**The College of New Jersey**

**Civil Engineering Department**

**Thailand Water Supply System Senior Project**

Meeting 12: Minutes

Date: Tuesday, January 31, 2012 1:00 PM

Attendance: Dr. Horst, Advisor

Ian Burton, Project Manager

Jayme Lynch

Amanda Feeley

Summary:

The grouped first discussed the correspondence with Warm Heart. Dimensions for the tanks were provided to be 120 cm to 50 cm and cost 250 THB (approximately 9 USD). Along with the tanks, PVC specifications were researched and based on those, a check will be performed to ensure that the pressure does not exceed the capability of the pipes. Amanda inquired about the location of the WaterCAD program for her design. Most likely, if on TCNJ computers it would be located in the Transportation/Surveying lab. Ian found flies from the previous project that may help. She also inquired about slopes and elevation changes needed for the design. The surveying data was reviewed to use in the elevation change noting that the tanks will be lower than originally surveyed. Jayme completed a set of calculations that will determine the turbine required. Dr. Horst suggested she call manufactures or look at Micro-Hydro for pumps and turbines.

The construction of the project was briefly discussed. The tanks will be moved up the hill by the large number of workers in the town that were seen by the group this past May. Also, with the final design, the group will determine and contact Warm Heart to determine the need for a foundation.

For next week, Ian will contact Warm Heart for more estimates, Amanda will work and test out WaterCAD and Jayme will further explore Turbines and Pumps to choose the best of the design.