GRE’s Renewable Energy Outlook

Renewable energy helps our cooperative meet our triple bottom line of competitive rates, reliable service and environmental stewardship.

Renewable energy creates economic benefit to MN’s rural communities.
Renewable energy -
provides carbon neutral energy supply
reduces our consumption of natural gas and exposure to its volatile prices
The Federal PTC helps bring the cost of renewable energy down to our members
GRE Wind Resources –
Long Term Commitments

6 MW at Chandler, MN
  9 Vestas 660 kW turbines
  On line in ’98 & ’01
  Wellspring resource
  enXco developed

6 MW at Dodge Center, MN
  6 NEG Micon 950 kW turbines
  On line in ’03
  Wellspring resource
  McNeilus Wind developed
GRE Wind Resources – Long Term Commitments

6 MW in Jackson County, MN

6 Suzlon 950 kW turbines
On line in ’03
Landowner & DANMAR developed

100 MW in Jackson & Martin County, MN

67 GE 1.5 MW turbines
On line in ’05
Landowner & PPM developed
100 MW “Prairie Star Wind Farm” in Mower County, MN

- 61 Vestas 1.65 MW turbines
- On line in ’07
- Horizon Wind developed

All resources to date are PPA

Future wind resources include 900 MW additional nameplate capacity

- GRE ownership or partnerships are a possibility in the future
10 projects made it to the two tiered "short list."

7 of the 10 are C-BED, totaling a little over 130 MW.

All 3 of the first tier projects are C-BED, totaling a little over 70 MW.
Other Renewables

Biomass

Elk River RDF – 33 MW
Two Anaerobic Digesters - 150 kW, 250 kW
Landfill gas – 3.2 MW
Future Needs

Renewable Generation
GRE forecasts the need for approximately 900 MW of wind energy to meet 25% by 2025. The existing, committed and planned renewable resources shown on this chart do not yet include any projects from the 2007 renewable RFP.

 Transmission
Lack of transmission facilities could delay future generator interconnections (all fuels). We are contributing to, and look forward to, the results of the RES Transmission and Dispersed Generation studies. Results in 2007 & 2008.