utilities’ costs in providing such service. The 2001 amendment, however, required “default

service” rates to be based on market prices for generation. As discussed above, the result may be a huge windfall for utilities at their customers expense, depending upon the difference between the “capped rates” and market prices when the “capped rates” expire after 2010.

Membership in RTOs is Postponed

During the 2003 Session, the General Assembly amended provisions in the Act related to regional transmission entities (called regional transmission organizations, or “RTOs”). In 1999, at the time the Act was passed, it required utility membership in RTOs by January 1, 2001. Membership in RTOs was considered an important step in the development of competitive markets because RTOs would operate the transmission system independently from the owners of power plants and, among other things, eliminate transmission rate differentials among member utilities (i.e., eliminate transmission rate “pancaking”). DVP did not meet the deadline. A 2003 amendment to the Act eliminated the January 1, 2001, deadline and substituted January 1, 2005.

Suspension of Deregulation is Rejected

In the 2004 Session, the General Assembly declined to enact a bill that would have “suspended” indefinitely almost the entire the Restructuring Act, including the provisions permitting customers to choose their generation supplier and the “capped rate” provisions. The bill would have returned DVP and other utilities to traditional SCC regulation. The General Assembly rejected the “suspension” bill and adopted another measure that amended the Act by extending the “capped rates” through 2010. This meant that DVP would continue to enjoy the benefit of collecting excess revenues from its base rates, which, according to the then most recent review by SCC Staff of DVP’s financial reports, were over-collecting DVP’s costs by about \$400 million per year. (The most recent SCC Staff report, for the year 2004, shows that DVP’s base rates are collecting even higher excess revenues above its base rate-related costs, although that excess in base net revenue is offset by the under-recovery of fuel costs in the fuel rate.)

Capped Rates May be Increased but May not be Decreased

Also during the 2004 Session, the General Assembly amended the Act to permit utilities, except DVP, to seek increases in base rates. No change was made in the Act, however, to permit the SCC to initiate a rate case, either on its own initiative or on complaint of a customer or a customer’s representative, such as the Attorney General’s office. Thus, even if the SCC believes that a utility’s base rates are excessive, the Restructuring Act still prohibits the SCC from initiating a rate case to reduce such rates. As a result of the 2004 amendment, even base rates are no longer frozen for utilities (except for DVP). Thus, rates for such utilities have become, in effect, “floor” rates because they may be adjusted only when such a utility files a base rate case. (Since such utilities are unlikely to initiate rate changes that would reduce their revenues, the result is a “floor” under their base rates.) The 2004 amendment allows such utilities to file one general rate case prior to July 1, 2007, and another one between July 1, 2007 and December 31, 2010. In addition, such utilities may annually request increases in their base rates for cost increases for compliance with environmental regulations and for transmission and distribution reliability.

As a result of such multiple exceptions to the “capped rates,” Appalachian Power’s (“Appalachian’s”) customers may pay three significant rate increases during 2006. Its first increase, a significant fuel factor increase of 0.3¢/kWh, took effect on January 1, 2006. It also has requested a second rate increase (about 3%, on average) for certain base (non-fuel) environmental compliance and transmission and distribution reliability (“E&R”) costs and a third rate increase for all of its base rate-related costs and revenues not included in the E&R increase request. The third increase (about 25%, on average) will take effect on October 2, 2006, on an interim basis, subject to refund, as a result of its general base rate increase application filed on May 3, 2006.

Frozen Fuel Factor is Adopted

The 2004 legislation also amended the Restructuring Act by “freezing” DVP’s fuel factor from January 1, 2004, through June 30, 2007, and re-setting and freezing the fuel factor from July 1, 2007, through December 31, 2010. The amended fuel factor provisions froze DVP’s fuel factor at a level that was higher than it had been in some years. At the time the frozen fuel factor was enacted, it was uncertain whether freezing the fuel factor at such a high level would benefit consumers. However, sharp, unexpected increases in the price of natural gas and coal, especially during 2005, meant that the frozen fuel factor helped consumers because DVP could not pass along 100% of its fuel costs to customers.

