

Status Report on Section 355

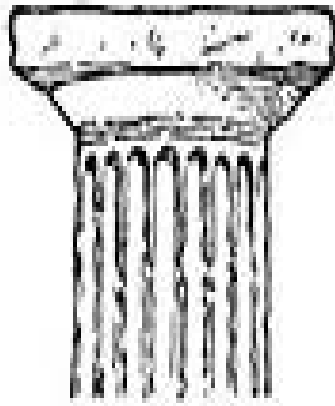
Terry Surles

HNEI

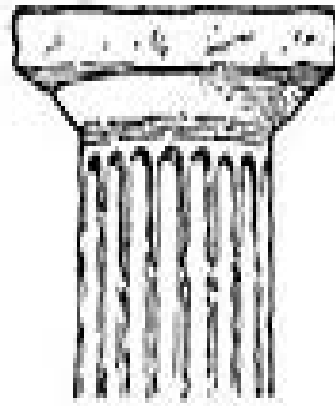
12/6/06

Public-Private Partnerships Critical For Addressing Overarching Issues Facing The Nation's Electricity System

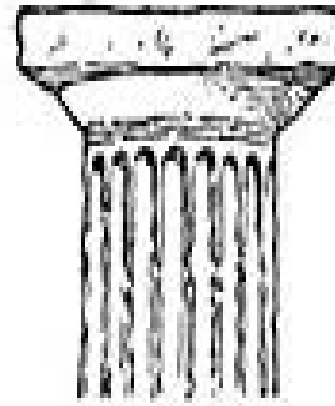
Electric System of the Future



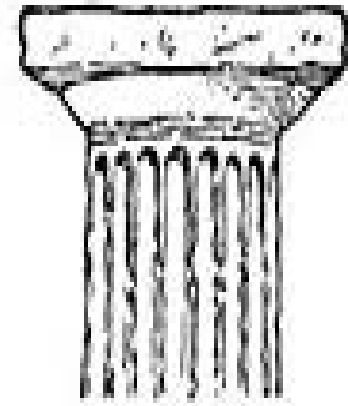
Grid Modernization



Global Climate Change



Energy Security



Environment Quality

None Of These Issues Can Be Resolved Without Partnerships

Section 355 Study Is Part of Larger Partnering Effort at HNEI

- Funded by US Department of Energy
 - Office of Electricity funding direct to HNEI
 - EERE funding to DBEDT
- DBEDT provides important coordination
 - Link to RMI work on strategic energy plan
- Key partners include GE and HECO
- Program is divided into three tasks

