



Town of Bridgewater Energy Committee

November 1, 2023

6:30 PM

The meeting will be held virtually via Zoom.

To attend via video, click on the link below:

<https://us06web.zoom.us/j/88070277924>

To attend via phone, dial: 1(646) 876-9923

Meeting ID: 880 702 779 24

MEETING AGENDA

Disclosure: Pursuant to Section 20 of Chapter 20 of the Acts of 2020, An Act Relative to Extending Certain Covid-19 Measures Adopted During the State of Emergency, and the March 31, 2025, extension granted by Chapter 22 of the Acts of 2022, this meeting for the Town of Bridgewater will be fully remote and accessible to the public through remote participation to the greatest extent possible. No in-person attendance is permitted. Citizens who wish to tune in to the meeting may do so via Zoom.

A. Call to Order

B. Approval of Meeting Minutes

- a) April 18, 2023
- b) May 15, 2023

C. Public Comment

D. Old Business

- a) Green Communities

1. Municipal Energy Tracking - MEI Audit Results

- b) Energy Aggregation Program - Update
- c) Solar Facilities on Public Lands - Update
- d) New Fire Station - Status Update
- e) Municipal Energy Source update
- f) Small Scale Wind Energy Zoning Ordinance (TBD)

E. New Business

- a) 2023 Green Committees Grant - Discussion and Vote on Supporting

F. Additional Items for Discussion

G. Adjournment of Meeting

Energy Committee

Carlton Hunt – Chair
Thomas Carson – Vice Chair
Kristen Zarrelli – Secretary

Academy Building - 66 Central Square
Bridgewater, MA 02324



Meeting Minutes for the Meeting Convening on 04/18/2023 Prepared by Kristen Zarrelli.

Link to Meeting Recording: <https://www.youtube.com/watch?v=nnZVhPiT-p0>

A. Call to Order at 6:31 PM

B. Members in Attendance – Carlton Hunt, Thomas Carson, Kristen Zarrelli
Guests in attendance – Bob Rulli

C. Approval of Meeting Minutes

- a. October 10th, 2022 – the motion to approve was accepted by Thomas and seconded by Kristen with no further discussion
- b. January 17th – the motion to approve was accepted by Thomas and seconded by Carlton with no further discussion

D. Public Comment - None

E. Presentation

Bob Rulli, Bridgewater's Director of Community and Economic Development, discussed:

- a. Revitalization of the Central Square area and the redevelopment of the campus Plaza site, Perkins Foundry site, and some other infill sites relevant to the MBTA zoning requirements.
- b. Revision of the zoning ordinances to include form-based code, a planning tool that lays out a checklist for developers about what the community would prefer in terms of building materials, types, location, street trees, renewable energy, and other factors. Memorization of this code would expedite development that satisfies the code.
 - i. This code could apply to mixed-use and housing developments in town
 - ii. Bridgewater has adopted the MA Stretch Code which will emphasize energy efficiency in building design
 1. <https://www.mass.gov/info-details/building-energy-code>
 - iii. If the code is not satisfied, the developer would have to follow traditional routes of obtaining approval.
- c. Incentives for developers to incorporate energy efficiency, renewable energy, and high-efficiency heating and cooling systems.
- d. A consultant to assist in writing the zoning amendment and the code modification.
- e. Town's eligibility for \$100,000 to \$300,000 of grant funding through the Mass Housing Choice program.

F. Old Business

a. Energy Aggregation

- i. The energy aggregation program has advanced significantly, and the Town Council has an order to explore it further and hire a consultant.
- ii. The Town Council sent it to the rules committee, who may discuss it in their next bi-weekly meeting

b. Goal reports

- i. The reports are being troubleshooted for readability.
- ii. The chair suggests condensing the reports into list-format.
- iii. Energy Initiative Goals and CPCT Conference
 1. UMASS Amherst's Extension school has Community Planning for Solar Toolkit:
<https://ag.umass.edu/clean-energy/research-new-initiatives/solarplanning>
 2. The Chair discusses using this Toolkit for the town to plan a municipal solar project for parking lots and other locations. The chair has connected with the program to discuss how to start the process.
 3. The Chair has made a powerpoint presentation on the available parcels of land for potential projects
 - a. Factors inhibiting projects for this topic:
 - i. Access to three-phase power lines
 - ii. Host capacity - What capacity the National Grid has for hooking into solar or wind energy projects
 - b. The chair has mapped out which parcels are suitable for this project and suggests a workshop to hone in on the topic
- iv. Energy Education Program
 1. The Chair discusses how the committee can create an education program and to discuss the workshop.
 2. The co-chair and secretary agree that creating bite-sized informative visuals will be helpful to get committee updates out there
 3. Chair suggests the committee take action to focus on solarization and public outreach topic in future meetings.

c. Big Belly Solar

- i. The committee discussed the possibility of moving the trash compactor and where to place it. It is suggested that the compactor be moved to Legion Field, and potentially to a center in town. The committee discusses the possibility of getting funding for the project and presenting it to the Town Council.

d. Municipal Energy Tracking and Solar Field Municipal Energy Supply

- i. The chair discussed Municipal energy tracking with the Municipal Energy Initiative (MEI) database including fossil fuel use, the new accounts added to the

database, and his request for the Town to obtain a list of all active Municipal electrical accounts.

