Cambridge Climate Protection Action Committee CPAC BULLETIN

October 2016

<u>MEETING:</u> The Climate Protection Action Committee will meet on October 13th, 6:00 pm at City Hall Annex, 344 Broadway, 2nd floor community meeting room. The main topics of this meeting will be discussion of the process for the climate action plan, review of the Net Zero Action Plan progress, and committee business. The agenda for the meeting will be posted on the <u>Community Development</u> <u>Department website</u>.

EVENTS & MEETINGS

- Cambridge Climate Congress October 13, 19, & 26, November 2 & 12, various locations. The 2016 Climate Congress convened by Mayor E. Denise Simmons and chaired by City Councillor Jan Devereux and supported by Green Cambridge, Mothers Out Front, the South Asian Center, and HEET has begun to meet. There is still time to participate as a delegate at the remaining meetings. The theme is "building a community of response to climate change. For more information and to learn how to participate, click here.
- Passive House Symposium October 15, 9:00-5:00, District Hall, 75 Northern Avenue, Boston. An all day symposium on Passive House, a system for designing and building high performance buildings. Presented by Passive House Massachusetts. To see the program and register, click here.
- <u>Before the Flood</u> October 19, 5:30 pm, 1 Oxford Street, Harvard University. Pre-release screening of Before the Flood, a National Geographic documentary about climate change by Academy Award winning filmmaker Fisher Stevens and Actor/UN Messenger of Peace Leonardo DiCaprio. The screening is open to the public.
- Pathway to Zero Energy Buildings October 19, 4:30-6:00 pm. A session to learn what makes a zero energy building, the difference between site and source energy, potential design strategies, and cost impacts of going net zero. Presented by the Massachusettts Chapter of USGBC. To register, click here.
- <u>BASG</u> November 1, 6:00 pm, Venture Café, One Broadway. *Topic:* Highlights from the 2016 National Association for Environmental Management EHS Management Forum. *Speaker:* Johanna Jobin, Director of Global EHS & Sustainability, Biogen and Frank Marino, Senior Corporate Environment, Health, Safety & Sustainability Manager at Raytheon Company. <u>To register, click here</u>.
- From Sea to Changing Sea October 28, 9:00 am, Knafel Center, 10 Garden Street, Radcliffe Institute. A science symposium focusing on new research about the changing nature of the world's ocean and the questions that arise from that change. To see the program and to register, click here.
- <u>National Adaptation Forum</u> May 9-11, 2017, St. Paul, Minnesota. The call for proposals for presentations, panels, trainings, and work groups is open unitl October 14. For more information, <u>click</u> <u>here</u>.
- GreenBuild 2017 November 2017, Boston Convention Center. The international green building conference and expo of the U.S. Green Building Council will be held in Boston again next year. Persons interested in serving on the host committee or conference subcommittees should visit the USGBC Massachusetts Chapter website.

- Friends of Alewife Reservation Walks Friends of Alewife Reservation is a stewarding and educational non-profit for the Alewife Reservation in northwest Cambridge and for the surrounding city natural resources of marshes and wetlands abutting Belmont and Arlington. Free wildlife and history educational tours, clean ups and conservation initiatives for the silver maple forest. "Virtual" Tour of the Reservation: click here.
- 350MA.Org 350 Massachusetts is a volunteer-led, campaign-focused initiative connecting and organizing a strong grassroots coalition to address climate change and build a just and secure future beyond fossil fuels. Meetings are held every two weeks. All meetings are held at First Church Cambridge, 11 Garden Street, Cambridge, MA and begin at 6:30 PM. More info at www.350MA.org.
- Green Cambridge Green Cambridge is a 501(c)(3) not for profit organization and a founding chapter of the Massachusetts Climate Action Network (MCAN). Green Cambridge works to create a more sustainable Cambridge, and to protect the environment for the health and safety of all. Green Cambridge meets monthly at the Eastern Bank community room in Harvard Square, usually on the first Thursday of every month at 6:30pm. All are welcome and invited to attend! For more information and a listing of community events, please visit: http://www.greencambridge.org/.

