![Metropolitan Washington Council of Governments logo]

Climate, Energy and Environment Policy Committee (CEEPC)

MEETING SUMMARY: JULY 25, 2018

CEEPC AND BEEAC MEMBERS IN ATTENDANCE:

- Hon. Mary Lehman, Prince George's County (Chair)
- Hon. Mary Cheh, District of Columbia (Vice Chair)
- Hon. Dan Sze, City of Falls Church (Vice Chair)
- Hon. Pamela Sebesky, City of Manassas
- Kambiz Agazi, Fairfax County
- Eric Coffman, Montgomery County
- Dennis Cumbie, Loudoun County
- Ira Dorfman, Greater Washington Region Clean Cities Coalition (GWRCCC)
- Cindy Dyballa, City of Takoma Park
- Stan Edwards, Montgomery County
- Bill Eger, City of Alexandria
- Ellen Eggerton, City of Alexandria
- John Friedman, Washington Gas
- Lisa Goldberg, City of Alexandria
- Susan Hafeli, Fairfax County
- Jenn Hatch, District Department of Energy and Environment (DOEE)
- Dawn Hawkins-Nixon, Prince George's County
- Rachel Healy, Washington Metropolitan Area Transit Authority (WMATA)
- Maureen Holman, DC Water
- Da-Wei Huang, Metropolitan Washington Airports Authority
- Charles Jackson, City of Alexandria
- Stephanie Kupka, City of Fairfax
- Robert Lazaro, Northern Virginia Regional Commission (NVRC)
- Gina Mathias, City of Takoma Park
- Dale Madearis, NVRC
- Kevin Milstead, Prince William County
- Shannon Moore, Frederick County
- John Morrill, Arlington County
- Scott Pomeroy, Scalable Strategies
- Nicole Rentz, Council of the District of Columbia
- Lindsey Shaw, Montgomery County
- Dann Sklarew, George Mason University
- Chris Somers, Arlington County
- Tim Stevens, Virginia Sierra Club
- Tamara Toles O'Laughlin, Air and Climate Public Advisory Committee (ACPAC)
- Khoa Tran, City of Alexandria
- Doug Weisburger, Montgomery County
- Edward Yim, DOEE

ADDITIONAL ATTENDEES:

- Michael Steinhoff, ICLEI (Trainer)
- Eli Yewdall, ICLEI (Trainer)
- Ann Bennett, Sierra Club

- Kathleen Daily, Sierra Club
- Michal Freedman, Sierra Club
- Jacob Hargrave, WMATA
- Debra Jacobson, Sierra Club/George Washington University
- Matthew Krupp, WMATA
- Meg Mall, Faith Alliance for Climate Solutions
- Steve Offutt, Green Business Roundtable
- Kiersten Washle, WMATA

COG STAFF IN ATTENDANCE:
- Steve Walz, COG Environmental Programs Director
- Maia Davis, COG Environmental Programs
- Amanda Campbell, COG Environmental Programs
- Leah Boggs, COG Environmental Programs
- Tim Masters, COG Environmental Programs
- Dusan Vuksan, COG Transportation Planning
- Erin Morrow, COG Transportation Planning

1. CALL TO ORDER, INTRODUCTIONS, CHAIR'S REMARKS
Mary Lehman, CEEPC Chair

Chair Mary Lehman called meeting to order. Introductions by those in attendance followed.

2. GREENHOUSE GAS (GHG) DRIVERS OF CHANGE OVERVIEW
Michael Steinhoff, ICLEI – Local Governments for Sustainability

Development of the Greenhouse Gas (GHG) Contribution Analysis Tool was funded by the US Department of Energy's Cities Leading through Energy Analysis and Planning (CLEAP) program. Several local governments participated in this project including Bellevue WA, King County WA, Aspen CO, Santa Monica CA, Delaware Valley Regional Planning Commission, and the Metropolitan Washington Council of Governments.

Community-scale emissions inventories and GHG accounting have been evolving since the mid-1990s, as interested parties began to look at national guidance and try to figure out how to measure emissions at the local scale. ICLEI drove a lot of the protocol development with the US community protocol. This was widely adopted by many communities across the country and even by many communities outside of the US. This lay the groundwork for the Global Community Protocol.

With ICLEI's ClearPath tool, the data is now a lot more accessible and easy to analyze, as it is not scattered across a million different laptops and spreadsheets. With the aggregation of all this data, it is now easier to understand trends at a higher level, as well as see how everybody is contributing to the large-scale picture. The development of the GHG Contribution Analysis Tool is going to certainly be another significant chapter in the history of GHG accounting as it continues to evolve. The Tool helps local governments understand the drivers of GHG change in their community and supports incorporating that knowledge back into decision-making processes.

There are many campaigns devoted to reducing carbon emissions, and many communities have signed up to one or multiple campaigns. Keeping track of all these commitments and knowing exactly what the commitment is and how to act in accordance with those goals is very important for telling these types of global narratives. Being able to track progress towards these goals and towards meeting these commitments is an equally important factor. All the incremental projects that

communities do to reach these goals is crucial, and now there is a way to keep track of the difference being made through these projects via the Contribution Analysis Tool.

