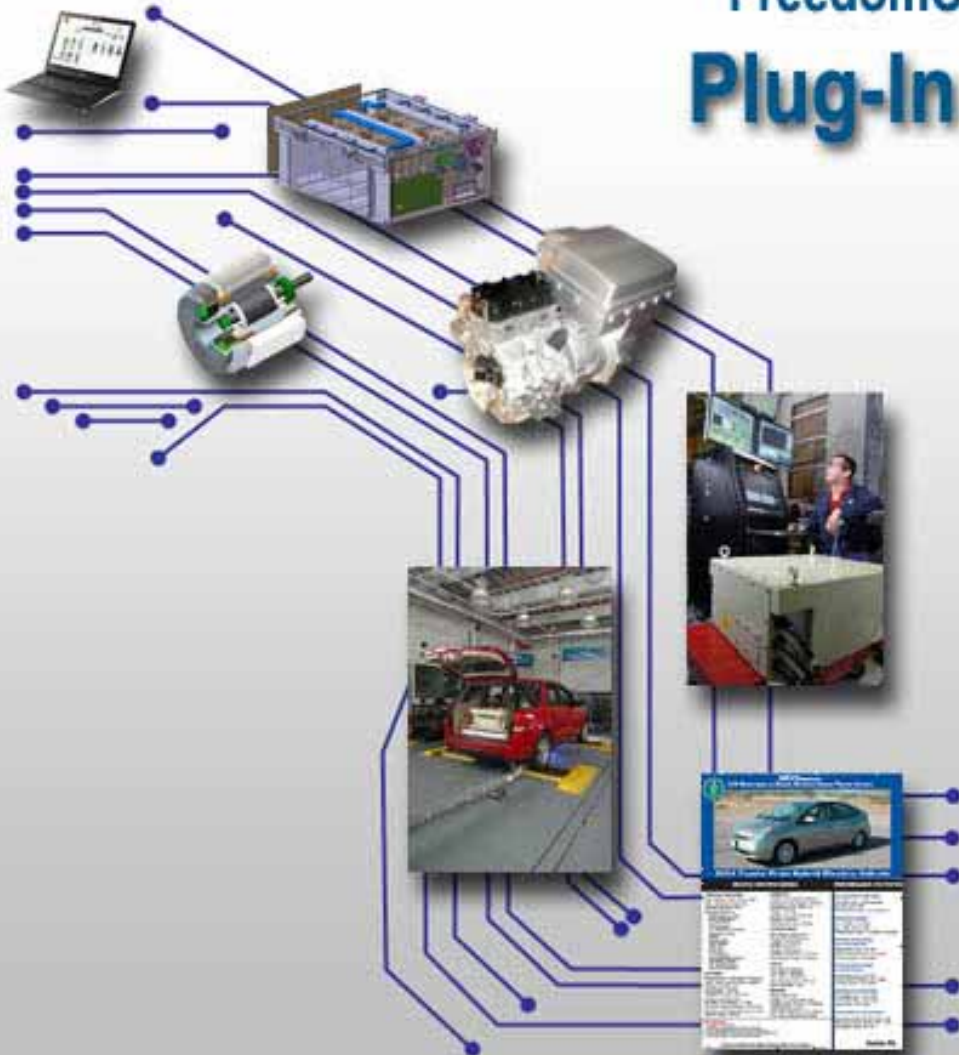




# U.S. Department of Energy Energy Efficiency and Renewable Energy

Bringing you a prosperous future where energy  
is clean, abundant, reliable, and affordable

## FreedomCAR and Vehicle Technologies Program Plug-In Hybrid Electric Vehicle R&D Plan



Rogelio Sullivan  
US Department of Energy  
PHEV Stakeholders Meeting  
June 13, 2007





U.S. Department of Energy

**Energy Efficiency and Renewable Energy**

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# Topics

- PHEV Challenge and Response
- Program Structure
- Technical Resources
- Schedule and Milestones



- DOE PHEV R&D plan was developed with input from a variety of stakeholders then posted on DOE website for comments in March 2007
- In April, FCVT received almost 30 comments from individuals, organizations, and companies
- Each of these comments were addressed and a working draft of the PHEV R&D Plan has been posted June
- FCVT welcomes continued input and feedback.



