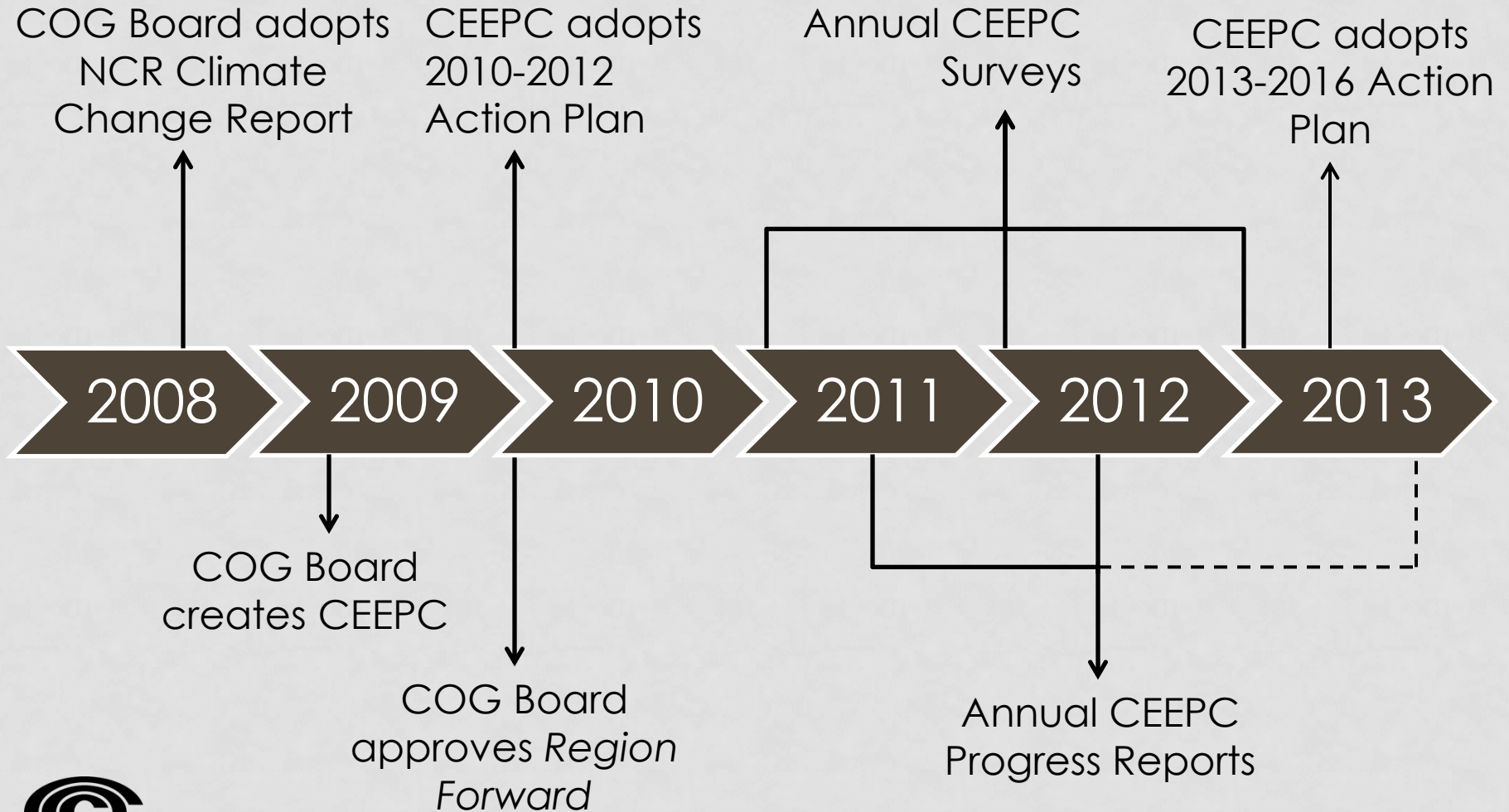




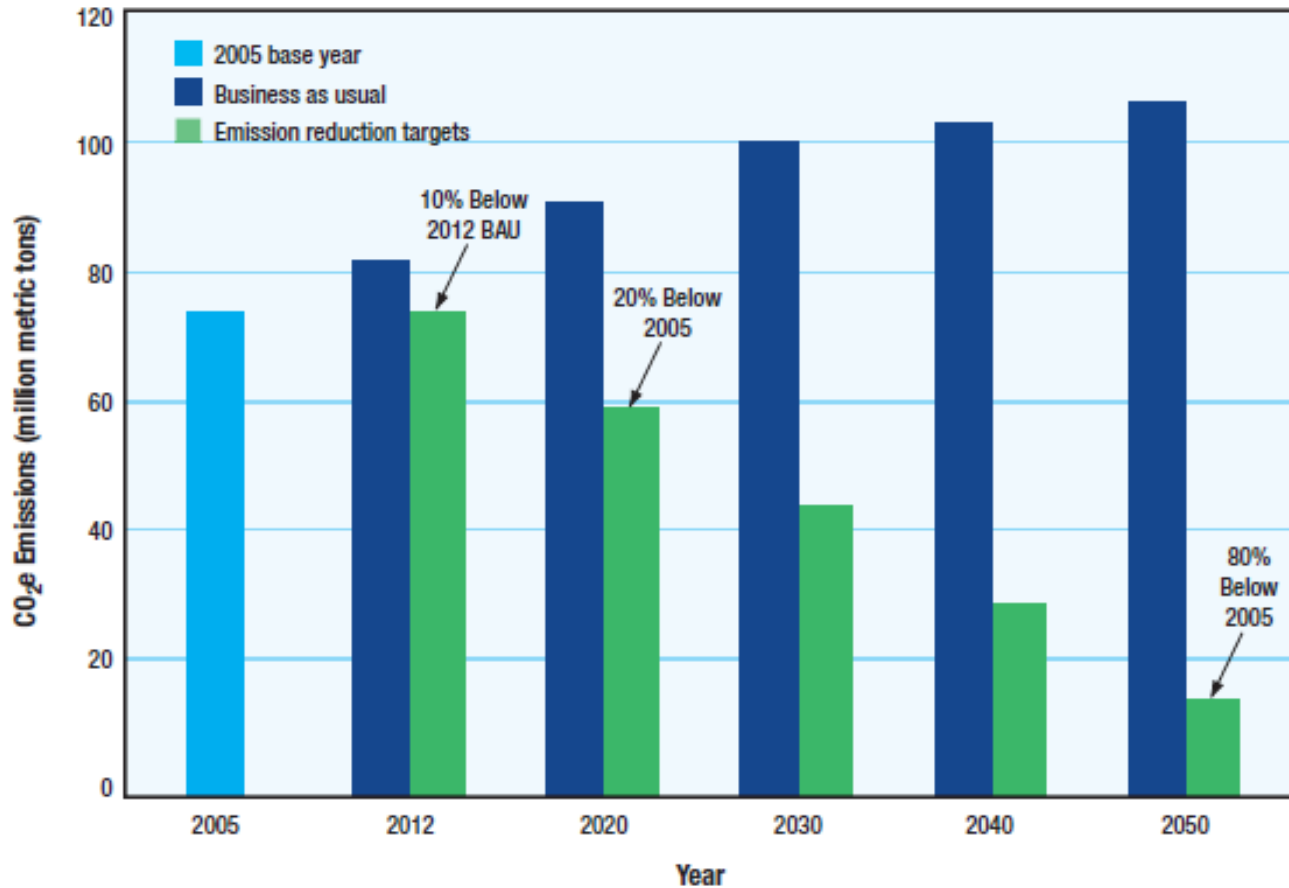
CLIMATE AND ENERGY PROGRESS REPORT

METROPOLITAN WASHINGTON COUNCIL OF GOVERNMENTS
MAIA DAVIS
CLIMATE, ENERGY AND ENVIRONMENT POLICY COMMITTEE MEETING
SEPTEMBER 25, 2013

OVERVIEW



REGIONAL GREENHOUSE GAS EMISSION REDUCTION GOALS



GREENHOUSE GAS EMISSIONS

Regional Highlights¹

- **68%** have completed GHG inventories for government operations and **68%** have or are in progress on completed govt plans
- **55%** have completed community-wide GHG inventories and **55%** have completed or are in progress on community plans



Photo Credit: Dale Lane



GREENHOUSE GAS EMISSIONS

COG Initiatives

- Utility Data Request/Analysis to inform regional and local GHG inventories
- Training on Community GHG Inventories
- Partnership with NVRC to develop regionally consistent GHG inventory protocol