1. FYI - The chair discussed funding opportunities for this topic with the Community and Economic Development Director
- ii. The chair indicated the Town's finance department has been unable to provide information on the solar electrical supply from the Fireworks Circle and the solar energy credit process due to pressing Town budget development.
- iii. The NGRID Solar Energy Credit process - deferred to a future meeting.
- iv. Small Scale wind
 1. The chair thinks the opportunity to utilize small-scale wind turbines could be included in the aforementioned form-based code
 2. Consideration of sample scale wind ordinance was deferred to a later meeting.

e. Sol Smart Designation

- i. The conclusion was the committee needed more information before deciding.
- ii. The concept would be that Bridgewater agrees to be a town committed to reducing its carbon footprint.

f. Affiliation with State Organizations

- i. Massachusetts Climate Action Network (MCAN)
 1. The secretary suggested connecting with MCAN to start a chapter in Bridgewater, but has not heard back from the South Shore Chapter for Bridgewater to be included
 - a. <http://www.sustainablesouthshore.org/>
- ii. Connecting with Green Communities Coordinator
 1. The Chair mentions that Green Communities South-East region coordinator Lisa Sullivan may be a resource the committee can utilize to obtain updates/information on opportunities for Bridgewater
 - a. The chair will take the action to send the secretary this information

G. New Business

a. PHIUS (Passive House Institute US)

- i. The Committee considered a proposal to advocate for PHIUS (Passive House Institute US), an international code for energy efficiency. The guidance includes energy consumption efficiency including building leakage tightness and efficient appliances.

- ii. The target on the new Stretch code is a HERs rating of 45, the lower the number, the better.

- iii. **New Fire Station**

- 1. The Chair presented information regarding potential energy conservation measures for the new fire station in anticipation of a discussion with the station's design architect.
- 2. The chair motions to send a letter to the building committee, in their deliberations, should consider following the PHIUS requirements for energy initiatives at the fire station.
- 3. The energy committee recommends that the fire station building committee consider energy efficiency as good as PHIUS or better.
 - a. The co-chair makes the motion for the building committee to look into this. The secretary seconds the motion.
 - b. The chair, co-chair, and secretary all vote Yes on this motion
- 4. The co-chair notes that there may be funding opportunities for this topic as well.
- 5. The chair will take an action to send the building committee a memo about PHIUS for them to consider in their discussions

- b. **Green Communities Grant Opportunities**

- i. The Chair discussed the Green Communities grant process which includes an opportunity for municipalities to apply for grant funds for decarbonization and energy efficiency projects.
 - 1. The chair is talking with the town planner to apply the grant to target buildings in town
 - 2. The first of a bi-annual application is due on May 3rd. The second round is due in the fall.
- ii. There are two types of Green Community competitive grant opportunities. The first is a competitive grant for up to \$200,000 for energy efficiencies; the second is for a multi-year decarbonization grant for up to \$500,000. The committee discussed whether the Town should apply for the lesser grant or the larger decarbonization grant. Projects that fully replace fossil fuel fired heating systems are prioritized.
- iii. \$200,00 Grant:
 - 1. Re-open once the project is finished, which has a target of 1-year.
- iv. \$500,000 Grant:
 - 1. Municipalities applying for this grant cannot apply for other project grants in this period. Awardees will be ineligible to apply for competitive grants for two years
 - 2. Applications to the 500,000 dollar grant will require a 25% project match by the town and have the following requirements:
 - a. Reduce greenhouse gas emissions
 - b. Be completed within three years of grant contract execution

- v. Two potential projects mentioned as possible applications for the decarbonization grant are the fire station (a new build) and the 1843 townhouse (a renovation).

