

## Town Hall Improvements Save Energy and Money

Report from the Charlotte Energy Committee,  
February 10, 2011, page 11

The Charlotte Energy Committee hired Building Energy to perform an energy audit of Charlotte's 16-year-old Town Hall. The audit was completed a little more than a year ago. It included an analysis of current fuel and electricity use, measuring where and how the building was leaking air using two blower door fans, infrared imaging, identifying how much insulation was present, testing the safety and efficiency of the boiler, and assessing existing lighting and electrical appliances.

Building Energy summarized the findings in a report that included a prioritized list of recommendations, which specified the estimated costs and savings. The Energy Committee used this report to apply for funding through the Energy Efficiency and Conservation Block Grant Program. A \$25,560 grant was secured, a scope of work was identified, and the project went out to bid last May.

Northeast Construction was the winning bidder and conducted the energy improvements. These included installing a drywall air barrier above the acoustical ceiling tiles, re-insulating the knee walls of the meeting room, upgrading two light fixtures and installing two new energy recovery ventilators (ERVs). The majority of the work was completed by the end of 2010. Building Energy then returned to the Town Hall the first week of January to measure the air leakage and balance the airflow from the ERVs. Results show a 38% reduction in air leakage and an estimated 24% in annual heat energy savings, which is equal to +/- 500 gallons of oil and five tons of carbon dioxide.

Committee member David Pill noted "We were pleased with how understanding and accommodating the Town employees were while undergoing the energy efficiency retrofit, considering the disruption that is inevitable during any renovation of this nature. The project was definitely a concerted group effort with Charlotte's energy committee, Dean Bloch, Selectboard members and the contractors Building Energy and Northeast Construction."

In other news, the Energy Committee has just been awarded four new energy monitors by the Vermont Community Foundation. Committee member Michelle Lussier says, "These energy monitors will allow us to clearly see peaks of use and define opportunities for further energy reduction."

The monitors will track electrical use in real time. Still to be determined are the building locations for each of the monitors. The Energy Committee will be holding open discussions about this energy-monitoring project and plans to report back to The Charlotte News

<http://www.thecharlottenews.org/pages/townhallimprovementsaveenergyandmoney.html>