Fuel Factor Adjustment Based on all Costs is Rejected

In 2006, the General Assembly considered legislation that would have required the SCC to consider all of DVP’s costs and revenues before permitting the frozen fuel factor to be re-set in 2007. This would have permitted the SCC to reduce base rates at the same time that it increases the fuel factor, which means that increases in the fuel factor could have been offset by a decrease in base rates. DVP opposed the legislation, arguing, among other things, that the 2004 amendment relating to its frozen fuel factor represented a careful balance between its interests and those of customers, and that amending such provisions in 2006, as requested, would disturb that careful balance. The legislation was not adopted.

Frozen Fuel Factor is Repealed

After urging the General Assembly to reject any revisions to the law pertaining to its frozen fuel factor during the regular 2006 General Assembly session, DVP then sought a Governor’s amendment to revise the frozen fuel factor provisions. The General Assembly adopted the legislation during the 2006 “veto” session. DVP’s amendment reinstates traditional fuel cost recovery for DVP starting July 1, 2007. Based on the anticipated sharp increase in the fuel factor, the legislation permits DVP to recover 100% of its fuel costs incurred after July 1, 2007, but the SCC may phase-in the rate increase so that fuel costs are deferred for recovery over a three and half year period from July 1, 2007, through December 31, 2010. Under this approach, the fuel component of rate is increased without examining whether the base rate should be reduced.

Amendments to Restructuring Act Favor Utilities, not Consumers

In sum, while deregulation has been accompanied by legislative and regulatory oversight in Virginia, key legislative changes since enactment of the Restructuring Act in 1999 have, on the whole, favored utilities rather than customers. Customers have paid more than necessary, and they face the risk of significantly higher rates when the “capped rates” expire.

Critique #3: Many states are further along in deregulation . . . and have suffered severe consequences

Summary:

Virginia is at a crossroads, facing a critical decision. It is headed down the same road traveled by neighboring states that have deregulated, with disastrous consequences for customers and the public in general in those states. There is, however, one key difference. In those neighboring states, all the exits off the deregulation road had been blocked, and a change in course was not feasible. In Virginia, the exits have not been blocked. It is still possible to change course because Virginia lawmakers ensured that Virginia retained jurisdiction over generation assets owned by Virginia utilities. DVP claims that some regulated states also face large rate increases, but this claim should be given little weight because those increases are based on anomalies that do not apply in Virginia. Similarly, DVP cites studies to show how deregulation savings are not confined to Virginia, but these studies are seriously flawed and do not support such savings.

What nearby states are further along the path to deregulation, and what has been their experience?

It is not necessary to look far to see the likely consequences of going from “capped rates” to market prices. In Delaware and Maryland, capped rates are ending in 2006. On May 1, 2006, bills for residential customers in Delaware increased by, on average, 59%, because of the ending of capped rates and the institution of default service rates based upon market prices. For Delaware’s larger non-residential customers, the bill increases are far worse, 100% to 118%. In Maryland, residential customers of Baltimore Gas and Electric will see their monthly bills increased 72%, effective July 1, 2006. (Customer bills may not increase all at once because of state-sanctioned “phase-in” plans, which defer a portion of the rate increases for payment in subsequent periods; however, deferral of a portion of a rate increase merely means paying it later rather than sooner.) Other retail customers in Maryland have seen extraordinary increases over the past several years as their capped rates ended. If “capped rates” were to be taken away in Virginia today and market prices substituted, Virginia’s retail customers would see similar rate increases to those experienced in Delaware and Maryland, i.e., increases on the order of 60% to 100%, or more.

Within two years of deregulation legislation being enacted in Delaware, Delmarva Light & Power sold or transferred all its generating assets to affiliates. This transfer enabled the affiliates to charge market prices instead of cost of service prices, and ultimately the Delaware Public Service Commission had no choice but to accept bids from these affiliates based on

market prices. The Delaware Electric Utility Restructuring Act required the Commission to use regional market pricing for retail customers. The Commission was unable to find that the forecasted market prices were not representative of regional market prices. Consequently, the Commission had to allow rates that “will make electric bills more painful for many, and real hardships for some.”

In Maryland, Baltimore Gas and Electric sold its generating facilities to an unregulated entity controlled by its corporate parent, Constellation Energy. The Wall Street Journal has recently reported that the unregulated entity has a 46% increase in quarterly profits.

