

Wind Projects: Getting Started

Many Kansans have become aware of our great wind resource, and feel it may be time to consider whether there are opportunities for them: to save money on their energy bills; to help their local economy by providing a municipal or electrical cooperative with renewables; or to lease their property as home for a large commercial wind array. In any scenario, a successful project will require considering several important factors.

#1: Do you have an adequate Wind Resource?

Many people feel their place is “windy”, but wind speed and consistency needs to be measured more adequately than that. Small differences can make a project impractical, or highly profitable. Quantify your wind resource. How?

1. Consult existing wind maps at: <http://www.kcc.ks.gov> There are state wide and county maps available at this site. Wind developers are not likely to locate in a poor wind resource area. Alternatively, see if there is existing wind data from nearby.
2. Contact the Wind Applications Center at Kansas State University to learn more about the costs and options for actually measuring your site: <http://www.eece.ksu.edu/psg/wac/>

#2: How ambitious are you?

There are three general levels of involvement. Rewards and responsibilities vary with each. Be aware that Kansas’ lack of policies makes some of the options, encouraged in other states, all but impossible here.

Small-scale home, farm and school wind energy systems **less than 100 KW** producing power solely for use on-site (aka “behind the meter”). In other states, these systems can be profitably connected to the larger grid to return income to the owner (aka “net metering”). Owners are entirely responsible for operations.

Community Owned Commercial scale wind refers to wind energy projects featuring large commercial towers, but not in huge arrays. Typically, this power is sold into the grid under contract rather than used on-site, and owned by a school, a municipal electrical utility, a farmers’ or investors’ cooperative, or a rural electrical coop. Big impact to local economies, but policies in Kansas have made this option extremely difficult.

Large Commercial Wind farms are typically what we’ve seen in Kansas. They are owned by outside investors which pay landowners rent, and sometimes a production royalty, per turbine. Requires due diligence on the landowner’s part when signing the lease and rewards are less, but there is little responsibility for operations



#3: Other Make It or Break It Considerations

Once you've identified that you have a good wind energy resource and you've thought about the time, effort, risk and capital you're willing and able to put forward, what are the next issues for consideration? Siting, Environmental Concerns, Interconnecting with the Grid, a Contract for purchase of your Power, Financing.

Common Development Issues:

Siting and Environmental Concerns - avoid wetlands, unfragmented grasslands and major bird flyways or other sensitive areas. Are there zoning issues with the county, or problems with neighbors?

Connecting to the Grid - an expensive proposition. How close is the grid, and can you get permission to connect? Does your plan include the cost of a feeder transmission line? Have you negotiated interconnection costs with your utility?

Economics - if you seek grants or financing, the project must make sound economic sense, and a Purchase Power Agreement must be signed for larger projects. Financial considerations, including pre-sold green tags and tax credits, are predicated on a thorough business plan and negotiated contracts with the utility.



Good Wind Policies

Renewable Portfolio Standards which require utilities to include renewables as a certain percentage of their energy "portfolio". Kansas does not have an RPS.

Net Metering Kansas does have a statute, but the regulated return to the turbine owner is too low to make ownership profitable.

Community Based Energy Development, C-BED
Comprehensive policies addressing a raft of renewable energy issues that result in a great climate for wind development. Minnesota and Nebraska are leaders

Resources

General Wind info: www.awea.org

Community Wind info: www.windustry.org

State Policies: www.dsireusa.org

Kansas Energy Office:

www.kcc.ks.gov

Wind Applications Center at KSU:

<http://www.eece.ksu.edu/psg/wac/>

Kansas Rural Center:

www.kansasruralcenter.org

Climate & Energy Project:

www.climateandenergy.org/

Community Based Energy Development:

www.c-bed.org/

#4: Can You Do This Alone?

If you are approached concerning a lease or easement by a wind developer or prospector packaging a large scale wind farm, be sure and discuss the document with your attorney. Signing a poor lease too early, may actually lessen the chances of a project being developed on your farm. In all cases, communicate with your bank, local utility, neighbors and county officials. Wind projects are complicated and require expertise in many areas.