## Technology Assessment and Planning

Hybrid vehicle with 40 mi electric range to substantially displace petroleum in urban driving



### Analysis

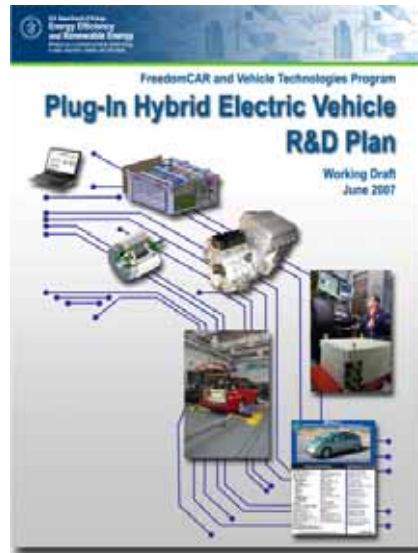
- Various configurations, electric ranges and control strategies
  - Component requirements
  - National benefits and impacts

### Testing



- Lithium-ion batteries
- PHEV conversions
- Standard procedures

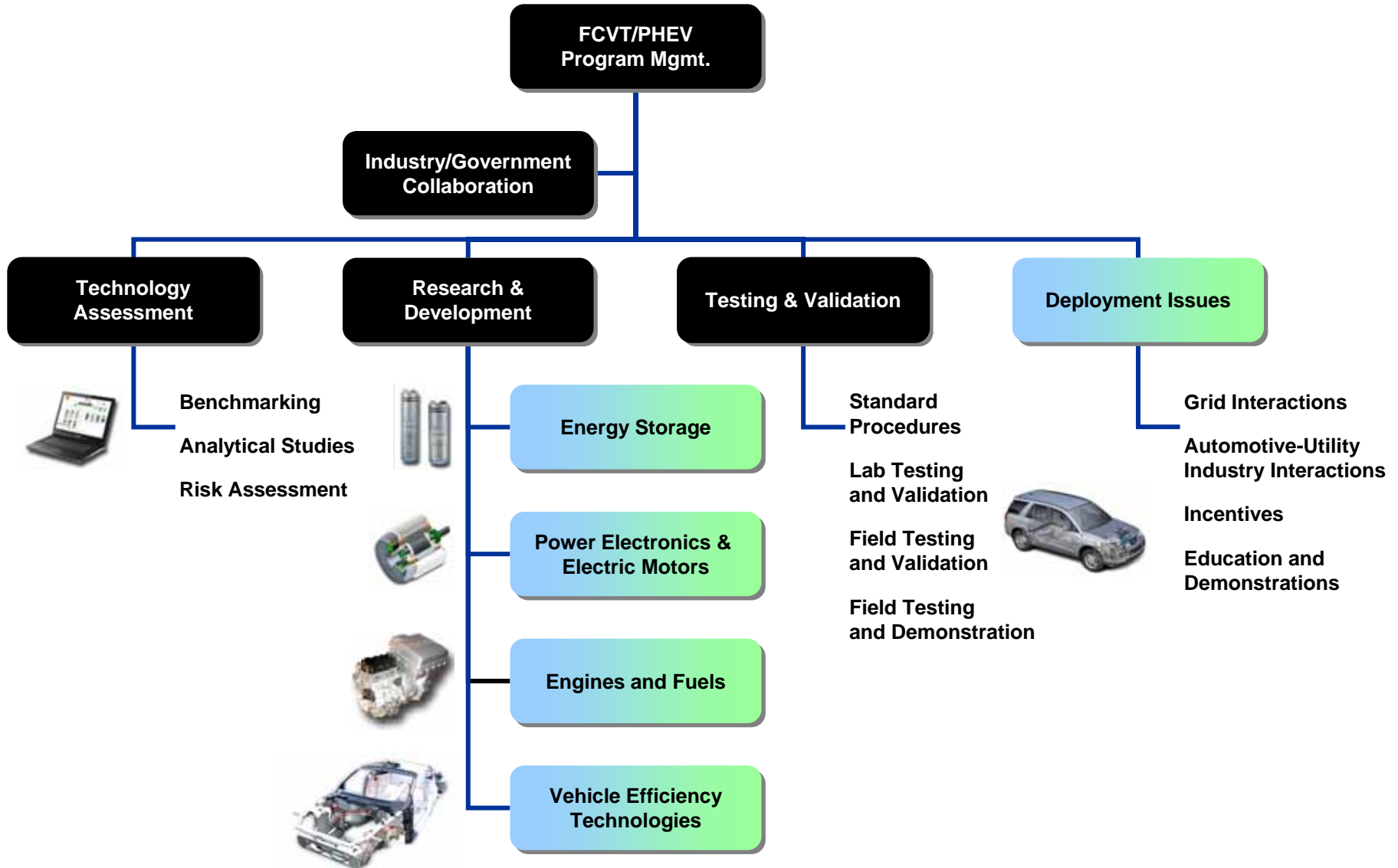
### Planning



### Solicitations

Power electronics, electric motors and batteries

- Analysis
- Development
- System Integration
- Testing & Validation
- Commercialization





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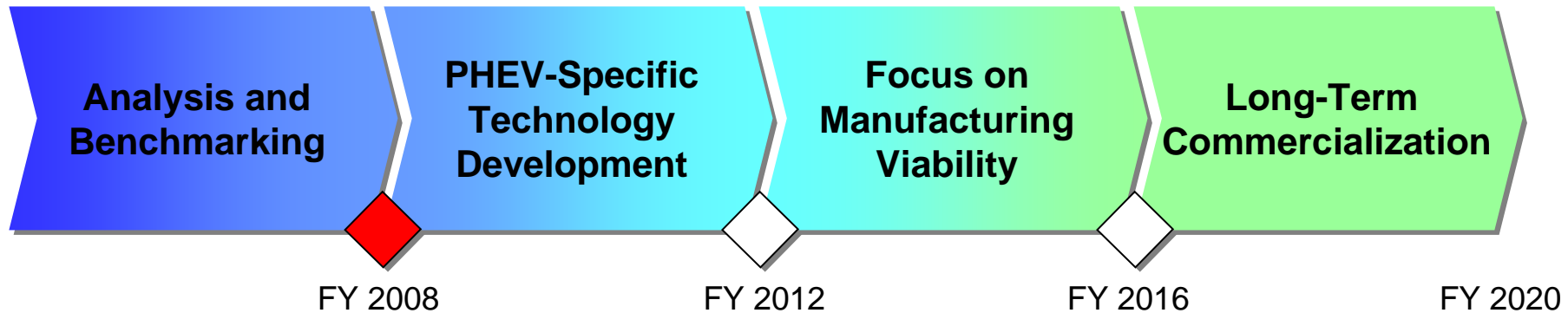
# Resources