To require Virginia customers to pay dramatically higher “market prices” for power from the existing fleet of power plants, after such customers already have paid for much of the costs of that fleet, may result in a huge transfer of wealth to utilities at their customers’ expense. Any gains that might be passed along to consumers as a result of more efficient construction of new power plants or operation of existing plants may be overwhelmed by the potentially staggering impact of charging significantly higher, market-based prices for power from Virginia utilities’ existing fleet. Utilities may reap an enormous windfall from their customers as a result of charging market prices for plants that already have been built and largely depreciated.

Further, in assessing arguments about increased gains for consumers from more efficient construction and operation of power plants as a result of deregulation, it also must be remembered that utilities have not been free from long existing “regulatory” risks related to such construction and operation under traditional regulation. In traditional rate cases, utilities’ emphasized the seriousness of the risk of disallowance of “unreasonable” or “excessive” costs for construction and operation of power plants, and they sought, and normally received, compensation from regulators (i.e., higher rates) for bearing such “regulatory risk.”

What nearby states are not taking the path to deregulation, and what has been their experience?

Other nearby states, which did not embrace market pricing, but instead retained traditional cost of service pricing, are expecting significantly lower prices than those states that have deregulated.

North Carolina did not deregulate power supply pricing but instead has continued with regulated cost of service pricing. DVP’s North Carolina operations (doing business as “North Carolina Power”), therefore, are subject to traditional rate regulation in that state. Thus, under North Carolina law, the North Carolina Utilities Commission (“NCUC”) may initiate a rate case and, if it finds that a utility’s rates are excessive, order a rate reduction. Last year, following such an NCUC-initiated investigation, DVP agreed to a base rate *reduction* of \$12 million per year for its North Carolina operations. In contrast, Virginia’s Restructuring Act prohibits the SCC from reducing DVP’s base rates in Virginia.

West Virginia is another state that has not deregulated. West Virginia’s legislature has found there was little, if any, evidence that deregulation would benefit West Virginia consumers.

There was no significant electric rate case activity in West Virginia for about five years until AEP and Allegheny Power filed in 2005 for rate increases in order to recover the cost of service increases. Unlike the utilities in deregulated states, such as Delaware and Maryland, American Electric Power requested a 20% increase spread *over four years* and Allegheny Power filed for an increase that would add *another 4% to monthly power bills*.

How do Virginia's circumstances differ from those of nearby states?

Unlike Maryland and Delaware, Virginia still has time, and it still has the legal authority, to avoid the pitfalls of deregulation for the state's largest utilities. The General Assembly still may amend or repeal the Restructuring Act and return Virginia to the traditional regulatory model for vertically integrated utilities. There are no practical or legal impediments to restoring traditionally regulated, vertically integrated electric utilities in Virginia.

This is not the situation in Maryland, Delaware, and many of the other states that have gone forward with electric deregulation, where utilities have transferred ownership of their generating facilities to third parties, affiliated or unaffiliated. In such states, the utilities now purchase power from separate legal entities and re-sell that power to their customers. Such wholesale purchases are regulated by the federal government. While such states could return to traditional regulation, the regulated electric utility no longer owns its generating facilities. So, the utility commissions in such states cannot, due to federal preemption, require their utilities to base rates on the costs of producing power from their generating plants, including their low-cost coal-fired and nuclear generating plants. Instead, utilities' rates in those states must be based on wholesale rates set by the federal government (i.e., the Federal Energy Regulatory Commission), which, in general, allows power plant owners to sell at wholesale at "market" prices.

Fortunately, DVP and Appalachian Power continue to own all of their generating facilities in Virginia. There is no problem of federal preemption analogous to those in the "deregulated" states. Whether Virginia utilities remain in PJM is a separate, independent issue. That is, whether the transmission network remains within the operational control of the vertically integrated utility or that of an RTO is a separate issue from whether traditional state regulation of retail rates continues. For example, while DVP and Appalachian Power have jointed PJM, that decision is not an impediment to North Carolina and West Virginia remaining non-deregulated states, even though DVP operates in North Carolina and Appalachian Power operates in West Virginia.

As indicated above, Virginia customers have paid for the financing and other costs of DVP's and Appalachian Power's generating units, and there is simply no good reason to deny their customers the benefit of such units to protect against the potential for paying exorbitant electric rates.

Haven't there been sharp rate increases in states that have not deregulated?

Yes, but such rate increases have occurred in circumstances substantially different from those of DVP and other Virginia utilities.