The Tool essentially breaks down the GHG inventory and accounts for all the factors that are impacting changes in the inventory. In addition to emissions by sector other data inputs into the tool include items such as energy consumption, vehicle miles travelled (VMT), solid waste tonnage, and energy saved/emissions avoided from local community programs. The Tool outputs show and compare how much factors like population growth, weather, commercial development, and local programs have influenced changes in GHG emissions between inventories. The Tool allows the user to see what programs are working and which ones are not working so well.

Metropolitan Washington has seen some positive trends since 2005, although the 2015 GHG inventory for the region was slightly higher than the 2012 inventory. The Contribution Analysis Tool allows the user to understand what is contributing to the changes across comparative years. There has been a decrease in per capita VMT in the region, which is likely due to the regional transportation planning work within the region. Residential energy use decreased in many jurisdictions, and this is an opportunity to see what the impact of local programs has been.

Discussion:
Q – What lessons can be learned from these demo cities? What differences could inform what communities do?
Accounting for population growth is key in many places. Understanding population trends and accommodating for these types of changes is really important. This will also depend on the size of the community and it does have an impact when comparing cities or jurisdictions.

Q – It seems like commercial buildings were a significant factor driving emissions up or down in many of the demo cities. Metropolitan Washington has many mixed-use facilities, data centers, offices, and other buildings. It certainly has one of the biggest impacts in the region. What is it that leaders in the region may want to understand better with regard to this space?
It is important to realize that the tool needs inputs to understand the true dynamics at play. The tool will show commercial energy use, but there may be other aspects to consider. For example, a company may have data centers that drive up energy use, but they may also be offsetting that energy use with renewable energy that the user of the tool may not be aware of because they happen on a transactional basis. Finding out ways to incorporate that type of information would be useful.

Q – Is this scalable? Can it be scalable to smaller-scale areas such as neighborhoods or university campuses?
The toolkit has well-defined inputs for local communities. However, there are all kinds of applications for the tool and potential for others to extend its use to smaller-scale operations. It is certainly possible, although the tool wasn't created with that in mind. ICLEI has thought of creating a different version that is specifically for government operations, which could apply quite well to a university campus setting.

3. HOW CAN METROPOLITAN WASHINGTON ACHIEVE DEEP GHG REDUCTIONS?

Edward Yim, District of Columbia, Department of Energy and Environment
The District of Columbia has a few major drivers for reducing GHG emissions. In early July 2018, Councilmember Cheh, Chairman Mendelson, and Councilmembers Allen, White, and Nadaeu introduced legislation under the name Clean Energy DC Omnibus Act. It would codify the Clean Energy DC Plan, which sets goals to reduce GHG emissions by 55 percent from the 2006 baseline emissions by 2032.

A provision of the Act that will be a transformative driver will be the building energy performance standards (BEPS). The idea is to take the bottom 20 percent of performers with regard to building energy performance and make them into better performers through energy efficiency improvements that will ratchet up over time. This targets the bottom tier of performers and works to improve those buildings' performance.

Another provision of the Act that will drive down GHG emissions for DC will be a Standard Offer Service. Renewable energy would be offered as a standard service to all electric utility accounts. Over the next three years it would require the electric utility (Pepco) to purchase long-term contracts so that 80 percent of the standard offer service is renewable. By 2032, 100 percent of electricity sold in the District would come from renewables.

Q – If the whole region bought 100 percent renewable energy, how would that look in ICLEI's contribution analysis tool?
It would show up in the EPA's incremental eGRID factors.

John Morrill, Arlington County, Department of Environmental Services
Arlington County recently completed its GHG inventory for 2016, of which there were essentially three versions; location-based, market-based, and goal-based inventories. A location-based inventory was used to define a specific geographic location, and was utilized for Arlington, including places that are not usually included (e.g. the airport and the Pentagon). The market-based inventory allows for the inclusion of contractual purchases (such as renewable energy purchases). The goal-based inventory is based on other activities like the purchasing of carbon offsets, which are not covered by the market-based inventory.

Low energy buildings are one of the biggest factors that affect emissions in Arlington County, as they comprise two thirds of the jurisdiction's emissions. In 2017, the County had over 22 million square feet of EnergyStar certified commercial properties. There is a lot of office space, which continues to grow. The County had a green building bonus density incentive for a number of years, which continued to raise the bar for energy efficiency in buildings. Commercial property developers are also required to pursue loftier goals in order to get the bonus density for compliance with the County's voluntary agreement and building incentives. LEED certification has become a basic requirement, and the building owners have to provide the County with energy data for the following 10 years after construction. Net zero buildings are a possibility for future incentives.

Electrification of transportation is a second area of focus. The work is incremental and opportunistic at the moment, but the County is looking to work on a more strategic plan. Electric vehicles are going to be the major focus, which will lower emissions, especially with a changing fuel mix.