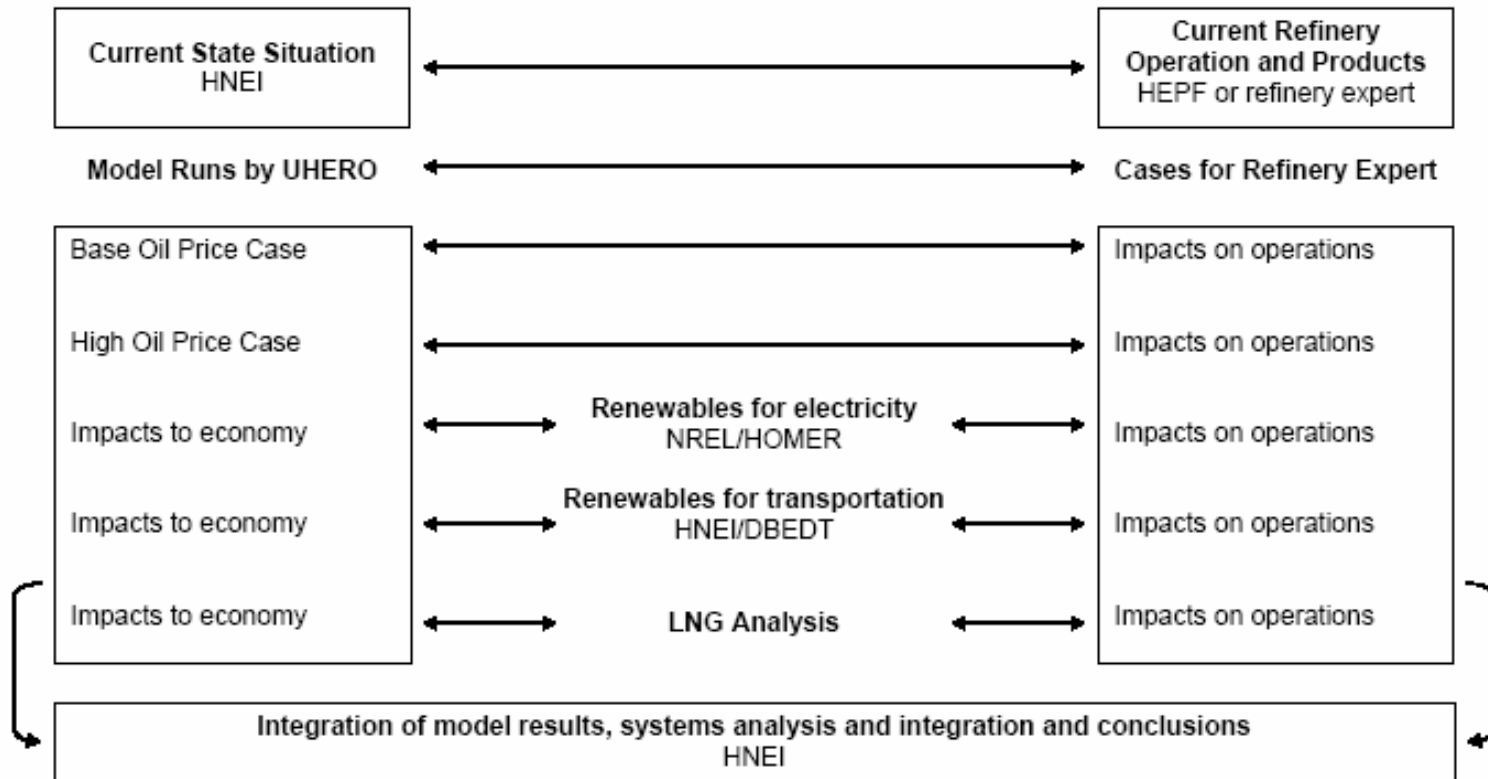
Larger Program Is Divided into Three Tasks

- Big Island road-mapping – assessment of electrical and transportation infrastructure
- RDD&D, test and evaluation of energy technologies at Hawaii Gateway Center
 - Focus on distributed energy systems, renewable energy systems, and energy storage
- Integrated assessments and policy analysis for integration of public policy with technology advances
 - Section 355 Study is moving forward under this larger task

Section 355 Study is Moving Forward

- Explicitly following section language contained in Energy Policy Act of 2005
- Focus is on the economic impacts of reduced petroleum dependence on the state economy
- Team assembled includes HNEI, UHERO, HEPF (hydrocarbons), NREL, and (soon) FACTS

355 PROJECT DIAGRAM



The Study Team Is Reasonably Well Integrated

- Overall project management – HNEI
- State economic analyses – UHERO
- Accelerated use of renewable energy for electricity generation – NREL
- Accelerated use of renewable energy for transportation – HNEI
- Evaluation of LNG futures – FACTS (tbd) through HEPF with additional funding from OHA
- Impacts on refinery operations based on scenario analyses – HEPF (Hydrocarbons)
- Integration and final report - HNEI

Section 355 Is Moving Forward

- First two deliverables (one each to USDOE and to DBEDT) have been sent
 - Second draft deliverable sent to NREL
 - Future deliverables coordinated - DBEDT and NREL
- Bi-weekly conference calls held between leads
 - Allows for information exchange, schedule reality check, and modification of scope
- Meetings in DC next week for revising timelines
 - Potential for additional funding exists

Linking R&D and Public Policy to Commercialization Process

