

Lassoing Panhandle Wind

OILMAN PLANS HUGE COMPLEX

BY GARY M. STERN

T. BOONE PICKENS IS NOBODY'S FOOL. PICKENS, who has a net worth of \$2.5 billion and is ranked as the 131st wealthiest person in the United States by *Forbes*, is not prone to invest in pipe dreams. Then why is Pickens, who runs BP Capital Management, a private equity firm, and Mesa Power, building a 4,000-megawatt wind energy facility in Pampa, Texas, in the Panhandle section about 70 miles from Amarillo, which could cost as much as \$10 billion?

In 2006, wind power facilities totaling 2,500 megawatts were built nationally, making them the second largest source of new generating capacity in the United States, according to Randall Swisher, executive director of the American Wind Energy Association. Pickens' wind-power facility would be 60 percent larger than all the wind power projects introduced in the United States in 2006.

Wind power, however, hasn't been considered an instant moneymaker or hasn't generated enough payback to warrant its major capital expenditures. Does Pickens, who is often one step ahead of the curve, know something that the rest of us don't? Is Pickens' 4,000-megawatt new facility a sign that wind power has come of age?

In its planning stages, Mesa Power hired leading consultants to investigate the cost effectiveness of wind power, conduct reviews of existing facilities and wind farms, and become acquainted with state-of-the-art generating equipment and transmission. After completing the research, Mesa Power concluded, "It was feasible, viable and profitable," said Mike Boswell, a vice president at BP Capital Management based in Dallas.

Currently, wind power provides about 2 percent of the power consumed in Texas, but Boswell expects that by 2020 it will furnish about 20 percent of Texas' energy needs. And Pickens will command a large slice of that market. Wind power "has become a much more important segment as the price of petroleum and natural gas has increased," Boswell said.

The genesis of the project springs from a previous water project in which Mesa Power agreed to deliver 200,000 acre-feet of water a year to the northeastern portion of Texas, explained Boswell. That same acreage will be used as the site for construction of the turbines.

If the wind project reaches its full size, it will have 1,500 wind turbines, each generating from 1.5 to 3 megawatts of power.



T. Boone Pickens
SOURCE: AP PHOTO/FILE

Construction is scheduled to begin in 2009. The initial turbines will begin generating power in 2011, while construction takes about eight years to complete. The project will have four phases and cost about \$1.7 million to \$1.85 million per megawatt for generating equipment and another \$500 million to \$800 million for transmission lines. If economic factors change, its scale could be reduced, Boswell said.

Once completed, Mesa Power expects to "enter into power purchase agreements with a single entity at a fixed price for a number of years and in off-take agreements, which are more of spot market concepts. We anticipate getting more money for the power than what it takes to put in the facility," Boswell said.

The primary audience for wind power will be consumers throughout Texas, though commercial businesses will also be targeted. Boswell acknowledged that the current cost of wind power is more expensive than electric-generated or nuclear power by about 10 percent and is more comparable to natural gas prices.

Pickens is betting that as demand intensifies to reduce carbon dioxide emissions, the need for clean, environmentally sound energy will increase. Wind power will therefore play a more important role in meeting our

NewsFlash

CHINA GREENHOUSE GAS TRADE

The Chinese government wants to step up its involvement in trading greenhouse gas emissions credits, according to the *Associated Press*.

The government has set up a special fund that will provide loans and technical help to cut emissions and promote trading of emissions credits. The fund will be used to increase public awareness of climate change issues.

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energy needs, Boswell suggested. Furthermore, Boswell envisions a "blended price for the cost of nuclear, coal, gas and wind to meet air quality standards."

New wind power facilities are good for Texas, explained Bill Bojorquez, a vice president of system planning at the Electric Reliability Council of Texas, based in Austin. "We don't have a lot of hydro-generation, but we're blessed with wind. Renewables are good for Texas," he said. Pickens' project provides consumers with additional choice beyond coal and natural gas.

Yet Bojorquez also noted that wind power has its limitations. Wind doesn't blow much in the summer in Texas, and summers can last from May through September. Wind provides "good energy sources but not good capacity," said Bojorquez.

Because of wind power's subsiding in the summer, Mesa Power is building a baseload of 500 to 600 megawatts of solid-fuel capacity and a separate 300 megawatts of peaking capacity.

Mike Sloan, a consultant at Vertus Energy Research Associates, based in Austin, Texas, said Pickens is developing wind power facilities because "fossil fuel costs are significantly higher and likely will continue to rise." Moreover, carbon taxes are likely around the corner, and wind power "is a domestic resource with no fuel costs and no emissions issues," he said.

Sloan said that the cost of wind power is actually quite predictable. The front-end costs are known, and

wind blowing in Texas is steady; thus, Sloan said when the project is completed, Pickens can "lock in long-term purchase power agreements." Moreover, if the energy environment were to change, he could easily scale back the project from a \$10 billion venture into a smaller facility.

Many utilities have eschewed investing the major bucks to build wind power on a speculative basis. Sloan said that most utility executives operate "in a more conservative culture that grew out of governmental regulatory rates. Pickens is a risk taker and an entrepreneur, and if he guesses right, he will be rewarded."

Asked how Pickens will make money on the project when investing so many billions of dollars, Bojorquez replied that German utilities and entrepreneurs have harnessed wind and made money. He recently met a German entrepreneur at a conference who told him, "I put 100 turbines in the field. For five years the turbines spin for the bank, but after five years the turbines spin for me."

Many wind power developers build a project and then flip it for a quick profit to recoup their start-up costs. But Boswell said, "I don't expect that we will sell it. We already own most of the land."

What does Pickens' proposed project say about wind energy's future? "It tells us that this is where energy's future is going, and smart players recognize that dollars are following that direction," said American Wind Energy Association's Randall Swisher.

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