Investment Plan for the Alternative and Renewable Fuel and Vehicle Technology Program

Michael Smith
Fuels and Transportation Division
California Energy Commission

Advisory Committee Meeting
April 6, 2009
Investment Plan Status

- This report of the Energy Commission Transportation Committee reflects input from:
  - Advisory Committee at the January 8, 2009 meeting
  - Comments in public docket
  - Four public workshops (200 attendees)
  - Discussions with ARB, CALTRANS, DGS, SWRCB, CALEPA, Resources Agency, CPUC, other state and local Agencies, and stakeholders
  - Decisions by the Transportation Committee
Investment Plan Status

- Revised report includes changes to Funding Allocation Section:
  - Highlight rationale/compelling need for incentives
  - Describe transition to achieve GHG emission reductions in 2020 and 2050
  - Identify barriers, market conditions, technology status, vehicle production timing and capabilities, and anticipated demand for alternative fuels and vehicles
  - Itemize funding allocation by fuel/technology
Investment Plan Status

- Post Committee Final Report on April 8, 2009
- Seek Energy Commission adoption at April 22, 2009 Business Meeting
# Funding Allocation Summary

<table>
<thead>
<tr>
<th>Fuel Technology Category</th>
<th>Fuel Production</th>
<th>Fuel Storage and Blending</th>
<th>Fueling Stations</th>
<th>Vehicle Incentives, Non-Road, and RD&amp;D</th>
<th>Manufacturing Plants</th>
<th>TOTAL</th>
</tr>
</thead>
<tbody>
<tr>
<td>Electric Drive</td>
<td></td>
<td>$12 Million</td>
<td>$25 Million</td>
<td>$9 Million</td>
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<td>$46 Million</td>
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<tr>
<td>Hydrogen</td>
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<td>$40 Million</td>
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<td></td>
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<td>$40 Million</td>
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<td>Ethanol</td>
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<td>$5 Million</td>
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<td>$12 Million</td>
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<td>Renewable Diesel and biodiesel</td>
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<td>$4 Million</td>
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<td>Natural Gas</td>
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<tr>
<td>Total</td>
<td>$19 Million</td>
<td>$4 Million</td>
<td>$65 Million</td>
<td>$52 Million</td>
<td>$9 Million</td>
<td>$149 Million</td>
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**TOTAL with $27 Million for NON GHG Categories**

$176 Million
Electric Drive

- Provide rebates for 350 plug-in hybrid electric passenger vehicle retrofits for public fleets ($3.5 million)
- Cost-share development of 10 medium- and heavy-duty hybrid vehicle prototypes ($10 million)
- Support deployment of 125 projects for ports and truck stop electrification ($11.5 million)
- Co-fund upgrade of existing charge points and installation of new electric charging at 6,500 total sites ($12 million)
- Provide incentives for 5 manufacturing facilities and equipment ($9 million)
Hydrogen

- Form public/private partnership to co-fund a minimum of 11 hydrogen fueling stations corresponding to OEM roll out of fuel cell vehicles and achieve 33 percent renewable hydrogen use requirement ($40 million)
Ethanol

- Co-fund 20 ethanol feedstock and project feasibility studies for new plants ($3 million)
- Cost-share 2 new pilot plants using waste feed stocks ($4 million)
- Co-fund development of 50 E-85 fueling stations ($5 million)
Renewable Diesel/Biodiesel

- Cost-share 5 production plants using waste feed stocks ($2 million)
- Co-fund 2 fuel terminal storage and blending facilities ($4 million)
Natural Gas

- Co-fund deployment of 700 medium-and heavy duty vehicles for ports, school districts, and public fleets ($23 million)
- Provide rebates for 300 light duty public fleet vehicles ($2 million)
- Cost-share 20 fueling stations ($8 million)
- Co-fund development of 5 biomethane production plants ($10 million)
Propane

- Provide rebates for 50 school buses and 100 light-duty vehicles for public fleets ($2 million)
Non-GHG Categories

- Support 3 workforce training initiatives ($15 million)
- Fund programs to develop sustainability best management practices, standards, verification procedures and technical research ($4 million)
- Support public outreach and education programs ($1 million)
- Fund 3 technical assistance contracts ($1 million)
- Conduct environmental, technology and market assessments ($2 million)
- Co-fund standards and certification for hydrogen, biodiesel, and underground storage tanks ($4 million)
Contact Information

Michael Smith
Fuels and Transportation Division
California Energy Commission
1516 Ninth Street
Sacramento, CA 95814
916-654-4628
msmith@energy.state.ca.us