

Renewable Energy is Good For Virginia!

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Restructuring and the
Virginia Commission on Coal and Energy
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What is Old Mill Power Company?

- Federally Licensed Wholesale Power Marketer
- State Licensed Retail Competitive Electricity Provider
 - “Competitive Service Provider”, or “CSP”
- Independent Power Producer (IPP)
 - Virginia’s largest solar array (70 kW, 2,060 BP Solar Millennia modules, ½ acre facility in Loudoun County)

What does Old Mill Power Company do?

- Sells electricity (Renewable Energy) produced by:
 - Sun
 - Wind
 - Falling Water
 - Biomass
 - Waste-To-Energy Conversions

Other forms of Renewable Energy

- Earth's Heat
- Waves or Tides

Old Mill's MDV SEIA Affiliation

- MDV SEIA = Maryland, District of Columbia, Virginia Solar Energy Industries Association
 - Regional Solar Energy Industry Trade Association
 - Executive Director: Peter Lowenthal
 - Currently out-of-country to attend a global solar energy conference
 - Scheduled Speaker: Was Chris Cook

Renewable Energy is good for...

- Producing electricity without exhausting finite natural resources (indefinitely sustainable)
 - Good geographic dispersion around the state
(Sun, wind, falling water, biomass, waste-to-energy conversions)

Renewable Energy is good for...

- Producing electricity using Virginia (as opposed to foreign) primary energy sources
 - A matter of state, as well as national, security
 - Renewable primary energy sources currently harvested in Virginia
 - Sun, wind, falling water, biomass, and waste-to-energy conversions

Producing electricity using domestic resources (cont'd.)

- Renewable primary energy sources not currently harvested in Virginia
 - Earth's heat, waves, and tides

Renewable Energy is good for...

- Producing electricity without polluting air or water
 - Obvious examples
 - Sun, wind, falling water, biomass, earth's heat, waves, and tides

Producing electricity without polluting air or water (cont'd)

- Less obvious examples
 - Waste-to-energy conversions
 - Municipal Solid Waste (MSW)
 - Restaurant Oils
 - Other Oils
 - Poultry Litter
 - Cotton Gin Waste
 - The important point
 - The incremental pollution attributable to generating electricity with wastes that would be incinerated even if they weren't being used to generate electricity is...frequently zero

Renewable Energy is good for...

- Protecting consumers against fuel price increases
 - Sun, wind, falling water, biomass, waste-to-energy conversions, earth's heat, waves, and tides

Renewable Energy is good for...

- Creating Virginia Jobs
 - Manufacturing
 - VA once had two solar manufacturers in-state
 - We now have one
 - Sales
 - Installation
 - Operations
 - Maintenance

Renewable Energy is good for...

- Providing revenue to local governments
 - Small, distributed generators are typically taxed by local governments as real estate improvements

Admitted Weak Points

- Renewable Energy systems are capital intensive
 - Harvesting “free fuel” requires large up-front equipment expenditures
 - Therefore long pay-back periods
 - Creates financing challenges
 - Consider, for example, the impact of the new way of calculating utilities’ “avoided costs”
 - » 10, 20, and 30-year fixed rate energy contracts used to be the norm
 - » New utility PURPA schedules vary annually

Admitted Weak Points

- Some forms of Renewable Energy are intermittent, diurnal, and/or cyclical
 - Sun, wind, falling water, waves, and tides
- On the other hand: Some forms of Renewable Energy are not so intermittent, diurnal, and/or cyclical
 - Earth's heat, biomass, waste-to-energy conversions

Admitted Weak Points

- Most forms of Renewable Energy—like most traditional “baseload” generators such as nuclear-powered and coal-fired generators—are not rapidly dispatchable
 - No greater problem than exists already with baseload power plants

Although Not Dispatchable...

- Solar energy systems tend to harvest the most solar energy during peak load periods
 - Due to the strong link between sunshine and human activity, including summertime air conditioner use

Take-away Points

- Renewable Energy is good for...
 - Producing electricity without exhausting finite natural resources (indefinitely sustainable)
 - Producing electricity using Virginia (as opposed to foreign) primary energy sources
 - Producing electricity without polluting air or water
 - Protecting consumers against fuel price increases

Renewable Energy is good for...

(cont'd.)

- Creating Virginia Jobs
- Providing revenue to local governments

In short...

Renewable Energy
Is
good for Virginia!

Questions?

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