CCS is not just about “clean coal”

Coal power only makes up around 40% of stored emissions in 2050

Source: T Kerr IEA
California Climate Change Policy
Context for CCS

- The major CA policy driver for CCS technology was the enactment of the Global Warming Solutions Act of 2006 (Assembly Bill 32, Chapter 488, Statutes of 2006). This landmark legislation declares global warming as a serious threat to California's environment and economy. The law requires a reduction in statewide GHG emissions to 1990 levels by the year 2020 and to 2000 levels by 2050.

Formation and Purpose of Panel

- The California Energy Commission, California Public Utilities Commission, and Air Resources Board have formed this Panel.
- Review carbon capture and storage (CCS) policy and develop recommendations that could help guide legislation and regulations regarding potential use of CCS in the California.
- Web site
  http://www.climatechange.ca.gov/carbon_capture_review_panel
Federal Context For CCS

- “The Obama administration says it remains committed to cutting U.S. greenhouse-gas emissions 17 percent by 2020.” Bloomberg  
  Article By Kim Chipman - Oct 14, 2010 10:04 AM ET

- EPA Continues to develop regulations and rulemaking to address GHG and CO2 reporting and reductions

- Congress has proffered several Bills

- New Congress in 2011
Regional Primary Energy Use

Scenario 1: Reference and Scenario 2 – H.R. 2454 (ADAGE)

EPA Analysis of H.R. 2454 - Appendix

Panel Members

Carl O. Bauer  John King
Sally M. Benson  Kevin Murray
Catherine Reheis-Boyd  George Peridas
Kipp Coddington  Ed Rubin
John Fielder  Dan Skopec
Public Meetings

- April 22, 2010
- June 2, 2010
- August 18, 2010
- October 21, 2010

Public Briefings and Discussions

- WESTCARB Overview and Status
- Permitting Considerations
- Regulatory Activities
- GHG accounting
- Property considerations
- Industry Inputs (Oil & Gas, Electricity)
- Environmental Spokespersons (NGOs)
- Environmental Justice Spokespersons
- Consumer Advocates
- Federal (EPA&DOE) Input
- Technical White Paper and Presentations (CA Agencies)
- Panel member discussions and material provided
Possible Recommendation Areas
No order of importance

- The Regulatory Framework for Permitting CCS Projects
- Regulation and Permitting of CO₂ Pipelines
- Ownership of Pore Space for CO₂ Storage
- Requirements for Measurement, Monitoring and Verification
- Long-Term Stewardship of Storage Sites
- Role of Public Outreach, Education and Input
- Commercial Considerations/Incentives/Policy Drivers
- Environmental Justice

Thank You