



November 23, 2011

NR1123

Press Release

Contact:
Jason Parent
Development and
College Relations Office
33 Edgemont Drive
Presque Isle, ME 04769
Phone: (207) 768-2808
Fax: (207) 760-1101
jparent@nmcc.edu

NMCC students conduct free comprehensive energy audit at home of Presque Isle senior citizen

Aroostook County - Students enrolled in an energy auditing course at Northern Maine Community College recently spent a Saturday putting into practice what they are learning while serving the local community. The nine students and their instructor Al St. Peter spent most of the day on November 19th in Presque Isle at the Dupont Street residence of a senior citizen, where they conducted a free, comprehensive energy audit.

The extensive process began when the students sat down with the homeowner to get a better understanding of home energy usage and hear about any trouble spots, cold rooms or other situations such as ice build-up on the roof. The students also assessed the homeowner's heating and electrical bills before beginning the hands-on part of the audit.

"An energy audit is the first step in determining where and what are the greatest areas of energy loss. The more students I train, the more information goes out in the community and eventually the more general public is educated about how energy, especially heat energy is wasted," said St. Peter.

Following the interview, the students and St. Peter examined the exterior of the house to include the roof, chimney, siding and water drainage and the home's interior, looking at things such as the amount of insulation in the walls and attic. They focused on finding problem areas using some of the new technology recently acquired by the College including a blower door, which serves as an important diagnostic tool to measure air leakage in a structure, and an infrared camera, which is used to identify areas of heat loss. The goal is to identify how many BTU's should be used to heat the structure. Students also checked the efficiency of the home's furnace to ensure it is running safely and efficiently.

"So many people think that all the heat in their home is going through the ceiling and if they throw a bunch of insulation up in the attic, that should solve their heat energy cost. There is so much more to it. For instance, heat goes to the coldest areas so insulating your basement walls is an easy and important heat stopper. Hot air rises because warm air is lighter but heat itself knows no gravity. Temperature is like pressure, if you have a leak in your home, heat will travel there first whether that is up, down or sideways," said St. Peter.

NMCC partnered on the project with the Aroostook Area Agency on Aging, which identified the senior citizen who received the free home energy audit. The intent of the project is to provide the service to a homeowner who would otherwise be unable to afford such a service.

Now that the energy audit is complete, the students and St. Peter will prepare their recommendations for how to make the home more energy efficient. A formal letter will be sent to the homeowner detailing the steps that can be taken to save money on heating costs.

In recent months, NMCC has greatly enhanced its curriculum to train students in the area of building weatherization. The alternative energy center opened by the College in Presque Isle's Skyway Industrial Park last spring is now home to the state's newest Weatherization Training Center. The facility, made possible through a \$220,000 grant from the Maine State Housing Authority, is one of only four in the state.

The Weatherization Training Center at the NMCC alternative energy center includes a pressure house that demonstrates a full range of pressure diagnostic measures under a wide variety of situations. The mini-home, located inside the lab area of the facility on Skyway Street is designed to help students learn techniques for insulating and air sealing.

#####



Northern Maine Community College student Bradley Therrien (left) of New Sweden conducts a review of the efficiency of the heating system of a Dupont Street residence in Presque Isle recently along with instructor Al St. Peter. Therrien was one of nine students who spent a Saturday with St. Peter conducting a free, comprehensive energy audit. The practical learning experience for the students enrolled in NMCC's energy auditing course also served as a community service project for all involved.