

Hydrogen Infrastructure Subcommittee Report

ACCELERATING THE HYDROGEN INFRASTRUCTURE

The Opportunity

- ◆ Transition carries risks and uncertainties, but holds great promise for reducing fossil fuel use and pollution.

The Challenge

- ◆ Simply stated, the near term challenge is transitioning to a hydrogen infrastructure while reducing the near term financial risks.

The Need

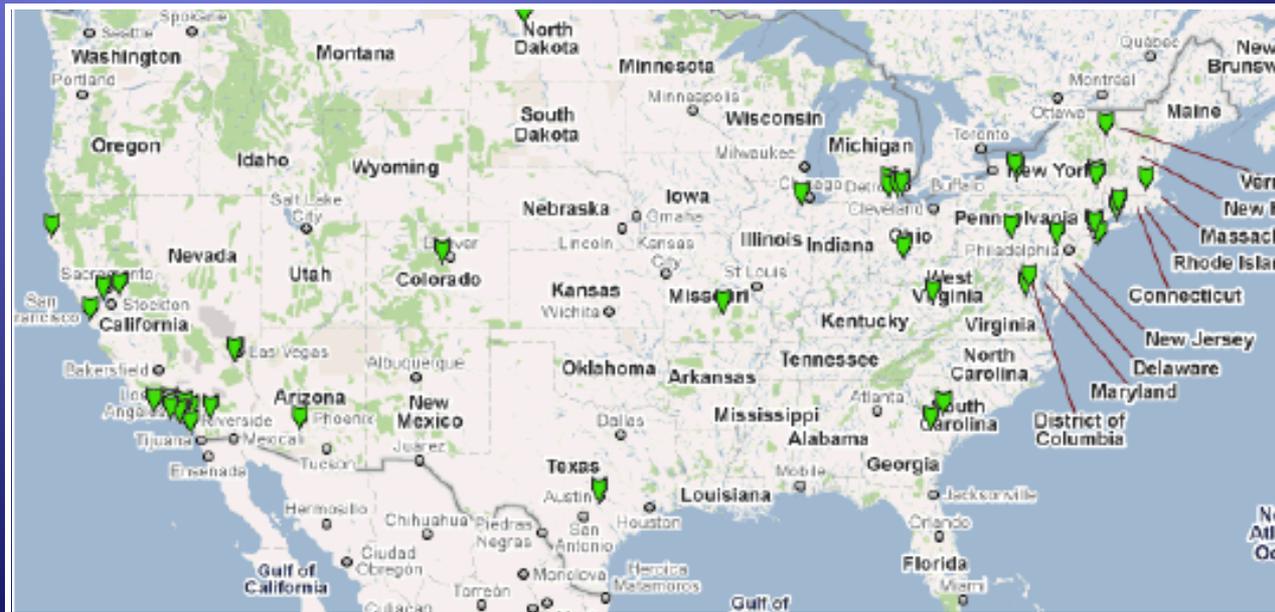
- ◆ Leadership and vision:
 - ◆ Government
 - ◆ Fuel cell industry
 - ◆ Hydrogen suppliers
 - ◆ Commercial partners such as fueling station owners.

The Tasks

- ◆ Energy policies that recognize and define the role of hydrogen in transportation
- ◆ Sustained incentives that reduce the near term risks for automakers and other system suppliers, fuel suppliers, fueling station owners, and consumers
- ◆ Nationally, locally, and internationally accepted codes and standards that establish safety procedures and product standards, and that standardize safety reviews and hydrogen purchases
- ◆ In the automotive sector, assured refueling availability in advance of vehicle introduction

The Status

- ◆ A substantial and growing nationwide hydrogen generation, transport, and storage infrastructure
- ◆ Still very few public stations



Recommendations

- ◆ Emphatic public support by the U.S. government for fuel cell electric vehicle (FCEV) deployment will give public and private stakeholders confidence and attract much-needed private investment in the U.S. and around the globe.

Recommendations

- ◆ The U.S. government has an opportunity to work collaboratively with infrastructure initiatives in Germany, Japan, Korea, the United Kingdom) and elsewhere to coordinate rollout plans; doing so would reduce costs and accelerate deployment.

Recommendations

- ◆ DOE support for state level hydrogen infrastructure initiatives would accelerate deployment in California, Hawaii, and, to a lesser extent, other states and would yield valuable experience in developing a national rollout plan.

Recommendations

- ◆ The hydrogen fueling infrastructure build-out should be part of a comprehensive National Energy Policy.

Recommendations

- ◆ These efforts would be most effective if integrated with a well thought-out strategy to support both 2016 and 2025 corporate average fuel economy mileage standards recognizing that battery electric vehicles, biofuels, and hybrids will not alone address the requirements.

Recommendations

- ◆ DOE's hydrogen and fuel cell research budget has shrunk by about 50% since FY 2009; a strong commitment to research and development would ensure U.S. technology leadership and to build on the impressive current U.S. knowledge base.

