

# CLIMATE AND ENERGY PROGRESS REPORT

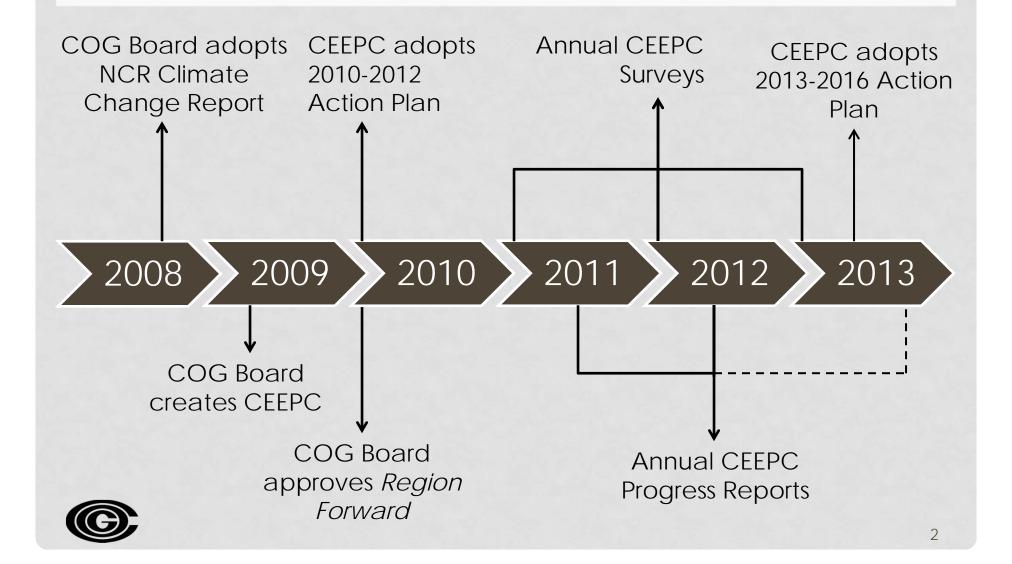
METROPOLITAN WASHINGTON COUNCIL OF GOVERNMENTS

MAIA DAVIS
CLIMATE, ENERGY AND ENVIRONMENT POLICY COMMITTEE MEETING

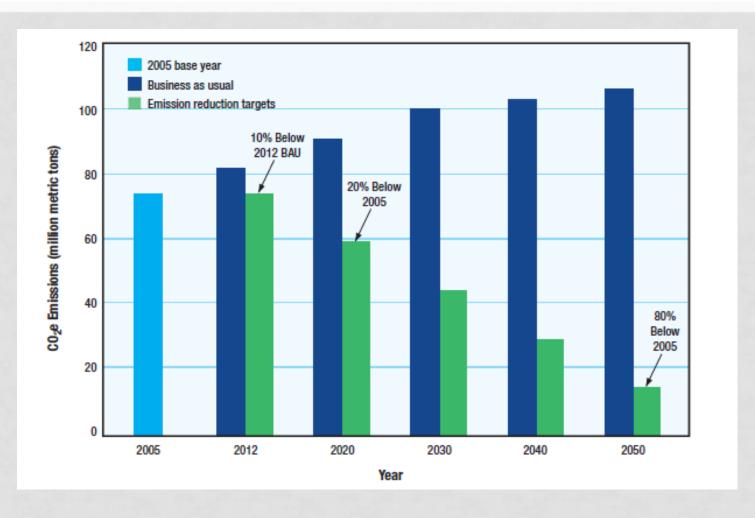
SEPTEMBER 25, 2013

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## **OVERVIEW**



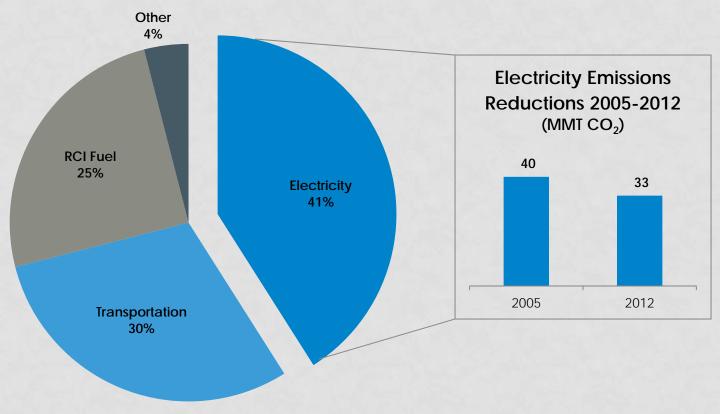
# REGIONAL GREENHOUSE GAS EMISSION REDUCTION GOALS





## GREENHOUSE GAS EMISSIONS

#### 2005 GHG Emissions by Sector





## GREENHOUSE GAS EMISSIONS

#### **COG Initiatives**

- Utility Data Request/Analysis to inform regional and local GHG inventories
- Training on Community GHG Inventories