DVP contends that rates have increased dramatically in non-deregulated states, and it cites as examples significant rate increases for utilities in Wisconsin, Oklahoma, and Florida. It is true that traditional, cost-based regulation does not immunize electricity customers from legitimate, cost-based rate increases related to a utility's specific circumstances. Thus, customers served by a utility that is heavily dependent upon natural gas, like Public Service Company of Oklahoma, will doubtless experience significant rate increases if natural gas prices triple: generation owned by that utility is 74% gas-fired. Similarly, customers of a utility like Florida Power and Light, which also is heavily dependent upon natural gas-fired generation and which just experienced significant damage due to several massive hurricanes, can expect significant, cost-based rate increases. Also, customers of utilities in the midst of constructing base load generation (and experiencing increases in fuel and other costs), such as the customers of Wisconsin Public Service Corporation, can expect significant rate increases. DVP's generation fleet, however, is not heavily dependent upon natural gas; its service territory has not experienced anything approaching the level of hurricane-inflicted damage visited upon Florida's utilities; and it is not constructing any new base load generation. The experience of utilities in Wisconsin, Oklahoma, and Florida with cost of service rate increases is simply not relevant to what DVP's cost of service rates would be.

While DVP refers to utilities different from it in important respects as examples of utilities experiencing significant rate increases under traditional regulation, it might have elected to cite an example of such regulation closer to home. As previously noted in this White Paper, DVP's retail customers in North Carolina were recently granted a \$12 million reduction in base rates based on DVP's cost of service rates being deemed to be too high.

What about studies that conclude that deregulation generally has benefited consumers well beyond Virginia?

Deregulation proponents have published several recent studies that purport to show that deregulation has benefited consumers generally. Such studies are fraught with problems, however, because of different situations in different states over different periods. For example, DVP cites a study by Cambridge Energy Research Associates ("CERA") purporting to show significant customer savings nationwide from deregulation. The study, however, contains significant flaws. Critics have pointed out, for example, that most of the claimed \$34 billion in consumer savings found by the CERA study are ascribed to the southern states, which have experienced little deregulation. They also have questioned the study's erroneous assumption that markets in all four regions of the country were "regulated" through 1997 and "deregulated" after 1997. That criticism appears to apply to Virginia. Virginia's Restructuring Act, as indicated above, was enacted in 1999, and different Virginia utilities offered their customers the right to choose an alternative generation supplier in different time frames. DVP did not offer customer choice to all of its customers until 2003.

In contrast to the findings in such studies, the SCC's annual report to the General Assembly and the Governor regarding deregulation in Virginia discusses deregulation across the nation. According to its most recent report (for 2005), recent price data suggest that prices in restructured states are increasing faster than in states that did not restructure.

Critique #4 Regulation is inefficient and sends the wrong price signals.....when state regulation over retail rates is replaced by FERC regulation and PJM oversight over wholesale rates.

Summary:

Deregulation was supposed to result in efficiencies and innovations that would lower costs and offer consumers a broad range of options. Instead prices have increased, and a broad ranges of innovative options has failed to materialize. How could the predictions for deregulation have been so far off the mark? There are four basic reasons: unforeseen increases in natural gas prices, the pricing structure in organized markets, incentives based on such pricing structure, and the lack of sophistication in pricing competitive services.

Were price benefits from deregulation premised on lower natural gas prices?

Yes. Deregulation in Virginia was premised, in part, on competition coming from merchant (non-utility) generation supplying power from natural gas units that were, as compared to coal and nuclear generating units, relatively quick to install and environmentally friendly. This basic premise was completely undermined by natural gas prices tripling between 1999 and the present. That made it impossible for new generating plants to offer rates that are lower than a utility's regulated rates, which in Virginia are based to a large extent on low-cost coal and nuclear units; a relatively small percentage of generation in Virginia comes from natural gas generation units.

What role have organized markets played in the failure for deregulation to result in lower prices?

