Green Fund Grant Interim¹ Report

Project Title SIUC Wind Power Project – Phase II

Contacts

Primary:

Secondary:

Vice Chancellor:

Project Description

While much progress has been made, this project is far from finished. The following is a summary of the work done to date:

- Wind Resource Assessment
 - 2.5 years of wind data from the study site has been collected and analyzed. Concurrent data from the Southern Illinois Airport has been collected and is now under analysis.
 Long-term data back to 1973 has also been collected from the airport and is now under analysis. The wind resource study report is still under development.
- Design Development
 - SIUC has hired Heston Wind to assist with the following tasks, which are ongoing:
 - Wind turbine selection
 - Constructability analysis
 - Financial planning
 - Electrical distribution planning is happening in-house. The distribution path has been chosen and some costs have been determined. Final planning is ongoing.
 - Contract document preparation has begun.

¹ A request was made to Patti Perschbacher to extend the grant deadline to December 31, 2010. PSO intends to be ready to present to the Board of Trustees at their December 9 meeting, although the presentation is not yet on the agenda.

- Environmental Studies
 - DOE has required that SIUC prepare an Environmental Assessment (EA) under the National Environmental Policy Act (NEPA). SIUC has hired Tetra Tech to assist in the preparation of the EA. As a part of this effort, SIUC has prepared maps of the project location, electric infrastructure plans, shadow flicker impacts, noise impacts, and has also created photomontages showing the expected visual impact of the proposed wind turbine from various vantage points across campus.
 - A microwave interference study has been completed and showed that no microwave communications would be impacted by the proposed turbine.
 - Anabat acoustic bat surveys have been conducted nightly at three locations on west campus since 5/19/10 and are ongoing through 10/31/10. Data is being collected and compiled and sent to BHE Environmental for analysis. SIUC has received summary analyses through 7/14/10.
 - Mist net bat surveys were conducted in July along Piles Fork Creek and Little Crab Orchard Creek by Copperhead Consulting. Along with other bats, a juvenile female Indiana bat was captured and released.
- Permitting / Agency Consultations
 - The National Telecommunications and Information Administration (NTIA) has concluded that there are no concerns regarding blockage of radio frequency transmissions.
 - The Federal Aviation Administration (FAA) has issued a determination of "No Hazard" to air navigation.
 - The Natural Resources Conservation Service (NRCS) of the U.S. Department of Agriculture (USDA) has concluded that the project will result in the loss of 0.1 acres of prime farmland.
 - The Illinois Historic Preservation Agency (IHPA) has found that there are no significant historical, archeological, or architectural resources impacted by the project.
 - The City of Carbondale has declined to require a special use permit for construction.
 - Informal consultation with the U.S. Fish and Wildlife Service (FWS) has been progressing at the federal level through the U.S. Department of Energy (DOE). Indications are that a formal consultation will be required under Section 7 of the Endangered Species Act. This will require that SIUC hire a contractor to prepare a Biological Assessment to be submitted on behalf of DOE to FWS. It is not clear at this time how long the process will take or whether it will result in FWS issuing an Incidental Take Permit for the Indiana and Gray bats.
 - Consultation with the Illinois Department of Natural Resources (IDNR) has resulted in their request to the Illinois Department of Commerce and Economic Opportunity (DCEO) that DCEO require SIUC to obtain an Incidental Take Authorization from IDNR as a condition of receiving DCEO funding for the project. DCEO has agreed. The Biological Assessment will be submitted to both IDNR and FWS in order to run both permitting processes simultaneously.
 - DOE has required SIUC to prepare a NEPA EA.

- SIU Board of Trustees approval is required to begin the project. We are seeking to present the project to the Board at their December 9 meeting.
- Outreach
 - In the spring, we met with professors from the Departments of Zoology and Finance and the School of Law about creating class projects.
 - Engineering students in ENGR 495, Senior Design, are now in their second semester of a design project related to the wind turbine.
 - On Tuesday September 28th from 7-9 PM in the Student Center Auditorium, we hosted a public forum to explain the motivations behind the project, provide an update on the progress, dispel some common myths about wind power, present some of the results to date, and answer the public's questions. The forum was attended by about 30 people and a good discussion followed the presentation. The forum made the WSIL TV3 news that night: <u>Click here for the news video.</u>² Results from the audience surveys were overwhelmingly positive. Copies of the presentation and the survey are attached as appendices.

Budget

The following table lists the project estimates and expenses to date (rounded to the nearest dollar):

Description	Estimate	Paid to Date
Physical Plant Design Services	\$ 25,000	\$ 21,802
Tetra Tech (Environmental Assessment)	\$ 50,000	\$ 15,105
Heston Wind	\$ 23,650	\$ 4,730
Asaturian Eaton (Site survey for FAA)	\$ 1,250	\$ 1,250
BHE Environmental (Anabat studies)	\$ 25,000	\$ 7,320
Copperhead Consulting (Mist-net surveys)	\$ 6,200	\$ 6,113
Other Expenses (tower climb, auditorium rental)	\$ 1,000	\$ 846
Biological Assessment – proposals under review	\$ 10,000	\$0
Totals	\$ 142,100	\$ 57,166

Appendix

- 1. Attached copy of the 9/29/10 Public Forum presentation (PDF)
- 2. Attached copy of the 9/29/10 Public Forum survey results (PDF)

² http://www.wsiltv.com/p/videos.php?videoID=6744&newsID=11196&type=top&vidType=smMov