... plus industry partners and university collaborators



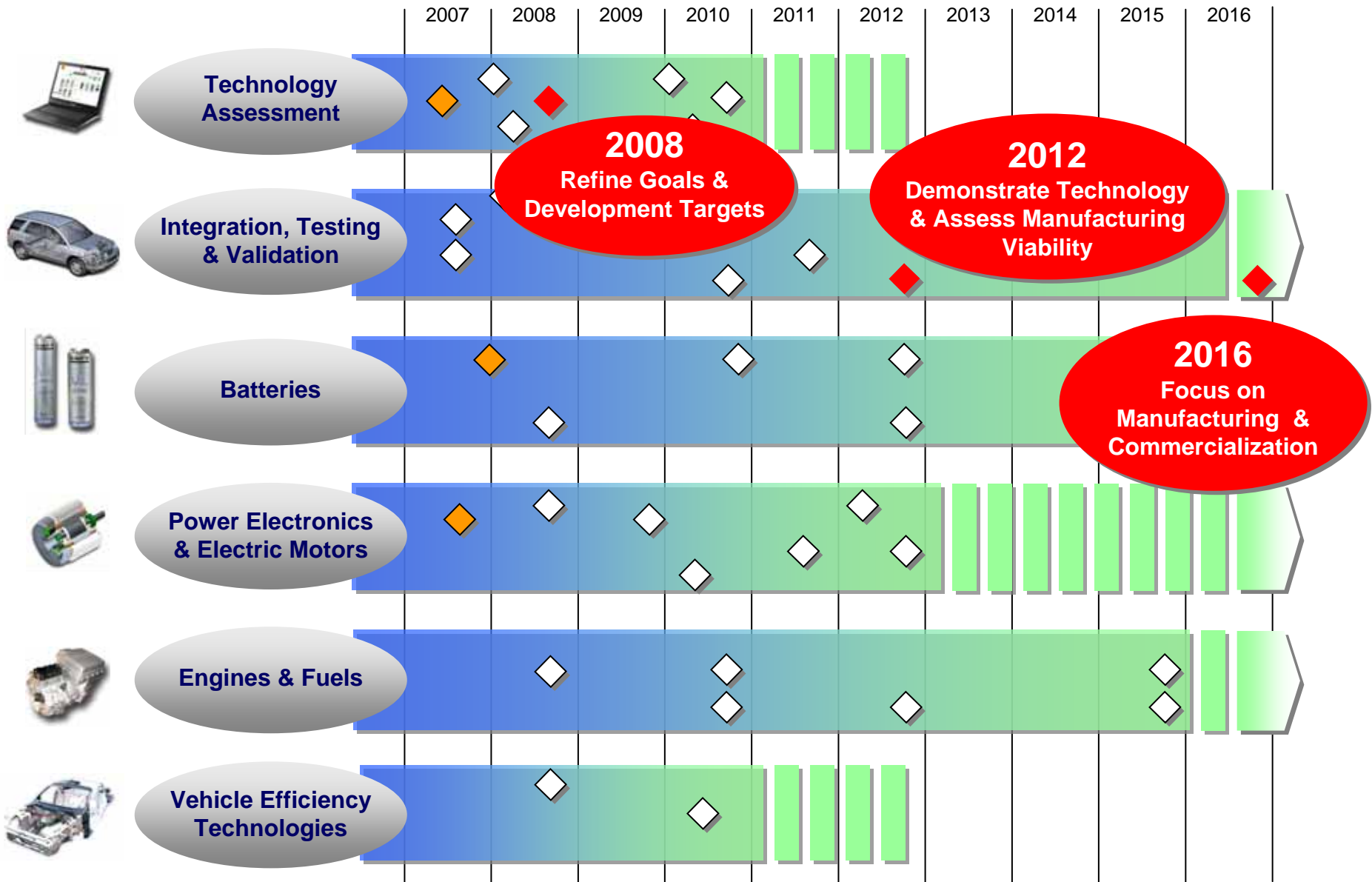
## Refine Program Goals & Development Targets



- Assess Component Development Progress in the Technology R&D Subprograms
- Refine Mid- and Long-Term Program Goals and Component Development Targets Based on the Results of the Analysis and Benchmark Testing
- Define Mid-Term System (Vehicle) Demonstration Goals



# Schedule and Milestones







**Plan available for download:**  
[www1.eere.energy.gov/vehiclesandfuels/](http://www1.eere.energy.gov/vehiclesandfuels/)

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