

ENFIELD ENERGY COMMITTEE MEETING MINUTES of 12/16/2008 Approved

MISSION STATEMENT: To identify energy savings for the town and energy savings opportunities for the community

CURRENT GOAL: Our goal is a 10% reduction in total energy consumption by the Town by the end of 2009 with incremental decreases thereafter, toward a three year goal of 25 % reduction in total consumption by the Town (relative to the 2007 baseline data) by the end of the fiscal year 2011.

DATE/TIME: December 16, 2008 5:00 PM

LOCATION: Public Works Conference Room, 74 Lockehaven Road, Enfield, NH

I. Call to Order 5:07 PM

Attendance: Present, Alisa Bonette (Administrative Staff), Charlie Depuy (volunteer chair for the meeting), Wendell Smith, John Burritt (alternate), Rich Lammert, Carol Lammert. Absent, Steve Goldsmith (Chair person), Bo Petersson (alternate)

Guest: Kurt Gottardt

II. Approval of 10/28/ 2008 minutes Approved

III. Old Business

-Update on energy related projects around town (Shaker Village Sustainability project, Library Geothermal and ad-hoc groups studying Renewable Energy options for Enfield)

Wendell spoke to the Shaker Museum Sustainability Project. The Committee has encouraged our plan for installation of a 3 kilowatt micro hydro generator for the Mill building. This would serve as a demonstration of Shaker ingenuity as they used water power in that building; and, it would supply power to the building to save on purchased energy. It will require reconstruction of a part of the aqueduct water system that was built by the Shakers. It ultimately feeds a holding pond and then flows into a pipe that exists in the Mill building. Water would flow from the area into the existing water way.

Smith Pond dam reconstruction is being funded by private residents in the area. It will serve to establish a consistent water level to maintain its aesthetic value and provide suitable loon habitat. There has been consultation with conservation groups and the state DES, Department of Fish and Game, and the Town. The Town will take the dam itself when finished. The committee discussed other dams that are owned by the Enfield (the reservoir off Maple Street and George Pond). There were questions on the latter re; town boundaries and issues of water rights. There has been some interest in a private development of an alternative energy business at the tannery site 78 Main property.

Wendell reported that the Library Committee continues with energy efficiency including a geothermal energy system and many energy saving concepts as vetted in great detail by Bo Petersson sitting in with Wendell from this Energy Committee. The concepts in the building are

designed consistent with LEED concepts (though LEED certification is not being sought).
-Progress report on Town Energy Audit/Baseline consumption and impact/emissions data
Charlie offered his report that was submitted for the November meeting (which had been cancelled). Upon request he read the following report.

After consulting with Ken Daniels and discussing costs, we decided to replace for now the only thermostat in the Community Building with a programmable one, giving users access to temporarily over-ride the setting.

This is appropriate with a building which has intermittent use and lots of different users. The other buildings are more closely supervised, so will not benefit greatly from an expensive installation. The new thermostat will cost about \$200.00 to buy and install. Multiply this by the 25 or so thermostat (the PD building has 13!) in town buildings and the cost gets too high undercurrent circumstances for at the town budget. I have not yet looked into grants which might cover costs. I understand that Jordan Institute of NH still have a revolving loan fund for major building overhauls, which could include such conservation measures. The theory is that the savings in fuel costs offset the loan repayment expense. And other ideas for building upgrade grants?

The Police Department has finished monitoring electricity use with the loaned Kill a Watt and Smart Strip, which I will bring to the December meeting. Chief Crate is anxious to reduce energy use both in the building and the fleet of cruisers. He has already installed the relay switches in the cars to turn off unneeded accessories. He has told staff that the budget is frozen, so if they want new items, the cost will have to come out of energy savings. He has his officers competing to see who uses the least gasoline on patrol.

I am continuing to monitor energy usage for 2008 and will enter the totals into the EPA Portfolio Manager program. This will give us an extended '2007 - 08 baseline for comparison with '09. I expect some improvement in Whitney Hall, which had a new boiler installed late last year. Given the present economy, and despite the fact that Enfield had a busy building permit year, I think our focus should shift from energy savings to dollar savings in anticipation of a reduced tax base. This would mean deferring energy-related capital expenses for a while.

Discussion on various points followed. There was a question on the cost of the Community Building programmable thermostat. Charlie said that Ken Daniels was interested in installing a commercial grade unit and that a qualified person do the installation. It was thought that the work has been completed. Charlie noted that the Jordan Institute may be a funding source for future interests. Of concern is that currently each manager is responsible for the building in which he/she operates. Charlie cited another municipality that has saved a huge amount of revenue by hiring an Energy Czar to oversee municipal energy use and to recommend energy reduction measures. It is his thought that perhaps in the future such a position could be developed and the personnel could be shared among several area communities. A comment was offered that through Charlie's efforts there have already been energy savings for the town.

Charlie offered to write a report in preparation for the 2009 Town Meeting. Kurt offered a suggestion that the committee make known to the community suggestions for saving energy money. John noted that the information provided on the 2009 Calendar for the month of May has met with positive comments from associates. Wendell provided information on a web site that

provides a self study on fuel use appropriate to fleets of vehicles. Charlie will forward the information to Chief Crate.

-Update on Police Department energy usage

Charlie returned the Kill-a watt tool and the Smart Strip as the Police Department has completed its work with them. Alisa will forward these to the town Librarian, Marjorie Carr for use by the public. It was mentioned that it should be made public that these tools are available. Alisa will post the information on the town Website.

