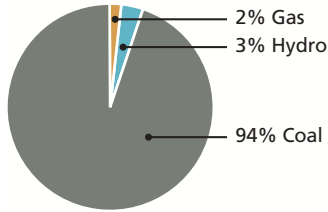


Utah Renewable Energy Resources

Existing Generation Mix



Data source: Energy Information Administration 1999

Utah is known for spectacular scenery, but the state is also home to plentiful renewable resources. This is one of the few states in the region to have developed geothermal power plants, a total of 39 MW.

Renewable Energy Installed Renewable Capacity¹

Resource Type	Installed Capacity
Wind	0.24 MW
Solar (PV)	0 MW
Solar (Thermal)	0 MW
Geothermal	39.3 MW
Biomass	4 MW
Total	44 MW

¹Source: REPIIS database, plus known installations

Renewable Energy Policies

- NM** Net Metering
Maximum capacity – 25 kW
- GP** Green Power Programs
- \$T** Personal/Corporate Tax Incentives

Data source: Database of State Incentives for Renewable Energy (www.dsireusa.org)

Annual Electricity Consumption (1999)

22 million MWh

Zion National Park Visitor Center



Zion National Park's Visitor Center

Photo: Thomas Wood

National parks serve as wonderful natural classrooms. At Utah's Zion National Park, nearly 2.5 million visitors per year learn about the area's natural history and cultural significance. Since completion of a new visitor center in 2000, visitors to the park have also been able to learn about energy efficiency, renewable energy and sustainable building

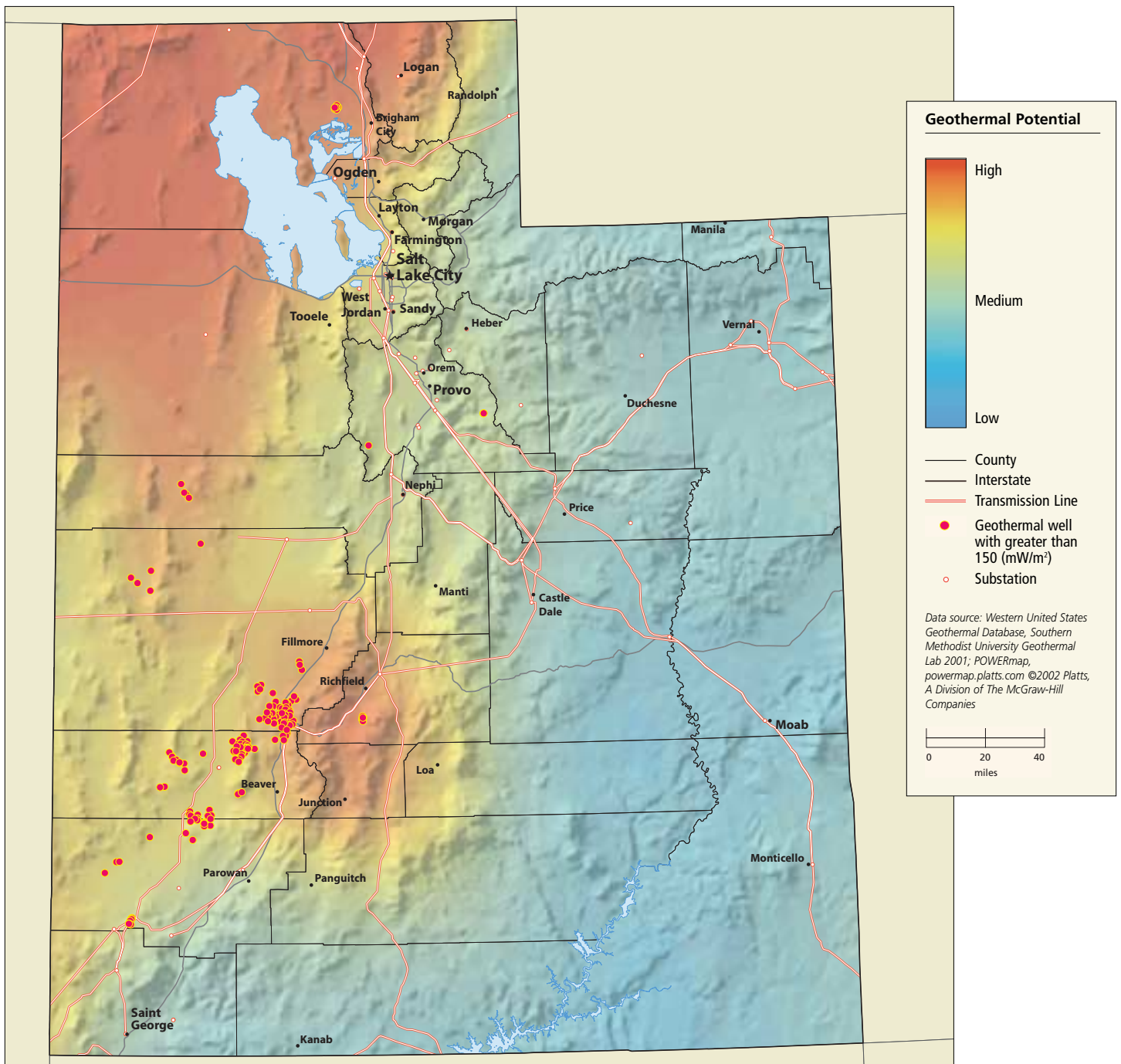
design. The visitor center features a 7.2 kW photovoltaic system that provides about 10% of the building's energy use. Other features include passive solar design, high insulation levels, a 1,040 sq. ft. Trombe wall, daylighting and energy-efficient landscaping. As a result of these features, the visitor center is about 70% more energy-efficient than a comparably sized building.

