

CLIMATE CHANGE ADVISORY COMMITTEE
MEETING MINUTES
June 23, 2022
9 a.m. – 12 p.m.
Rachel Carson State Office Building,
and via WebEx

MEMBERS/ALTERNATES PRESENT:

Chairperson Steve Krug	Rep. Sara Innamorato
Vice-Chairperson Marc Mondor	Greg Czarnecki (for Cindy Dunn)
Robert Graff	Joseph Sherrick (for Gladys Brown Dutrieuille)
Kim Kipin-McDonald	Adam Walters (for Neil Weaver)
Jaret Gibbons	Jason Kelso (for Gary Merritt)
Patrick Henderson	Rep. Perry Stambaugh
Terry Bossert	Jennifer Quinn (for Zakia Elliot)
John Bell (for Luke Brubaker)	Glendon King (for Rep. Daryl Metcalf)
Ben Sanchez (for Stephen McCarter)	

MEMBERS ABSENT:

Paul Morris, Alissa Burger, Lindsay Baxter, Jim Felmlee

PA DEPARTMENT OF ENVIRONMENTAL PROTECTION (DEP) STAFF:

Lindsay Byron, Andrew Hansrote, Christopher Nafe, Kerry Campbell, Darek Jagiela, Louie Krak, Kurt Klapkowski

INVITED GUESTS:

Vincent Martinez, Maureen Guttman, Marc Binder, Kathryn Semmens

MEMBERS OF THE PUBLIC:

Brian Smiley, Stephen Holcomb, Drew O'Neil, Robert Barkanic, Nate Wardle, Eli Brill, Attah Mbrah, Bethany Rieder, Katie Sneeringer, Anil Nair, Laurel Harduar Morano, Amal Mahrouki, Robert Routh, Brian Meilinger

MEETING:

The June 14, 2022, meeting of the Climate Change Advisory Committee (CCAC or Committee) was called to order at 9:03 a.m. by Chairperson Steve Krug. With 14 of 21 seated members present at the start of the meeting, a quorum was established. Chairman Krug introduced Louie Krak to the Committee who has replaced Sarah Pinter as the Executive Policy Specialist for Energy and Air offices of DEP.

MINUTES: The minutes of the April 14, 2022, CCAC meeting were presented to the Committee for approval. A motion to approve the minutes was made by Mr. Sherrick and seconded by Mr. Gibbons. There were no requests to edit the minutes by any members. The motion to approve the minutes carried by a voice vote and passed.

MEETING SUMMARY: (This narrative provides a summary of the discussions that took place during the meeting. It is not a transcript of the proceedings.)

Maureen Guttman, AIA Senior Fellow - Energy Solutions: Impacts of Energy Codes on GHG Reductions

Maureen Guttman discussed how building codes can help with climate change and greenhouse gas reduction. Ms. Guttman's presentation discussed the large scale positive environmental impacts of utilizing building codes, appliance standards, and building energy efficiency measures as well as leveraging market-based solutions to address greenhouse gas emissions and engage in climate action, noting that the buildings sector should be Pennsylvania's number one priority for climate action. She shared that more than 100,000 new buildings are built in Pennsylvania every year. She also shared that more than 50 percent of the commercial buildings in the US were constructed between 1960-1999 with no focus on energy provisions, leaving a great deal of potential for improvement in this sector. Ms. Guttman shared that the 2021 Climate Action Plan demonstrated that over 40 percent of the electricity in PA is utilized by buildings, therefore targeting building codes and improving energy efficiency measures can be some of the most impactful ways to reduce GHG emissions overall for the Commonwealth. She stated that the US Department of Energy's data supports this assertion; however, PA codes still need significant improvement and updates with energy efficiency requirements to achieve the potential that exists in this sector for greenhouse gas reduction. Ms. Guttman discussed barriers to improving energy-based building codes and what will be required to make the transition required to achieve climate-positive building sector goals.

DISCUSSION:

Mr. Graff asked Ms. Guttman to discuss the relative nature of building size, energy efficiency and energy use per square foot for building codes as many newer buildings are more energy efficient, but they are typically larger than the older buildings they are built to replace. Ms. Guttman commented that was a good point, but it was something she couldn't directly respond to, as building codes do not dictate the size of buildings or their location, and noted that zoning does. Ms. Guttman further stated that these types of issues do need to be considered. Chairman Krug noted that buildings are being built more efficiently, as there has been an overall reduction in building energy use despite an increase in both the number of buildings being constructed and their size.