c. Citizen Planner Training Collaborate Conference: Lessons Learned

- i. The Energy Committee Chair and Clerk attended the conference and provided preliminary information on lessons learned.
 - 1. Aforementioned Solar Planning Tool kit;
 - a. **Community Solar Planning Tool Kit:**ag.umass.edu/solarplanning
 - 2. **MA Resilient Lands Initiative and Healthy Soils Action Plan**
 - a. <https://www.mass.gov/info-details/resilient-lands>
 - 3. **MGL Ch.40A 5.3 9th paragraph - Zoning Act Exception**
 - a. <https://malegislature.gov/Laws/GeneralLaws/PartI/TitleVII/Chapter40A/Section5>
 - 4. **Agrivoltaics - Dual-use land - Solar/agricultural,**
 - a. Ch. 179, Acts of 2022
 - i. <https://malegislature.gov/Laws/SessionLaws/Acts/2022>
 - b. SMART Program for agrivoltaics
 - i. <https://www.mass.gov/info-details/solar-massachusetts-renewable-target-smart-program>
 - 5. **DOER Tech Potential of Solar**
 - a. <https://www.mass.gov/info-details/technical-potential-of-solar-study#:~:text=DOER%20currently%20administers%20the%20Solar,developed%20on%20less%20preferred%20land.>
 - 6. **Mass Audubon - Gaining Carbon — Modeling carbon, energy, and geospatial relationships:**
 - a. https://massland.org/sites/default/files/files/gaining_carbon_2-page_r.pdf
 - 7. **National grid hosting capacity map**
 - a. <https://gridforce.my.site.com/s/article/Massachusetts-System-Data-Portal>
 - b. <https://systemdataportal.nationalgrid.com/MA/>
 - 8. **Inflation Reduction Act —**
 - a. How much to increase 30% solar tax credit for residential solar?
 - i. <https://www.energy.gov/eere/solar/homeowners-guide-federal-tax-credit-solar-photovoltaics>
 - 9. **Act to Encourage Solar Development on Built and Developed Land S.2150**
 - a. <https://malegislature.gov/Bills/193/S2150>
 - 10. **BioMap3**
 - a. BioMap is an important tool to guide strategic protection and stewardship of lands and waters that are most important for conserving biological diversity in Massachusetts.
 - i. <https://biomap-mass-eoeea.hub.arcgis.com/>

11. MassGIS

- a. <https://www.mass.gov/orgs/massgis-bureau-of-geographic-information>
- b. <https://maps.massgis.digital.mass.gov/MassMapper/MassMapper.html>

12. SNEP Bylaw Review:

- a. <https://snepnetwork.org/bylaw-review/>

13. GRANT: Municipal Vulnerability Preparedness Program

- a. <https://www.mass.gov/municipal-vulnerability-preparedness-mvp-program>

14. GRANT: EPA Technical Assistance Grants

- a. <https://www.epa.gov/superfund/technical-assistance-grant-tag-program>

d. Alternative Energy Development and Strategic Planning

i. Energy Consultant

- 1. The Chair discussed his conversations with the Town Manager regarding potential solar field development on municipal property and the need for support to develop the concept.
 - a. Based on his input it was suggested the Town hire a consultant to support a Town-wide strategy for energy production and conservation including regulations.
 - b. Per the Chair's recommendation, a motion was made by Kristen and duly seconded by Tom for the town manager to hire an energy consultant to aid with strategic energy planning for Bridgewater.
 - i. The motion passed unanimously for the Chair to send a letter to the Town Manager advising the same.

H. Action Items

a. Chair (Carlton) –

- i. Send a memo to the fire station building committee to consider PHIUS recommendation.
- ii. Prepare a letter recommending the hiring of an energy consultant.
- iii. Send a letter to the Town Council regarding the adoption of Specialize Code

b. Co-Chair (Thomas) –

- i. Continue inquiring/making progress with Big Belly Solar
- ii. Connect with the broadcast station regarding public education opportunities.

c. Secretary (Kristen) –

- i. Compiling a list of useful links for people to click on and check out (also a review of the draft reports and categorize them accordingly.)

I. Future Topics

- a. Solarization
- b. Public Outreach – via broadcast, video clips, PowerPoints, etc.

J. Next Meeting Date – TBD, May - June

K. Adjournment of Meeting –

Carlton Hunt motioned to adjourn the meeting of the Energy Committee at 7:32 p.m. which was duly seconded. The motion was approved unanimously.

Energy Committee

Carlton Hunt – Chair
Thomas Carson – Vice Chair
Kristen Zarrelli – Secretary



Academy Building - 66 Central Square
Bridgewater, MA 02324

Meeting Minutes for the Meeting Convening on 05/16/2023 Prepared by Kristen Zarrelli.

