

Date: Sept. 2010, Next Update: March 2011

League of Women Voters  
**Ohio Renewable-Energy Database**  
Compiled by Al Rosenfield

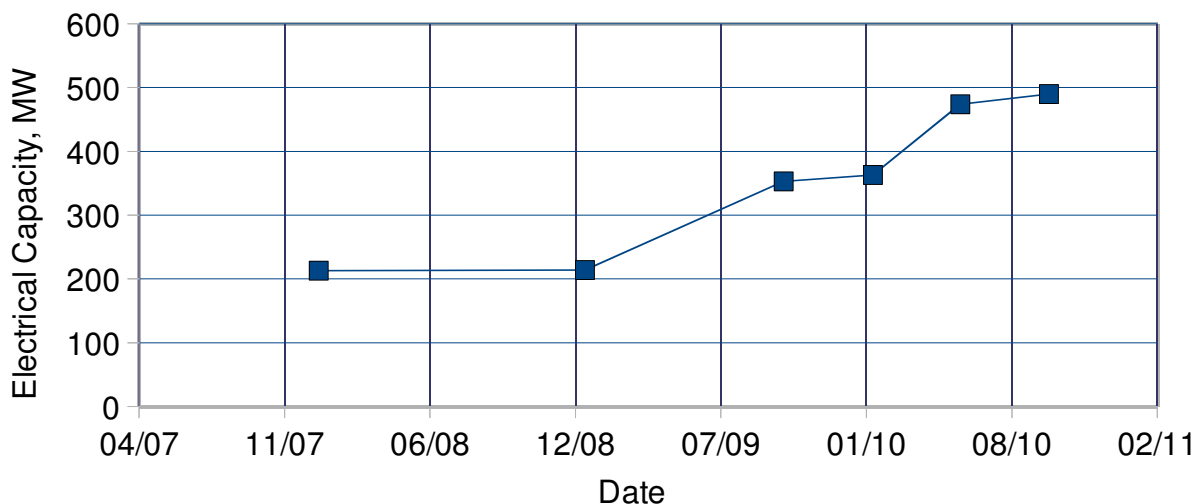
There has been little change in renewable electrical energy since the last report (May, 2010) and not much is expected before the end of the year. However, 2011 appears very promising; plans for several large wind farms are going forward and American Municipal Power (AMP) has made a major commitment to solar-energy. These projects should at least double our electricity capacity.

Currently, Ohio gets slightly over one percent of its electricity from renewable sources. We estimate that we now have a capacity of 491 MW (megawatts = 1000 kilowatts), which is sufficient to power about 175,000 homes, or roughly all of the houses and apartments in the city of Cleveland.

Ohio law requires investor-owned utilities to produce 6.25% of their electricity from recycled sources located in-state by 2024. Since they produce about 80% of Ohio's electricity, at least five percent of our electricity should be generated in-state using renewable methods by the target date.

### Ohio Renewable Energy Growth

(Two earliest points are USDOE Energy Information Administration Data)



To fulfill the legal requirement, the investor-owned utilities will have to have available between 1400 and 3400 MW, depending on the mix of technology (wind requires more capacity because of its sporadic nature). A solar set-aside in the law will require about 500 MW.

The table breaks down the total capacity by technology. Currently, over two-thirds of our renewable electricity is generated using processes that involve combustion. Wind and solar comprise about six percent and would only rise to about one-third if all of the planned projects come on line.

The combined existing and planned 4327 MW would provide roughly ten percent of Ohio's total electricity. Since this is in excess of the requirements, it is unlikely that all planned projects will be carried out.

| OHIO RENEWABLE ENERGY          |              |         |       |
|--------------------------------|--------------|---------|-------|
| Type                           | Capacity, MW |         |       |
|                                | Existing     | Planned | TOTAL |
| Natural Energy Sources         |              |         |       |
| Hydro                          | 129          | 4       | 133   |
| Solar                          | 16           | 207     | 223   |
| Wind                           | 12           | 1283    | 1295  |
| TOTAL                          | 157          | 1494    | 1651  |
| Processes Involving Combustion |              |         |       |
| Landfill Gas                   | 102          | 0       | 102   |
| Organic Waste                  | 96           | 30      | 126   |
| Wood/Wood Waste                | 136          | 2312    | 2448  |
| TOTAL                          | 334          | 2342    | 2676  |
| GRAND TOTAL                    | 491          | 3836    | 4327  |

A list of individual renewable-electricity projects is available from Al Rosenfield: <alanpeg@alum.mit.edu>.