Lastly, renewable energy is another important focus. The County is researching the potential for a contractual, large, offsite renewable energy purchase, especially regarding private sector interests. Several Fortune 500 companies are already doing this. While utilities may have their own agendas and pace of change, it is possible to pursue wholesale transactions if there is sufficient scale.

Gina Mathias, City of Takoma Park
The City of Takoma Park is a much smaller jurisdiction compared to both DC and Arlington County. A major source of the City's GHG emissions is from residential energy use, as there is not the same scale of commercial building space. The City has focused a lot on their residential energy programs and incentives.

Through a challenge-based model, the City is encouraging residents to make the switch to renewable energy. The aim is to get people to choose renewable energy voluntarily because the City does not have the ability to have community choice aggregation and force everybody to switch. The City put

out an RFP in March and selected a supplier (CleanChoice Energy) and hope to reach a goal of 25 percent of residential energy use from renewable energy sources (about 1,700 accounts) by September 30, 2018. At the time of this meeting, 13 percent of residential energy use is from renewable energy sources, which represents about 300 accounts. This strategy is something that could be scaled and run every year, similar to a solar co-op. With greater uptake, the City would be able to negotiate better rates.

The other thing that the City will be pursuing this year is mandatory home energy scores at the time of a real estate listing, which is something a few other cities have done. It is a baby step towards mandatory efficiency standards for residential buildings. The expectation is that this will go to counsel after the August recess.

Ellen Eggerton, City of Alexandria
The City of Alexandria has had an environmental action plan from 2009, which the City is now updating. That plan made inroads into the City's GHG emissions. The action plan update is being undertaken incrementally; more than 70% of the 2009 plan's actions are completed or are now policy. The plan covers all the topics of sustainability in the City and it's scalable. The City is identifying things in transportation, energy and climate change, solid waste and making those a part of the City's policy and integrating that into all strategic and master plans, throughout all the areas of the City.

Transportation is a big focus for the City, and they are adding a new metro station in Alexandria, providing greater connectivity, and reducing the traffic. The City has reduced VMT per person by 12.5 percent. They are planning to have more bike stations and more walking paths to further reduce per capita VMT.

Buildings are a major contributor to the City's emissions. Alexandria is updating their green building policy. There has been a policy since 2009. Since 2009, 95 percent of all buildings have met the requirements of the green building policy, translating to about 10 million square feet of building space in the city. The City is also increasing community engagement and it's going to move forward with incremental improvements. The City has been installing thermal cameras in the library, as have other jurisdictions. Instead of starting with nothing, the City leveraged the work of neighboring jurisdictions and took the lessons learned to implement this project. COG helps to leverage the work so that jurisdictions work together and learn from each other.

Robert Lazaro, Northern Virginia Regional Commission
The Northern Virginia region is growing by 350,000 to 400,000 people every decade and it's projected to continue to grow. The region's regional GHG emissions per capita decreased by 16 percent despite having this type of population growth because there is a lot of work going on with cooperation and collaboration with local government partners.

The Northern Virginia Regional Commission (NVRC) had a consultant look at renewable energy purchasing for their local government partners. It is a very sophisticated procurement. NVRC has been talking to private sector entities about bringing together economies of scale for large-scale renewable energy procurement, which would make the grid greener and save a lot of money.

Solar is another core area for improvement, and Northern Virginia is pushing forward with the Solarize campaign. To date, they have had 232 contracts, translating to nearly two megawatts of solar.

There are big opportunities for energy efficiency. Dominion has implemented a fantastic weatherization program for seniors and for those in need that we are helping to promote. NVRC has been coordinating with Dominion Energy to help reduce the cost of transitioning to LEDs. One project

in Arlington County would have been close to $80,000, but will now only cost $10,000. Commercial Property Assessed Clean Energy (C-PACE) is starting to move forward in Arlington County as well.

Mary Lehman (CEEPC Chair), Prince George's County
Despite experiencing population growth, GHG emissions actually decreased by 12 percent, between 2005 and 2015. C-PACE legislation passed in Prince George's County. Green energy loan programs are moving forward. Transforming Neighborhoods Initiative (TNI) offers residents in low-income communities the ability to apply for grants to perform energy efficiency retrofits and to install solar panels. Prince George's County has ongoing EnergyStar certification and a green leasing grant to help existing office and multifamily building owners install energy and water efficiency retrofits and obtain US EPA EnergyStar certification.

4. HANDS-ON TRAINING: GHG DRIVERS OF CHANGE TOOL
Michael Steinhoff and Eli Yewdall, ICLEI – Local Governments for Sustainability

This segment of the meeting was used to run through ICLEI's contribution analysis tool. Eli provided guidance on its use, while CEEPC members used laptops to enter their jurisdiction's data (or regional data) into the tool for analysis. Ten COG member jurisdictions completed initial runs of the tool for their communities.

5. ADJOURN

The meeting was adjourned. The next CEEPC meeting is scheduled for Wednesday, September 26.