NEWS

- <u>Cambridge Green Building Regulation</u> Beginning November 1, 2016, for any development project subject to Article 22 of the Zoning Ordinance the sustainable design and construction requirement in Cambridge -- the City will only accept the newest version of the US Green Building Council's LEED system, LEED version 4. Any project subject to Article 22 that has yet to start the development review process (i.e. Special Permit Application or Section 19.50 Compliance Documentation), will need to submit a LEED v4 narrative and checklist. This requirement coincides with USGBC's sunset date of October 31, 2016 for all LEED 2009 rating systems and older. For more information, email greenbuilding@cambridgema.gov or contact Melissa Peters of the Community Development Department at 617/349-4605 or mpeters@cambridgema.gov.
- New Flood Protection Guidelines The Cambridge Public Works Department issued a new brochure titled Flooding: Is Your Property Protected? The six-page brochure outlnes how protect buildings with flood resistant materials, exterior floodwalls, backwater valves, and elevation or relocation of utilities. This steps are important to consider as we see the risks of flooding evolving with climate change. To download an electronic copy of the brochure, click here.
- Governor Baker's Climate Change Executive Order Governor Charlie Baker issued an executive order on September 16th directing the Executive Office of Energy & Environmental Affairs to ramp up climate change mitigation and adaptation efforts by the Commonwealth and also directed the Department of Environmental Protection to promulgate regulations to satisfy the requirements of the Global Warming Solutions Act and meet the goal of reducing greenhouse gas emissions by 25 percent below 1990 levels by 2020. The Supreme Judicial Court ruled in May 2016 that under the Act, DEP is required to issue regulations imposing limits on greenhouse gas emissions for each year and that decline on an annual basis. The executive order requires DEP to publish a notice associated with the new regulations by December 16, 2016; consider limits on natural gas distribution system leaks, on emission permits and approvals, on the transportation sector or subsets, and on gas insulated switch gear. Within two years, the state is to release a climate change adaptation plan. Each of the Governor's secretariats is directed to designate a climate change coordinator. [Govenor's Press Relase, 9/16/16]
- Drastic Warming of Winter Projected for Mass. UMass Amherst researchers project through modeling that North America could see a sharp decline in freezing temperatures. In New England, the models indicate that by mid-century the number of days below 32 degrees Fahrenheit could decline from about 90 currently to about 20 days. This kind of change would have profound impacts on ecosystems, including

mosquito and tick species that carry potential diseases and are currently limited by cold temperatures. <u>The results were published in the Journal of Climate</u>. [WBUR, 9/16/16; UMass Amherst news release, 9/14/16]

- Mass. Energy Storage Strategy The Commonwealth released its State of Charge report on the opportunities and obstacles to greater deployment of energy storage in the electricity sector and lays out a strategy to grow energy storage by 600 megawatts. The report estimates the strategy could capture \$800 million in benefits for ratepayers. Energy storage in the electricity sector is seen as a game changer for the way we use energy to power our economy and lives.
- <u>Leaving the Carbon Economy</u> Cambridge resident Sue Butler created a documentary film about how she decided to take on her own carbon footprint and retool her house and her life to achieve as close to zero carbon emissions as possible. Her film <u>Leaving the Carbon Economy</u> was recently featured at the Globedocs Film Festival and was also shown at the Chain Film Festival.
- Planet Passes 400 PPM Threshold The Mauna Loa Observatory in Hawaii, one of the main monitoring stations for atmospheric carbon dioxide, reports that CO₂ levels in the atmosphere, the key driver of global climate change, is now over 400 parts per million and is likely to stay that way for the indefinite future. The 400 ppm threshold is symbolic, but NASA climate scientist Gavin Schmidt says it's not a tipping point. Preindustrial levels were estimated to be about 280 parts per million. To keep global average temperatures from increasing more than 2 degrees Celsius agreed to at the Paris Climate Summit, atmospheric CO₂ levels would need to be stopped at about 450 ppm. Climate scientist James Hansen advocates that a level of 350 ppm needs to be achieved to keep climate change from causing dangerous impacts. [New York Times, 10/3/16]
- Paris Climate Agreement Will Take Effect November 4 Enough nations have ratified the Paris climate agreement to take effect. The agreement, which was signed by 200 nations, was required to be formally ratified by 55 nations representing 55 percent of the world population. The agreement requires nations to set emission reduction targets and report their progress. The targets are not legally enforceable. [Voice of America, 10//16]

RESOURCES & IDEAS

- Green Infrastructure Toolkit The Georgetown Climate Center has released a new Green Infrastructure Toolkit. The City of Cambridge was part of an advisory committee for this project. The toolkit provides information about green infrastructure technology; how to pilot installations; how to scale up with planning, regulatory, incentive, and other tools; how to finance green infrastructure; communications strategies; and equity and environmental justice considerations.
- Renewable Energy Potential in Northeast According to an intensive modeling effort by the National Renewable Energy Laboratory, the eastern U.S. could get up to a third of its power from renewable energy within 10 years. The model addresses the challenge of dealing with renewable energy being an intermittent resource and specifically considers the Eastern Interconnection power grid. While the study shows it is technically possible, it would require major changes in the operational rules for the transmission system. [Vox, 8/31/16]
- Boston & Sea Level Rise Boston Magazine ran a feature story titled <u>The Storm is Coming</u> about the risks of sea level rise to Boston.
- DOE Sustainable Lab Accelerator The U.S. Department of Energy launched its <u>Better Buildings</u> <u>Smart Labs Accelerator</u> to advance energy efficiency in laboratory buildings owned by universities, corporations, federal agencies, hospitals, and national laboratories. Four national labs and the University of California, Irvine and the University of Colorado are the initial partners.

