

Clean Electricity: You Can Make a Difference!

Invest in Renewable Energy

Renewable energy technologies are increasingly efficient, affordable, and useful for residential applications. Anyone can begin to incorporate renewable energy into their homes gradually and easily. For example, solar-powered flashlights, battery chargers, and radios can be purchased through catalogs or online. A trip to any hardware store can provide solar-powered outdoor lights, simplifying outdoor wiring and reducing lighting bills.

Homeowners can also use renewable energy to generate electricity at their home. While some prefer "off-grid" applications where renewables provide the sole source of power to a home, interconnection is also an option. Renewable energy systems can be connected to the rest of your home's power system, and can offset power purchased from the "grid" (your traditional power company) without changing the way power is delivered to your home. Even buying one or two PV panels will have an effect on the amount of pollution you or your family creates.

For more information on installing your own renewable energy system, visit the Green Energy Ohio website or email us and ask for a copy of our brochure "Planning Your Renewable Energy System."

Choose Green Power!

Now that Ohio has deregulated its electric utility industry, opening itself up to competition, you are able to choose your power supplier.

Some electricity suppliers might offer Green Power, which is power from clean, renewable sources. For the first time, you will be able to decide whether you want electricity from nuclear or fossil fuel plants, or from clean, renewable energy sources like the sun, wind, and biomass.

Energy companies will try to market their electricity to you. Ask questions about how they generate their power and the environmental impacts this creates, and consider the environmental disclosure label. Then make your choice count by buying Green Power!

For more information, visit the Green Energy Ohio website or request our brochures on electricity deregulation and buying Green Power.



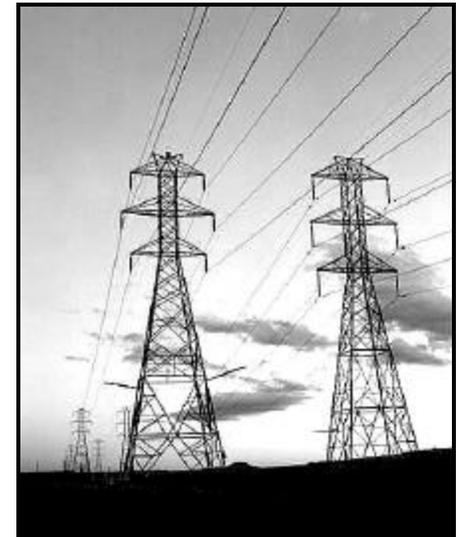
Green Energy Ohio
7870 Olentangy River Road Suite 209
Columbus, OH 43235
Ph: 614.985.6131 Fax: 614.888.9716
geo@GreenEnergyOhio.org
www.GreenEnergyOhio.org

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A Guide to Clean Electricity



Green Energy Ohio is a non-profit organization dedicated to promoting economically and environmentally sustainable energy policies and practices in Ohio.

The Problem



Traditional methods of producing electricity strongly affect the environment and economy of our region.

Electricity generation is the largest single industrial air

polluter in the U.S.A. Electricity in Ohio is produced mainly from non-renewable, polluting sources such as coal, nuclear power, and oil.

In Ohio, 87% of our electricity is generated from coal, making our state one of the largest emitters of sulfur oxides and nitrogen oxides, which are the principal causes of acid rain (nitrogen oxides also contribute to smog), and carbon dioxide, which contributes to global warming.

In addition, nuclear power supplies 11% of Ohio's electricity, raising serious concerns about reactor safety and radioactive waste disposal.

The environmental costs of electricity production are significant. These costs can be reduced by switching to cleaner power sources. Green Power is power that is produced from clean, renewable resources.

The Solution: Clean, Renewable Power!

There are many clean, renewable sources of energy which we can use to generate electricity.

Wind Energy



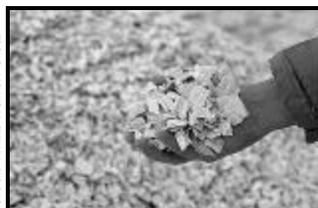
Credit: Gary Cole

Wind energy converts the power in moving air into electricity through a wind turbine. Wind power does not produce air emissions or generate solid waste.

Wind power can be generated by smaller, residential turbines, or by utility-scale turbines like the ones pictured here. In areas with strong, sustained winds, wind power is becoming economically competitive with other power sources like coal.

Biomass

Biomass is energy from trees and plants, including crops grown specifically for energy production, and organic wastes, such as wood residues from paper mills and methane from landfills. Communities all



Credit: NREL/Warren Greitz

over Ohio are beginning to take advantage of their biomass resources through projects such as methane reclamation projects at landfills and using ethanol fuel made from corn.

Solar Photovoltaics

Solar photovoltaic panels capture the light of the sun to generate electricity. Solar panels are increasingly becoming efficient and affordable. The National Renewable Energy Laboratory estimates that Ohio's yearly residential electricity load could be supplied by solar panels if they covered only one half of one percent of the state.

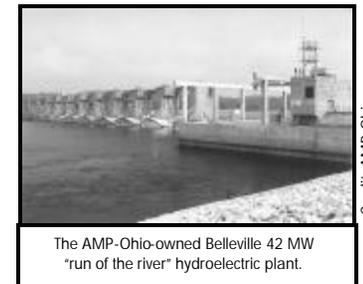
These panels could be distributed across the state on roofs or near buildings.



Credit: Peter Pflaum

Hydroelectric Power

Hydroelectric power cleanly captures the energy available in moving water. Large dams can disrupt fish migration and displace people, but small "run of the river" plants have minimal environmental impacts. One such plant is owned by American Municipal Power-Ohio and provides clean power to many Ohio residents.



Credit: AEP/PLT