Ancram CSCTF Zoom Meeting - Notes

4/9/21

Present: Suzan, Madeleine, Derek and Jill

Suzan reported on the status of the HVAC project.

The committee decided to stay the course. Suzan will outline our reasons in a memo to Supervisor Bassin, to include the following:

Background of the NYSERDA Grant

It is the mission on the committee to find fossil fuel savings for the town of Ancram thereby reducing the town's carbon footprint. The town currently uses about 2,500 gallons of propane every year. NYSERDA grant funds were obtained to help achieve energy savings in town facilities. A potential energy savings that was identified by a consultant provided by NYSERDA was to replace the propane-fueled HVAC system at town hall with a heat pump. Estimates for a geothermal heat pump were quite high, so the town instead has been considering a cold climate air source heat pump system (ASHP). The burning of propane contributes to global warming. This system might eliminate the need to use propane for heat at town hall. It will certainly reduce it, even if supplemental heat from a propane system is still occasionally needed.

The committee suggests the following to reduce the costs of the ASHP system that has been proposed by the engineering firm retained by the town, CPL:

- Take out the energy recovery ventilator (ERV) component unless required by code. There is no ERV component currently, and there would not be one if a conventional system was installed to replace the existing system.
- 2. Leave the current HVAC system in place to provide supplemental heat (just replace the broken unit). The cold-climate ASHP system functions to -30° so a supplemental system may not be needed. In any case, if the decision is to replace the current system with baseboard heating that should be considered as a separate expense from this project as it's not required to move forward with an ASHP system.

If CPL does not modify its estimate, as suggested above, the projected cost of an ASHP is about \$252,500 (this includes CPL's fees). There would also be some increase in electrical costs over the current system. The following should be kept in mind when evaluating the cost:

\$71,0000 is available in NYSERDA grant funds for this project \$3,800, approximately, would be achieved in annual propane savings over the 15-to-20-year life of a new ASHP system (totaling about \$60,000)

\$5,000, approximately, should be available from NYSERDA for solar campaign with Solstice

\$3,000, approximately, will be available from Solstice (incentives paid to the town for signups, (assuming 30 enroll.

\$139,000 – Total savings available

\$113,500 – Total project costs (\$252,500 less \$139,000). This does not take into account increased electric costs.

CPL recommends that the current system be replaced with a dual fuel system that would provide some energy savings over the current system, but would rely on propane in cold weather. The ASHP component of this system is not cold climate. NYSERDA would likely not allow the use of grant money for this.

The following should be kept in mind when evaluating the costs of the dual-fuel system (estimated by CPL at \$70,000, including their fees):

CPL's proposal did not include a calculation of propane savings.

The town would be losing the \$71,000 grant, meaning the true cost of the system would be \$141,000.

The committee concluded that its recommendation would be for the town to proceed with the ASHP project.