-Streetlight project update Review of the data collection of lights in town, discussion of current electric bill (outdoor lighting appears to account for more than half of the town's electric usage last month)

Carol summarized the current data that committee members have entered on the data sheets for the preliminary assessment. Of the 227 street lights in place, there was some information on 157 that have been evaluated. Some data could not be interpreted regarding recommendations. Of 133 lights committee members recommendations were to keep 61, convert 1 with a timer and remove 71. To summarize, the data recorded to date suggests that in the preliminary survey half of the town's street lights could be removed. Discussion followed re: what criteria was used for these recommendations. Reference was made to instructions for the task that were received from the committee chair. The committee determined that more study is needed to develop criteria for the committee to base their assessments. Reference was made to data received from Jaffrey (addendum 1 and 2 of the September Committee Meeting Minutes). Kurt suggested materials available on the Internet. He will forward this to committee members for their research. He made reference to a resource from Connecticut Light and Power which has a criteria list. Wendell added that in his survey people with whom he spoke were in favor of removal of the lights in their proximity. Members spoke to the hazard of doing the survey. Alisa will look into the availability of reflective vests to use when the individual is at the road side and the possibility of obtaining from the highway department a temporary flashing caution light for one's vehicle. The committee noted that pole numbers were difficult to understand and did not match the list provided. Kurt referred to a Nationalgrid resource on how to read a pole number. https://www.nationalgridus.com/non_html/shared_faq_app_rental_light.pdf Some numbers on poles are actually telephone pole numbers.

Charlie voiced his opinion that the town is overpaying, paying for lights when they are out and then paying a replacement fee. Use of facilities charges for monthly fees showed replacement of street light bulbs was \$900 for the month of October. It was suggested that the committee receive this report on a monthly bases.

Kurt stated that he has had discussions on placements of lights. He has developed three different lists with information on lights that exist, streets without lights and intersections with and without lights. He noted that half of the town's intersections do not have streetlights. Correlation of intersections with and without lights with data on accidents after dark may be of value. The members presented their individual perspectives on the function of street lights at intersections, as serving as a beacon or actually illuminating the driving area. Observations on existing lighting is that often lights are on poles in the vicinity of an intersection but do not actually light the road surface area. Members speculated on ways of marking an intersection with reflective tape on the pole or road surface paint and using less wattage if the light is perceived to function as a beacon. The committee agreed that street lights that seem to serve the purpose of illuminating one's private property should be removed to reduce the cost of lighting for the town. The property

owner should be consulted regarding making arrangements for establishing a self pay method. Kurt offered data on Enfield Street light costs that he received from Ken Daniels for 2007. (Information was converted to the following table for entry into the minutes.)

Enfield Street Light Costs

Type	Wattage	# of lights	Annual rental fee	Annual KWH fee	Annual KWH usage	Annual cost per light
Mercury	100	48	\$52.74	\$55.64	564	\$108.38
Mercury	175	11	\$64.12	\$89.97	912	\$154.09
Mercury	400	2	\$121.24	\$187.04	1896	\$308.28
Sodium	50	146	\$54.59	\$24.86	252	\$79.45
Sodium	100	18	\$66.17	\$48.54	492	\$114.71
Sodium flood	250	2	\$117.20	\$126.67	1284	\$243.87

The two 250 Watt sodium flood lights are on Shedd Street to illuminate a town garage and the other is in Huse Park.

The committee agreed that prior to the next meeting each member is responsible for reading the pertinent resource material suggested by Kurt and other sources and review the Jaffrey criteria and e-mail each other with their individual criteria for streetlight evaluation so that a relevant criteria can be determined.

The committee expressed the desire to move cautiously with this project. It should be presented to the Selectboard. John suggested using a tiered process for removing lights. Cost to the town should be the major emphasis. It was thought that the information at hand is not ready to be presented at Town Meeting in March. Members are to have their assigned light assessment task completed by the next meeting.

Kurt and John will do an assessment on 4A lights as a team.

The committee expressed thanks to Kurt for his diligence and work on street lighting.

-Update on Idling Awareness project

Rich presented the cost of posting signs available through the DES in 5 public areas. 5 signs and posts would cost as estimated \$400. He provided pictures of the parking areas suggesting placement of signs. Charlie presented that these are not the places where idling has been observed. It is his view that the areas where people idle vehicles are the bank, post office and the hardware store. It was noted that the intent of the committee was to first obtain Selectboard approval for promotion of Idling Awareness on town owned property. It was suggested that private businesses be canvassed to determine if they would agree to posting a free sign identifying the area as a no idling. For the next meeting members are to provide cogent arguments to be presented on Idling Awareness. There is a need to find funding. Education of the public on Idling Awareness could be provided by making pamphlets, flyers, etc. available at a table at Town Meeting. John mentioned that he found contacts unaware of how idling is not a cost savings technique (as noted on the 2009 Calendar for May).

IV. New Business

-Committee report fo the 2008 Town Report

The committee felt that content on street lighting and idling awareness be included. While the report is to written by Steve, Committee Chairperson, and the members are to offer suggestions. The report is due by January 9 to Alisa.

-Other

There was no additional new business.

V. Other Items

Next meeting - January 27, 2009 5 PM

VI. Adjournment

The meeting was adjourned at 7:04 PM

Respectfully submitted,

Carol Lammert

Committee Secretary

12/19/2008; Revised 1/23/2009; 1/28/2009