Geothermal

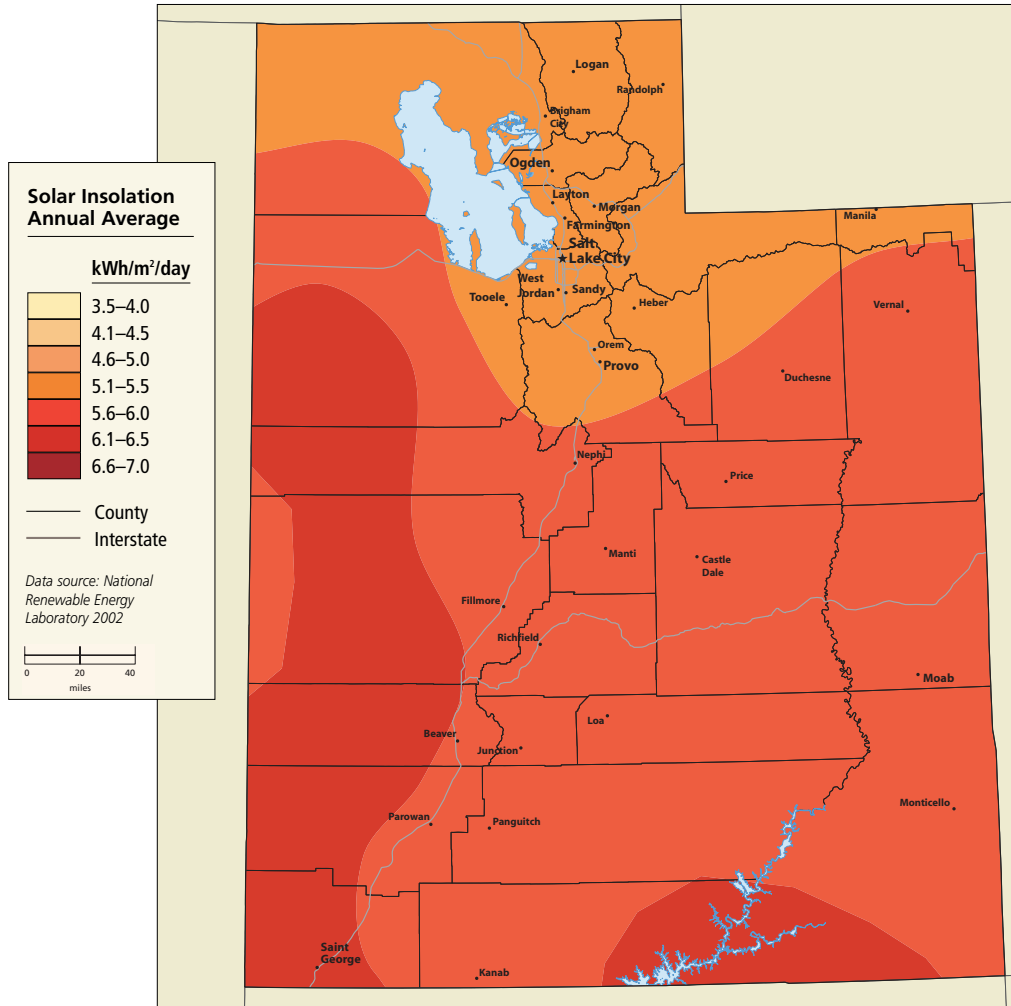
Most of Utah's current renewable energy production comes from geothermal. The resource is plentiful in the middle and northwest portions of the state, although a lack of transmission capacity may hinder electricity development in the northwest

corner. However, geothermal presents an opportunity for direct heating and cooling in this part of the state.

Electricity Generation Potential: 9 million MWh/yr.



Solar



The southern half of Utah is home to excellent solar resources. The state has made attempts to boost solar development by adopting policies such as: personal and corporate tax credits for customers who install renewable energy systems, including photovoltaics. A solar access law allows landowners to apply a “solar easement” to their property, allowing them to protect and maintain proper access to sunlight for installed systems.

Electricity Generation Potential:
69 million MWh/yr.