Mr. Bossert stated that he would like to hear more about what can be done about to improve efficiency of existing buildings. Mr. Bossert further indicated that he felt we are too quick to demolish old buildings and put up new ones here in the U.S. compared to places like Europe, where they have buildings still in use that are 500 years old. Mr. Bossert was concerned that building efficiency codes could result in older, historic buildings being replaced with newer ones. Ms. Guttman mentioned that the greenest building is that that already exists and that improving efficiency of existing buildings is the most efficient way to reduce emissions in the building sector, particularly when considering expanded scope emissions and embodied carbon. Chairman Krug noted support for tools being utilized in locations like Philadelphia such as tax credits similar to what exists for historic buildings but to be applied to adaptive reuse of existing buildings. Vice Chairman Mondor noted that was particularly applicable for buildings like abandoned shopping malls. Mr. Bossert echoed the need for adaptive reuse of abandoned malls and shopping centers.

Marc Binder, UGI – Gas Utilities Energy Efficiency & Conservation: Incentive Programs

Mark Binder is the UGI manager of an efficiency and conservation program for the Gas Utility Company (utility rebate programs). Mr. Binder provided an overview of the energy efficiency and conservation smart rebate program which UGI offers. UGI offers programs for their natural gas customers similar to those required by Act 129. UGI voluntarily filed with the PUC to participate to encourage customers to increase efficiency with gas use. They offer both a residential prescriptive program for space and water heating equipment and rebates for small commercial entities as well. Mr. Binder advised that UGI provides rebates to builders for new construction homes that are 10-15 percent more energy-efficient than a home built to meet current codes. He added that residential retrofits, and low-income customers may qualify for these programs and that customers can receive up to \$100,000.

DISCUSSION:

Mr. Graff asked about the business case for this program, specifically what the benefits are for UGI. Mr. Binder responded that improved customer engagement and service is a benefit to UGI and that customers in Pennsylvania want these types of efficiency programs. Additionally, Mr. Binder indicated UGI is trying to make natural gas equipment and natural gas use more affordable and more sustainable. Chairman Krug mentioned that Act 129 is a law and a requirement and asked if UGI is responding to the market in offering their rebates and incentives. Mr. Binder indicated that UGI wants to be able to offer programs similar to those required of electric utilities in PA. Chairman Krug mentioned that in previous climate action plans establishing programs similar to Act 129 for natural gas utilities was one of the strategies suggested, and he asked if Mr. Binder knew of any oil companies with a similar incentive program. Mr. Binder indicated that he did not.

PUBLIC COMMENT: No public comments were presented at this meeting.

Kathryn Semmens, Science Director - Nurture Nature Center: Easton Climate Action Plan and Shared Energy Manager

Kathryn Semmens, of the Nurture Nature Center, presented on the City of Easton's Climate Action Planning. She shared that the City of Easton's Climate Action Plan was a collaborative effort between the City of Easton and the Nurture Nature Center. She described the stakeholder outreach involved in developing the plan, and noted that climate-related hazards were used as an entry point to engage the community. Ms. Semmens discussed how members of the community were engaged in citizen science to track observations of extreme heat through the ISeeChange app. Ms. Semmens outlined the City's objectives for their local climate action plan (LCAP), including building energy-efficiency objectives. She shared that the City also aims to decrease energy costs of low-income residents 20 percent by 2030, and has greenhouse gas emissions reduction targets of 30 percent by 2030 and 80 percent by 2050. Ms. Semmens gave a brief overview of the structure of Easton's Climate Action Plan and spotlighted specific strategies for increasing residential energy efficiency and the deployment of rooftop solar. Ms. Semmens then discussed the City's participation in DEP's Shared Energy Manager Program, which is a follow-on program to LCAP that assists communities in implementing their Climate Action Plans. As part of the program, Wilson Engineering conducted preliminary benchmarking for the city as well as developed an Energy Management Plan for Easton. Ms. Semmens shared that the next steps for the City of Easton is to develop a Climate Action Plan Dashboard, and administer a Climate Action Plan Advisory Task Force, which meets for the first time this July. The city has also submitted an application for NOAA's Environmental Literacy Grant for community outreach and education.

DISCUSSION:

Mr. Krug asked if Easton planned to extend their building benchmarking program beyond municipal buildings within the city or to adjoining municipalities. Ms. Semmens responded that the benchmarking program would be expanded to these entities on a voluntary basis and added that Lehigh Valley Planning Commission is developing a regional Climate Action Plan wherein benchmarking is expected to be a key strategy.

