Course Title: AET-108 Wind Energy Installation

Date: Spring 2017

Course Team: Greg Betz

Expected Learning Outcomes

- Specify and install a typical wind energy system
- Collect and evaluate data from a wind energy system
- Start up a wind energy system
- Maintain and troubleshoot a wind energy system
- Calculate basic electrical load

Assessment

- Total of 3 tests throughout the semester
- Classroom lab exercises and assignments

Validation

- Comparison of students grades with previous semesters
- Consult internship supervisors and companies about performance of interns and hired students based on ability and knowledge gained.
- The evaluation of student performance and ability to transfer knowledge to next level of class in the program.

Results

- The results of tests who how much of the content the students have retained throughout the semester
- Hands on exercises show the capability of students to transfer knowledge they have read into hands on applications
- Internships will measure the student outcomes in a real world environment through feedback from internship supervisor
- Spring 2017
 - o Class average 73%. Previous semester unknown due to teacher transition
 - o Students were successful at performing hand on classroom assignments
 - o No internships available in the area

Follow-up

- The data will be evaluated to improve teaching techniques
- The data will be evaluated to help us remain up to date with technology changes.
- With the loss of our maintenance contract with the Turbine manufacture due to them going bankrupt bring the turbine down during class would be a good addition for the students and would get maintenance down on the turbine.

Budget Justification

• Update textbook to include changes in technology

• Update classroom equipment to keep pace with changes in technology