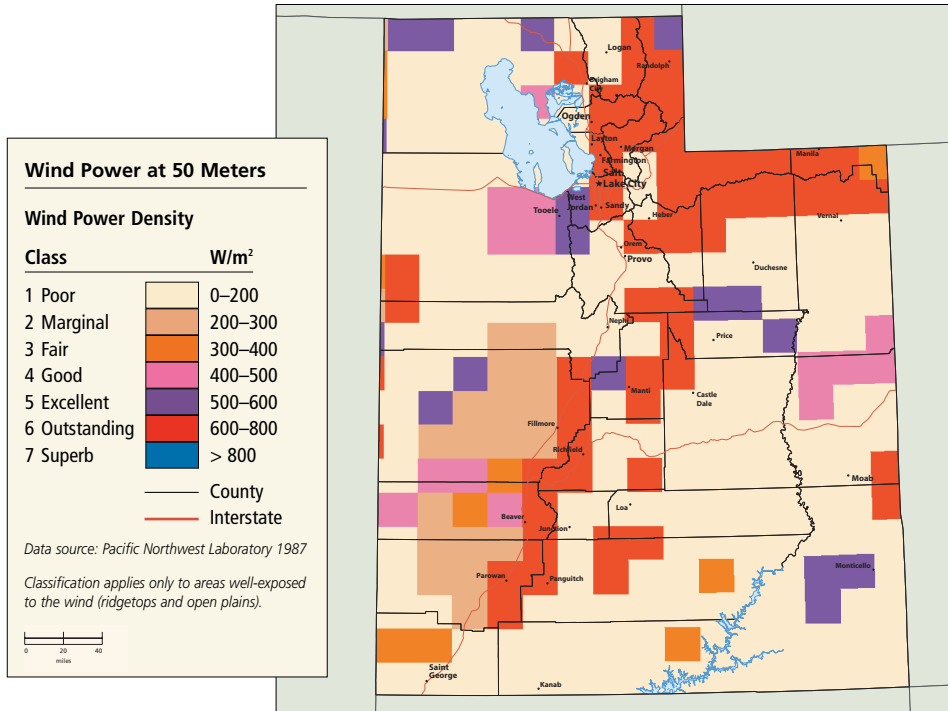
Dangling Rope Marina

The Dangling Rope Marina in Utah’s Glen Canyon National Recreation Area installed this 115 kW PV system in order to eliminate the use of more than 65,000 gallons of diesel fuel for generators every year.

Photo: Warren Gretz, NREL



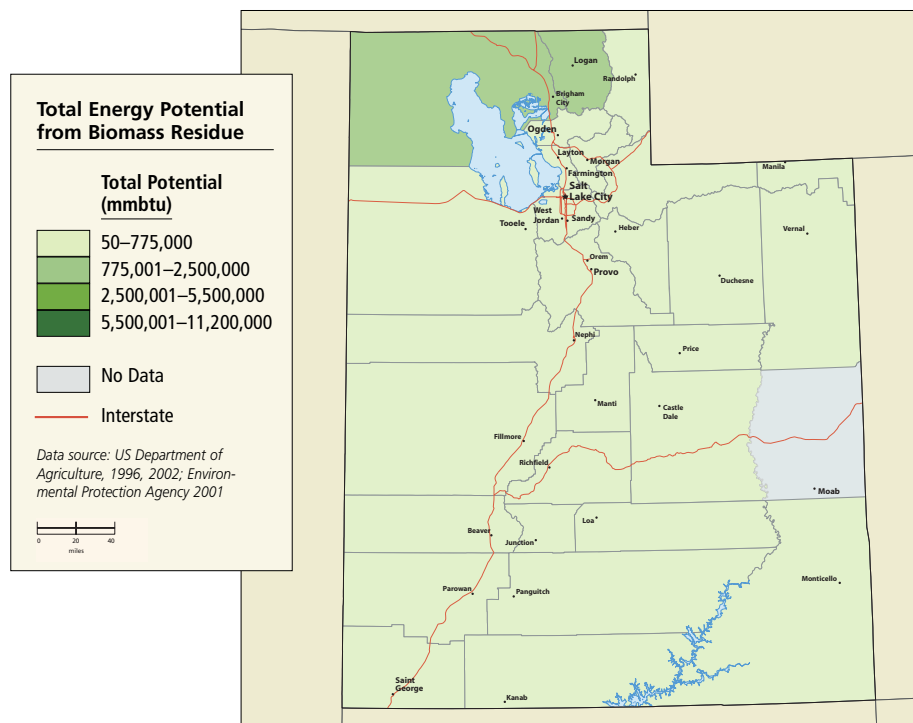
Wind



Areas of Utah contain excellent wind resources that are potentially suitable for utility-scale developments. Utah's largest utility, Utah Power (a subsidiary of PacifiCorp), currently offers customers a wind power option through its Blue Sky program. Although the wind is currently purchased from Wyoming, the state has the potential to generate significant amounts within its own borders. Utah is currently estimated to have 365,000 acres of windy land.

Electricity Generation Potential:
23 million MWh/yr.

Biomass



Generating electricity from landfill gas and animal wastes is one avenue for developing bioenergy resources in Utah.

Electricity Generation Potential:
1 million MWh/yr.