- Annual regional GHG inventory
- Annual regional transportation sector inventory



## **ENERGY EFFICIENCY**

- 95% of local jurisdictions are in the process of tracking and/or benchmarking government building energy performance<sup>2</sup>
- Over 800 ENERGY STAR labeled buildings in the region, totaling more than 187 million square feet of floor space<sup>3</sup>



Environmental Performance Label at Central Library Photo Credit: Arlington County Environmental Services



## **ENERGY EFFICIENCY**

#### **COG Initiatives**

- COG actively promotes use of EPA ENERGY STAR Portfolio Manager
- Hosted 2 hands-on trainings of Portfolio Manager (2010 and 2012)

- Benchmarking workshop
- Set up Portfolio Manager Regional Master Sharing Account



## GREEN BUILDING

- USGBC named DC,
   MD and VA in the top
   10 states for LEED in
   2012<sup>4</sup>
- In the National
   Capital Region alone, there are over 700
   LEED projects certified, totaling more than 177 million gross square feet<sup>5</sup>



Green Roof at Walter Reed Community Center
Photo Credit: Arlington County



<sup>&</sup>lt;sup>4</sup> Source: <u>Top 10 States for LEED in 2012</u>

<sup>&</sup>lt;sup>5</sup> Source: Public LEED Project Directory

## GREEN BUILDING

#### **COG Initiatives**

 2010: COG awarded \$96,000 to fund 62 local govt members to attend the International Code Council (ICC) final action hearing and vote on adoption of 30 percent more stringent building codes

#### FY 2014 Plans

 COG look into funding opportunities to send representatives to the October ICC public comment hearing to vote on final changes to the 2015 International Energy Conservation Codes (IECC)



## RENEWABLE ENERGY

- 2,897 grid connected renewable energy systems operating in the region with a total capacity of 26,811 kW<sup>6</sup>
- 73% of jurisdictions have renewable energy system(s) on local government property<sup>7</sup>



Photo Credit: Argonne National Laboratory



<sup>&</sup>lt;sup>6</sup> Source: COG Annual Energy Utility Surveys

<sup>&</sup>lt;sup>7</sup> Source: COG Annual Local Government Climate and Energy Surveys

## RENEWABLE ENERGY

#### **COG Initiatives**

- 2011: Solar America Communities Workshop
- 2011 present: Round 1 of regional solar cooperative procurement

- Round 2 of regional solar cooperative procurement
- Rooftop Solar Challenge



## **ELECTRIC VEHICLES**

- 500 estimated electric vehicles are owned in the region<sup>8</sup>
- 15,000 to 30,000
   electric vehicles are
   projected to be in the
   region by 20159
- 133 publically accessible EV charging stations are located in the region<sup>10</sup>



Electric Vehicle Charging
Photo Credit: Melissa Hincha-Ownsby



<sup>&</sup>lt;sup>8</sup> Source: # of registered EVs according to data provided by VA, MD and DC Motor Vehicle Departments as of June 2012

<sup>&</sup>lt;sup>9</sup> Source: Plug-in Electric Vehicle Estimator, Electric Power Research Institute, Palo Alto, CA: 2012. Projection is based on past hybrid sales, production estimates, and other studies

<sup>&</sup>lt;sup>10</sup> Source: COG Electric Vehicles in the Metropolitan Washington Region Report. Analysis as of April 2012

## **ELECTRIC VEHICLES**

#### **COG Initiatives**

- 2010: established Electric Vehicle Workgroup
- 2012: <u>Electric Vehicles in Metropolitan Washington</u> <u>Report</u>

#### FY 2014 Plans

 Looking into regional electric vehicle cooperative procurement for local government fleets



## **CLIMATE RESILIENCY**

- 2012 brought record heat waves, the Derecho thunderstorm, and Superstorm Sandy.
- Moving forward, the Chesapeake Bay Area is virtually certain to have higher sea levels and will very likely see higher temperatures and precipitation concentrated in heavier events<sup>11</sup>



Derecho Storm Damage in Falls Church, VA

Photo Credit: ClintJCL



## **CLIMATE RESILIENCY**

#### **COG Initiatives**

- 2010 2012: Awarded U.S. EPA Smart Growth Implementation Assistance and trained hundreds of regional leaders
- 2013: Summary of Potential Climate Change Impacts, Vulnerabilities, and Adaptation Strategies in the Metropolitan Washington Region Report

- Regional Climate Impacts Fact Sheet
- Advisory role in national and local climate resiliency initiatives



## MORE WORK TO DO!

## Set priorities for the 2013 - 2016 Action Plan

- 1. Develop consistent annual regional greenhouse gas inventory
  - Develop annual regional transportation sector emissions inventory
- 2. Encourage local jurisdiction participation in the Rooftop Solar Challenge
- 3. Green purchasing