Mr. Henderson asked if the city intends to ban new natural gas hookups for residents and businesses in the city. Ms. Semmens responded that banning natural gas is not currently on the table, but it is something that could be brought to the Advisory Taskforce for consideration. Mr. Henderson expressed his concern about the potential for local legislation to ban natural gas hookups.

Vincent Martinez, President & COO – Architecture 2030: Decarbonizing the Built Environment

Mr. Martinez presented on decarbonization of the built environment, including topics on existing building decarbonization, embodied carbon, transit-oriented design, mass timber, and Passive Haus and LEED building certification. Mr. Martinez shared that, approximately 27 percent global emissions are attributed to building operations, and another 20 percent are attributed to embodied carbon of building material. He stated that in 2040, two-thirds of the global building stock will be existing buildings, and decarbonizing these buildings will require efficiency, electrification, and deployment of renewable energy to power these buildings. Mr. Martinez discussed different decarbonization strategies for both big buildings and small buildings. Mr. Martinez went on to discuss decarbonization of new buildings, and shared that the global building floor area is expected to double by 2060. He discussed Passive Haus and other low carbon building standards as well as opportunities for energy efficiency in low income houses. He noted that these building standards are starting to look more closely at embodied carbon of building materials and the energy efficiency of buildings. Mr. Martinez noted that the exterior built environment was equally important in decarbonization efforts, including bridges, roads, and landscapes. He briefly discussed the role of transit-oriented design and noted that building density and limiting sprawl are important strategies. Mr. Martinez also discussed material innovations for buildings, including low-carbon cement and wood-based buildings as a carbon storage strategy.

DISCUSSION:

Mr. Henderson asked if there is any focus on a larger scale on carbon sequestration in the building industry and noted that the concern should be the performance of a particular fuel rather than its source. Mr. Martinez responded that dealing with the emissions is the foremost point, and his industry is focused more on the demand side. Sequestration is more a supply side problem. He added that there are some opportunities in the design side such as vegetative materials (hempcrete), and there have been some discussions on buildings being used for sequestration of carbon.

DEP UPDATES:

Kurt Klapkowski, Acting Deputy Secretary of the Office of Oil and Gas Management, shared that the Bipartisan Infrastructure Law, also known as the Infrastructure Investment and Jobs Act (IIJA), allots \$4.5 billion nationally for addressing abandoned oil and gas wells, and PA will qualify for approximately \$400 million dollars to address these abandoned wells. He shared that states are entitled to spend some of this money on quantification of fugitive methane emissions. He shared that DEP staff are working with the National Energy Technology Laboratory out of Pittsburgh on related research and discussed existing guidance for measuring fugitive methane emissions. Mr. Klapkowski said that he would provide links to this information to be shared with the Committee.

Mr. Henderson asked for clarification on the use of public funds to plug wells if the department identifies a responsible party. Mr. Klapkowski responded that the Department does have the authority to plug those wells through the state Oil and Gas Act, but the Federal Department of the Interior has an expectation that states will use any financial assurance instruments available for cost recovery. Mr. Henderson added that operators cannot simply walk away from wells and continue to operate within the state. He also urged caution regarding the use of DEP data by third parties and noted erroneous reporting on the data by third parties.

Kerry Campbell, Program Manager for Energy Programs Office, provided an update to the Committee on IJA funding opportunities that Energy Programs Office is responding to, including \$18.5 million for the State Energy Program (SEP), \$8.1 million for the U.S. Department of Energy's (DOE) "Building a Better Grid" programs, DOE's Energy Efficiency Revolving Loan Fund Capitalization Grant Program, and DOE's Resilient and Efficient Codes Implementation Program.

Lindsay Byron provided an update to the Committee on the department's climate outreach activities since the last Committee meeting.

Next Meeting

Ms. Byron reminded the Committee that the next meeting will be held August 23, 2022, and will invite members to provide speaker recommendations for the meeting. She also informed members that CCAC officer elections are due to be held in August, and DEP plans to present on the Draft 2022 Pennsylvania Greenhouse Gas Inventory Report.

Mr. Krug asked for Committee member recommendations for speakers on electricity generation topics for the August meeting. Mr. Krug also reminded the Committee that it will be beginning preparation of the next Climate Action Plan in 2023, and he asked members to start making notes of items they would like to include in the next plan.

Adjournment

A motion to adjourn was made by Mr. Jaret Gibbons and seconded by Mr. Joe Sherrick. The motion carried, and the meeting was adjourned at 12:08 p.m.