Prices in wholesale markets, which form the basis for competitive retail prices, are strongly influenced by prices set in "organized" markets, such as those operated by the PJM Interconnection, to which both DVP and Appalachian Power belong. PJM operates a day-ahead market in which generators bid to supply power for each hour of the next day. The price paid to all generators for each hour is the price paid to the highest bidder. Often, operation of this "single price auction" means that a generator whose plant is fueled by natural gas sets the price for *all* generators selling power during that hour. In other words, natural gas generation sets the "market clearing price" that will be paid to all generators, including those using low cost coal or nuclear fuel, for a substantial number of hours in the PJM wholesale market. This means that the price for power in such wholesale markets frequently is based on the price bid by a natural gas-fired unit, i.e., a unit whose costs of operation far exceed the average unit cost of generating units in Virginia, where existing "capped rates" are based, to a significant degree, on low-cost nuclear and coal generating facilities. The steep price increases for natural gas have exacerbated the high prices produced by the "single price auction."

Should market pricing be implemented for DVP and Appalachian Power, and should their customers be subject to such high, natural gas-based generation prices instead of paying the costs of low-cost nuclear and coal generation, customers of those utilities will pay extraordinarily high rates compared to the present, “capped rates.” Both utilities, moreover, would enjoy windfall profits.

Thus, the combination of high natural gas prices and market pricing for customers of those utilities may mean extraordinary rate increases for customers of those utilities.

Why is it likely that current market structures will result in deregulated prices being higher than regulated prices?

The price signals from a bid-based competitive market encourage the sale of generation at market rates rather than cost-based rates. For instance, if a utility can run its nuclear units at a cost of 0.5 ¢/kWh and sell power into the market at 8 ¢/kWh, then the utility would naturally want to sell its power into the market at market-based rates. Moreover, any new generating units that are brought online by merchant companies would also seek to sell power at market-based rates. This suggests that there would never be a glut of coal or nuclear generation, i.e. more supply than demand, because there would be no incentive (and certainly no financing) to invest in building such generating units that would significantly drive down market rates.

Competition has not pushed prices down. Instead prices are spiraling upward. According to The Wall Street Journal, awarding all generation the same price, whether gas fired or not “has provided a special boost for owners of nuclear and coal-burning power plants, who benefit from sharply higher electricity prices, but whose fuel costs typically are low compared with natural-gas-fired plants.”

Generally, nuclear plants cost about a half a cent per kilowatt-hour and coal about two cents per kilowatt-hour. Since all the generators are paid the same price as the marginal gas unit, the cost is about six cents per kilowatt-hour, and the profit must be phenomenal.

Is there evidence that deregulation has failed to result in innovations?

Yes. The lack of innovation is most evident in pricing structures. Deregulation has failed to deliver on innovation because immature pricing structures are much less sophisticated. Pricing under utility tariffs, developed over the course of one hundred years, offer sophisticated rates structures with block rates and varying demand charges. Under deregulation, pricing by competitive suppliers is tied to wholesale rates set by organized markets and is based on flat per kWh rates.

The experience in Virginia bears this out. The only new product offering in Virginia is green power being sold at a premium price. However, deregulation is not the only way to encourage the purchase of green power. The simplest, least controversial method would be to have utilities offer it at cost via a “green” tariff offering. The utilities could purchase green

power at wholesale for any customer willing to pay the higher price. Another approach is to mandate that a certain percentage of power being sold by utilities come from green resources: this approach is often referred to as mandating a “renewable portfolio standard.” These are just two options for encouraging the use of green power, and neither require deregulation at the retail level.

Critique #5 Deregulation is a win/win proposition . . . for power producers and a lose/lose proposition for the general public.

Summary:

When evaluating the debate over deregulation, it is important to look closely at who favors it and who opposes it. Generally, those supporting deregulation are electric power generators, marketers, and suppliers: those who benefit from selling power at higher prices. Generally, those opposing deregulation are consumers: those who suffer when the price of electricity is sold at above-cost rates. This does not mean that electricity should be sold at a loss to favor consumers. It does mean that fairly pricing electricity is crucial for economic development, for local government budgeting, and especially for consumers on fixed income. It matters whether electricity is sold at market rates that far exceed cost-based prices which offer a fair, but not exorbitant, return on investment.

Also, it's important to keep in mind whether those who once supported deregulation have changed their minds. Typically, industrial users were at the forefront of the effort to deregulate electricity because they wanted the lower rates and greater innovations that deregulation was supposed to offer. For manufacturing businesses that operate at a low profit margin and utilize significant amounts of energy, the price of electricity can mean the difference between operating at a profit or a loss. When industrial customers, with their buying power and expertise in negotiating commodity prices, cannot make deregulation work, then it is a bad sign for all consumers.

