

# Electric Vehicle Readiness Kick Start → → Stimulus Funding

- ChargePoint America Program, 2009
  - Coulomb Technologies \$30 mill from DOE ARRA
  - Partners GM, Ford, and SMART
  - 5,000 Level II chargers at no cost to 9 metropolitan areas
  - Washington Region: DC, Prince George's Co,
  - Frederick, Montgomery County; in VA: Alexandria, Manassas and Vienna

### The EV Project, 2009

- ECOtality North America –DOE award
- Initially \$99.8 mill; additional \$15 mill
- Partners Nissan and GM
- Install 14,000 Level II charges in 18 cities and the District
- No cost residential charger to qualifying participants of the program
- Majority of installation paid for by project





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### **Maryland EV Stimulus Funding**

- MD Electric Vehicle Infrastructure Program (EVIP)
  - ARRA stimulus funds, \$1,000,000 awarded to MEA
  - Electric Re-Charging Infrastructure (ECI): 65 charging station awards
    - Baltimore Electric Vehicle Initiative (BEVI), Montgomery County, Prince Georges' County, Frederick County
  - <u>Truck Stop Electrification (TSE)</u> grants for the installation of Truck Stop Electrification units at facilities throughout the State, I-95 Corridor





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# EV Workshop April 29, 2011

### - Purpose

- To examine successful local and regional EV readiness strategies
- To begin the conversation on a regional level on how to effectively and collectively transition to EV transportation technology

### - Content and Participants

- · Role of area utilities
- National and regional perspectives by DOE and industry experts
- Vehicle showcase of EV technology

### Expected Outcome

 A draft framework to establish a regional EV readiness network





# Why We Need a Regional Network and Strategy

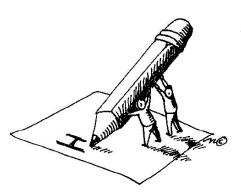
- Coordinated approach will smooth way for EV deployment & adoption
- Success of effort benefits the entire region
- Manage impact on the transmission grid as EV adoption grows



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# Regional EV Deployment and Infrastructure Plan Proposal



- 2011 Clean Cities
   Community Readiness
   and Planning for PEV
   and Infrastructure
   Solicitation
  - 2-year proposal

#### Partners

- Clean Cities Coalitions: VA, MD, DC
- <u>Utilities</u>: PEPCO, Dominion, NOVEC
- Regional Agencies: NVRC, ICMA, MNCPPC
- EV Initiatives: BEVI
- Training Agencies: National Alternative Fuels Training Consortium

### **EV Proposal (Cont)**

### Plan Objective

- Develop a plan for PEVs and all-electric vehicles and charging infrastructure in the NCR
- Establish a Regional EV Coalition
- 5 Main Tasks/Scope of Work
  - Electric Drive Vehicle Deployment Assessment
  - Charging Infrastructure Deployment Plan
  - Local Government Policy Plan
  - Training and Education Plan
  - Outreach and Communication Plan
- Proposal not awarded



# Revised EV Deployment Plan



#### Revised SOW

- Same objective
- 1-year plan
- 3 tasks instead of 5

### Two Work Groups

- EV Infrastructure Processes
  - Predict location of public and private charging locations
  - Identify private investment for private charging locations

#### EV Policy and Processes

- Permitting and inspection processes
- Building codes, zoning/land use
- Federal, state and/or local incentives

# Revised EV Deployment Plan (cont'd)



#### Members

- Local government transportation and energy planners
- EVSE manufacturers
- Georgetown Climate Center
- Electric Drive Transportation Association
- Electric Vehicle Association of Greater Washington DC
- Kick-off Meeting: Sept. 27th
- Next Meeting: Oct. 18<sup>th</sup>

### **NYSERDA Proposal**

- Northeast Regional EV Network Planning
  - In response to Clean Cities Solicitation
- Partners
  - TCI
  - Northeast & Mid Atlantic Clean Cities
  - Georgetown Climate Center
  - NASEO
- Deliverables
  - Establish stakeholder advisory group
  - Literature review of market barriers, electric grid impacts and existing plans
  - Data analysis of locations
  - Guidance and training documents for local building and , electrical code officials
  - List of recommended training courses for EV installers, permitters and inspectors



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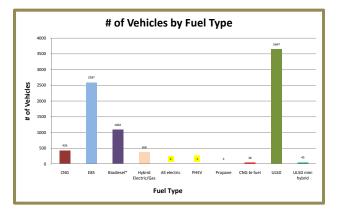
### **COG In-house Data**

- Travel Demand Model
- Household Survey
  - Both used to depict intensity of vehicle usage patterns
- Potential Vehicle Turnover Rate
  - Provides potential # of replacements by vehicle classification



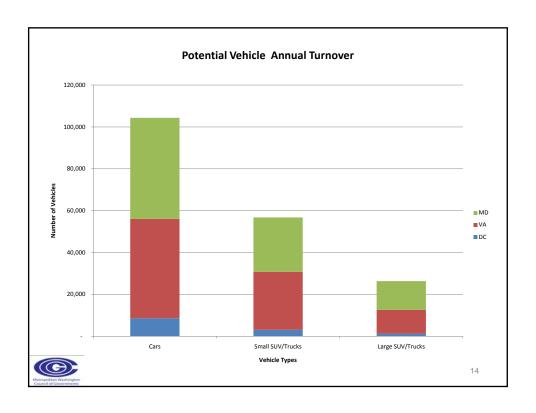


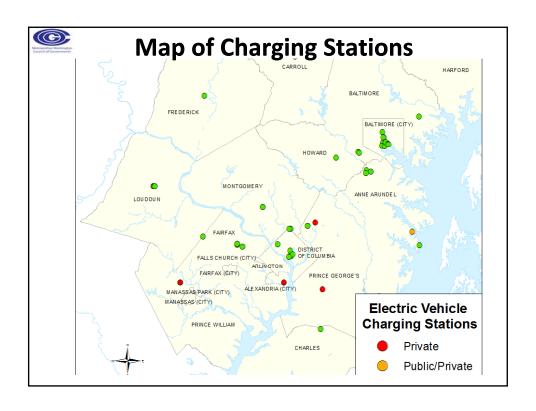
## Fleet Survey Results, Jan.2011



FUELS: CNG: Compressed Natural Gas, E85: Ethanol, Biofuels, Hybrid electric, All-electric, PHEV: Plug-in hybrid Electric Vehicle, Propane, ULSD: Ultra low sulfur diesel

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### **COG EV Planning Team**

**Joan Rohlfs** 

E: jrohlfs@mwcog.org

Ph: 202-962-3358

**Leah Boggs** 

E: <a href="mailto:lboggs@mwcog.org">lboggs@mwcog.org</a>

Ph: 202-962-3336

**Jeff King** 

E: jking@mwcog.org Ph: 202-962-3238