- <u>ASLA Resilient Design Guide</u> The American Society of Landscape Architects launched a <u>Resilient Design Guide</u>.
- Deep Value Retrofit Guide The Rocky Mountain Institute developed a practice guide for calculating and presenting the true value of a highly efficient and sustainable building. To access the guide, click here.
- President's Executive Order on Climate Change & National Security President Obama issued an executive order requiring that climate change impacts be factored into the development of all national security-related doctrine, policies, and plans. Twenty federal agencies and offices that work on climate science must collaborate to ensure the best information about climate impacts is available to strengthen national security through the new Federal Climate and National Security Working Group. The executive order was based on findings from the National Intelligence Council in their report Implications for US National Security of Anticipated Climate Change. [Washington Post, 9/21/16]
- <u>Teaching Machines to Recognize Trees</u> Researchers at ETH Zurich and the California Institute of Technology are teaching machines to recognize tree species to facilitate urban forest inventories and assessments. To see the scientific paper, click here.
- <u>Electrify Everything</u> Columnist David Roberts argues that the key to tackling climate change is to electrify everything. [Vox, 9/19/16]
- Adapting Portfolios to Climate Change The investment firm BlackRock released a white paper on Adapting Portfolios to Climate Change.
- Cities & Private Sector Collaborate on Climate Change CDP makes the case, based on analysis of data from 533 cities, that collaboration between cities, regions, businesses, and investors is key to achieving the goals of the Paris Climate Summit. Their report is titled It Takes a City: The case for collaborative climate action.
- Cambridge Climate Change Vulnerability Assessment The City is nearing completion of its climate change vulnerability assessment that will serve as the foundation for a climate change preparedness plan that will follow. The CCVA Report − Part 1 was issued in November 2015, which covers the risks of increasing temperatures and precipitation. A second report will be issued on the risks of sea level rise and storm surges. The project webpage provides background information and documents from meetings. Interested people can send an email to jbolduc@cambridgema.gov to be placed on the project email list.
- Cambridge Solar Map − The Cambridge Solar Tool provides a web-based interactive tool to find out the potential for installing solar photovoltaic systems on rooftops in the city. The tool also evaluates the financial feasibility of installations and makes comparisons to alternative investments. The tool is designed by Mapdwell and based on the research of the MIT Sustainable Design Lab led by Dr. Christoph Reinhart. The City's Cambridge Energy Alliance program can assist interested property owners with finding installers and understanding the financial aspects. The Mapdwell tool was upgraded in September 2015 and can now be viewed in Spanish.
- Opt Out of Unwanted Mail Do you get unwanted mail from retailers, credit card companies, or cable/phone companies? You can opt out of mailings from over 4000 companies with Catalog Choice and help reduce waste. For example, you can stop getting weekly circulars from Global Direct, they will honor opt-out requests, so add them to "your choices". Just register for FREE at https://cambridge.catalogchoice.org to create an account to start cleaning out your mailbox. To date, over 3700 Cambridge residents have signed up and opted out of nearly 25,000 different unwanted mailings!
- MBTA Rider Tools The MBTA has a number of <u>rider tools</u> that help riders to anticipate arrival times of buses, subways, and commuter trains and to receive alerts of delays. These tools can be used on iPhones, Android phones, text messges, emails, and the Web. There is also a trip planning tool.
- Cambridge Energy Alliance The Cambridge Energy Alliance, a program of the City of Cambridge Community Development Department helps residents, businesses, and organizations to obtain energy

efficiency and renewable energy services. You can sign up for energy audits and ask questions through the energy advisor service.

About the CPAC Bulletin:

The Climate Protection Action Committee (CPAC) is a City of Cambridge advisory body appointed by the City Manager to assist in the implementation of the Cambridge Climate Protection Plan. Please forward this bulletin to other interested people. Anyone who would like to be added to the email distribution list should contact John Bolduc at jbolduc@cambridgema.gov or 617-349-4628. For more information about Cambridge climate protection activities, see http://www.cambridgema.gov/climate. Recent issues of the CPAC Bulletin are posted on the webpage.