Link to Meeting Recording: <https://www.youtube.com/watch?v=KcdiobxL8VU>

A. Call to Order at 6:31 PM

B. Members in Attendance – Carlton Hunt, Thomas Carson, Kristen Zarrelli
Guests in attendance – Josh McGraw, Pat Neary

C. Approval of Meeting Minutes

a. a) April 18, 2023 Meeting Minutes – deferred

D. Public Comment - None

E. Old Business

a. Update on unanimously passed committee votes from prior meetings:

i. Request to adopt Specialized Energy Code:

1. The chair explains the committee's request to the town council to move forward on the specialized code. In order for the adoption of the code to move forward, the town council would have to vote. This request was sent to the council on April 21st. The energy committee has not yet received a response from the council.

ii. Request For Proposal (RFP) to hire an Energy Aggregation Consultant:

1. The second town council request was to vote on the hiring of an Energy Consultant. The chair reiterates that the RFP is for a consultant to be contracted by the town to support the development of energy aggregation. The letter sent to the town council was received and is currently being acted upon by the town manager.
2. Josh McGraw comments that the documents specific to the topic are unable to be made public until June 1st.
 - a. The responses to the RFP will open up on June 1st. The deadline to respond is June 19th. The responses can be found on the state's website.
 - b. Josh cannot yet disclose how long the consultant's contract will be with the town, due to the current uncertainty of an official start date of the awarded contract.

b. Report Review

- i. The committee discusses consolidating previous reports and goals presented to the council and town manager into a shorter, more readable document that includes links. The committee also discusses adding links and information received from the Massachusetts Citizen Planner Training Collaborative (CPTC) conference that the chair and secretary had attended.
 - 1. The chair explains that information could be reported as a list of links to address the goal. The secretary agrees.
 - a. The secretary mentioned progress in creating two concise outlines that provide links to grant and tax credit opportunities. One list caters to the citizen planners' of the town, and the other caters to the residents.

c. Big Belly:

- i. The chair requests the co-chair to type this as a memo:
- ii. The co-chair discussed the incentive move the one Big Belly Bridgewater has. He also spoke to the highway department and the Recreation Commission. The commission ideally would like four big belly receptacles for:
 - 1. The Bridgewater common
 - 2. Basketball courts
 - 3. Legion Field
 - 4. Marathon Park
- iii. The prices for the Big Bellies are 7,500 as combined compactors.
- iv. Benefits of a Big Belly: the receptacles contain 5x the amount of trash as a normal trash barrel, cutting services while significantly cleaning the area.
- v. The chair will take action to mention the Big Belly and the benefit to the town manager. The co-chair adds in that it may be beneficial to look into town sponsors to off-set the costs.

F. New Business

a. Update on the request for PHIUS Standards for New Fire Station:

- i. The committee is scheduled for a workshop next Monday with the architect for the fire station building
 - 1. The secretary clarified that in a previous meeting, the memo/FYI to suggest following PHIUS building requirements for the new fire station's development was to be sent to the building committee.
 - 2. The chair takes the action to send the suggestion to the building committee as well as the architect for input, next week.

b. Public Education and Involvement

- i. The co-chair reports his attempts to contact Bridgewater TV (BTV) to make accessible the energy committee's aforementioned list of opportunities to the public. He emphasizes the importance of providing opportunities that are available to the residents and what they would benefit from.

- ii. The chair agrees that the committee should try to transfer the committee's information to the public regarding the current Energy Aggregation progress in the town, as well as the incentives for Solarization and Small-in.
- iii. The secretary suggests setting up a booth at town events to gain traction.
 - 1. The co-chair will take action follow-up on finding out who the organizers are for certain town and Bridgewater State University events to see if the committee would be able to promote at an event.
 - 2. The secretary shares hinghamnetzero.org as a resource for citizens to learn more about energy efficiency and incentives. The secretary expresses that Hingham as a model may be beneficial as the Bridgewater energy committee works on its own developments for grants and educational outreach.
 - 3. The chair explains that hiring the energy consultant mentioned previously could play a role in the formation of accessible resident resources as well as community outreach. Also mentioned properly citing the work of Hingham's energy committee to be shared with Bridgewater residents.
 - 4. The chair takes action to follow up with the town manager concerning the desire to have an energy consultant work on the setup of an outreach campaign.

G. Action Items

a. Carlton (chair) –

- i. Send the PHIUS building standards suggestion to the building committee as well as the architect for input.
- ii. Follow up with the town manager concerning the desire to have an energy consultant work on the setup of an outreach campaign.
- iii. Mention the Big Belly and the benefit to the town manager.

b. Tom (co-chair) –

- i. Follow-up on finding out who the organizers are for certain town and Bridgewater State University events to see if the committee would be able to promote at an event.

c. Kristen (secretary) –

- i. Send the document of links to the energy committee once finished

H. Next Meeting Date – TBD

I. Adjournment of Meeting –

Thomas Carlson motioned to adjourn the meeting of the Energy Committee at 6:59 p.m. which was duly seconded. The motion was approved unanimously.