Who are the winners under deregulation?

The winners are utilities and their shareholders, who can produce power for 2¢ and sell it for 8¢. Similarly, independent power producers, who can finance new generating units such as clean coal plants on the basis of selling the power well above the cost to produce it, are winners under deregulation. Finally, competitive suppliers that broker deals between generators and retail users stand to gain from deregulation.

Who are the losers under deregulation?

Customers in general are the losers: they bore the risks for financing the cost of coal and nuclear generating units, but when deregulation permits the power from these units to be sold at market rates that far exceed the cost to produce the power, the customers are forced to purchase the power at market-based rates.

Residential homeowners in particular will suffer: electricity is a necessity, not a luxury, and there are no real substitutes. Whereas a commuter could choose to ride a bus or carpool to avoid bearing the full brunt of high gasoline prices, there is no feasible alternative to electricity

for running a refrigerator, fan, or air conditioner. Those on modest or fixed incomes will suffer the most from high power costs.

Commercial and industrial businesses will also suffer, as will their employees and their customers. Imposing higher costs on Virginia businesses would, at best, result in higher consumer prices and, at worst, result in lay offs and relocation of jobs outside Virginia.

Local governments also stand to lose: imposing higher costs on Virginia local governments will result in decreased services or higher taxes, neither of which are welcome alternatives.

Is there any evidence that deregulation has currently harmed Virginia customers?

Yes, there is clear evidence that deregulation has harmed Virginia customers.

One primary example is the 50% increase in total rates sought by Delmarva Power & Light. This utility is mainly located in Delaware and Maryland with a small percentage of its customers located in Virginia. The increase is the result of a new, purchased-power supply contract based on a bid process in which the sole and winning bid was from Delmarva Power & Light's affiliate. If the company's rate request is approved, rates would increase by approximately \$20 million; by customer class, the average increase would range from 43% for residential customers to as much as 65.3% for certain large commercial/industrial customers.

Another primary example is the significant increase in costs of municipal electric companies in Virginia when their long-term purchased power contracts expired and the munis had to enter into new purchased power contracts at market-based rates. When the City of Bristol's 1998 wholesale purchased power contract with Cinergy expired in 2005, the City of Bristol entered into a new purchased power contract with AEP at prices that were 82% higher than its 1998 contract rate. This sharp increase incurred despite an extensive bidding process resulting in 21 proposals. Ultimately the rates paid by the City of Bristol's retail customers were increased by 38% because the City of Bristol cut costs and reduced contributions to the City's treasury.

Is there any evidence that Virginia utilities will accept cost-of-service rates?

Yes. On May 25, 2006, the American Electric Power Service Corporation filed with the Federal Energy Regulatory Commission a 20-year contract for Appalachian Power Company to sell wholesale power to the City of Salem at cost-based rates, effective July 1, 2006. This contract is not governed by the Restructuring Act because it involves a wholesale sale rather than retail sales to end-use customers. However, it does suggest that pricing at cost-of-service rates is still feasible in Virginia well beyond January 1, 2011.

CONCLUSION

What should VEPGA members be doing?

Fortunately, Virginia's transition period is not scheduled to end until January 1, 2011. Now is not too soon, however, to become fully educated on the implications and the policy choices for electric deregulation in Virginia.

Public officials and citizens in the states just to the north of us were caught off guard by the sharp price increases when electric rates were based on market prices. Just as the California energy crisis alerted many states to the pitfalls of electric deregulation and resulted in no additional state deciding to restructure its electric utility industry after the California crisis, the rate shocks in Delaware and Maryland should provide a similar wake-up call. The significant pain suffered by residential and business customers in those states should give Virginia public officials and citizens sufficient warning to change course before Virginia goes over the same precipice.

For more information and opinions on policy choices for Virginia, the following information is available from the VEPGA website (www.vepga.org): an opinion article published in the Richmond Times-Dispatch by the editor of its editorial page; an opinion article published in the Washington Post by Hullan Williams Moore, former Commissioner of the Virginia State Corporation Commission; and the September 1, 2005, report of the Virginia State Corporation Commission to the Governor and General Assembly regarding the status of competition in the electric utility industry in Virginia. Section III of the SCC's report is particularly informative .

For more information about this White Paper, please direct inquiries to VEPGA@yahoo.com.