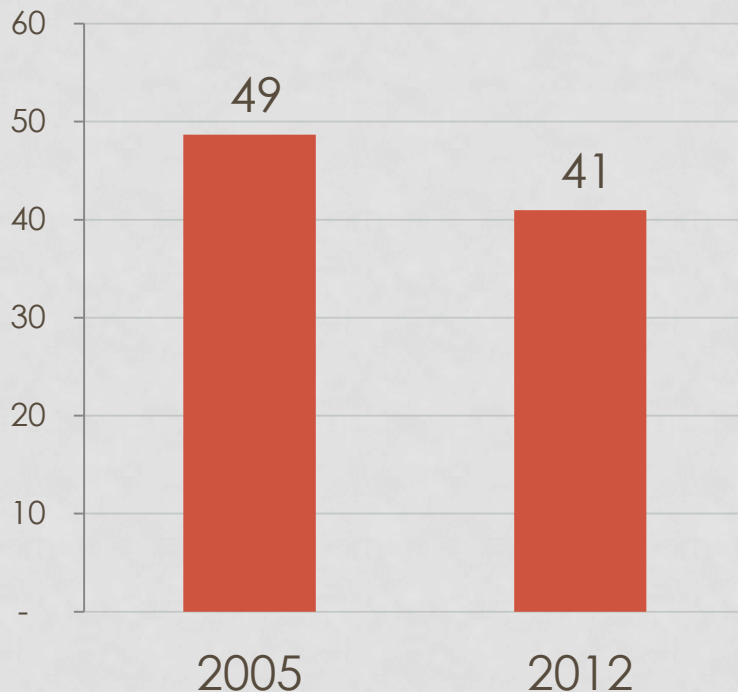
FY 2014 Plans

- Regional GHG inventory



GREENHOUSE GAS EMISSIONS

GHG Emissions From Electricity & NG (MMT CO₂)



- 16% decrease in utility emissions
- Emissions intensity of power plants in region down 26%
- Across PJM:
 - Emissions intensity down 15%
 - 4x more natural gas use
 - >20% decline in coal
- Analysis of transportation & stationary fuel emissions pending



ENERGY EFFICIENCY

Regional Highlights

- **95%** of local jurisdictions are in the process of tracking and/or benchmarking government building energy performance²
- Over **800** ENERGY STAR labeled buildings in the region, totaling more than 187 million square feet of floor space³



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



² Source: COG Annual Local Government Climate and Energy Surveys

³ Source: [Energy Star Certified Buildings and Plants Database](#)

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)

FY 2014 Plans

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



GREEN BUILDING

Regional Highlights

- USGBC named DC, MD and VA in the **top 10 states** for LEED in 2012⁴
- In the National Capital Region alone, there are over **700** LEED projects certified, totaling more than 177 million gross square feet⁵



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



⁴ Source: [Top 10 States for LEED in 2012](#)

⁵ Source: [Public LEED Project Directory](#)

GREEN BUILDING

COG Initiatives

- 2005: COG Intergovernmental Green Building Group (IGBG)
- 2007: COG Board adopted a Regional Green Building Policy
- 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)
- Green building and energy issues will be worked on in conjunction with the newly formed [Built Environment and Energy Advisory Committee](#) – a merger of IGBG and Energy Advisory Committee



RENEWABLE ENERGY

Regional Highlights

- **2,897** grid connected renewable energy systems operating in the region with a total capacity of **26,811 kW**⁶
- **73%** of jurisdictions have renewable energy system(s) on local government property⁷



Photo Credit: Argonne National Laboratory



⁶ Source: COG Annual Energy Utility Surveys

⁷ 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

FY 2014 Plans

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



ELECTRIC VEHICLES

Regional Highlights

- **500** estimated electric vehicles are owned in the region⁸
- **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 region¹⁰



Electric Vehicle Charging

Photo Credit: Melissa Hinch-Ownsby

⁸ Source: # of registered EVs according to data provided by VA, MD and DC Motor Vehicle Departments as of June 2012

⁹ 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

¹⁰ 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: [Electric Vehicles in Metropolitan Washington Report](#)

FY 2014 Plans

- Looking into regional electric vehicle cooperative procurement for local government fleets



CLIMATE RESILIENCY

Regional Highlights

- 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 events¹¹



Derecho Storm Damage in Falls Church, VA
Photo Credit: ClintJCL



¹¹ Source: [Dr. Raymond G. Najjar's Cleaning Up the Bay in a Warmer World presentation at COG's 2012 Climate Impact Symposium](#)

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*

FY 2014 Plans

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





QUESTIONS? COMMENTS?

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