

Liquefied Natural Gas (LNG) in California

1. Importation of LNG being fast-tracked in states on the East, West and Gulf coasts:

- 40 approved or pending LNG terminal proposals nationwide without any national, regional or statewide planning.
- Passage of 2005 Federal Energy Bill significantly weakens States' jurisdiction in siting onshore LNG terminals.
- Bifurcated permitting processes for onshore and offshore LNG terminal proposals inhibits coordinated review (FERC vs. USCG).
- Highly expedited timelines under FERC and Deepwater Port Act further undermine adequate project review, particularly for 'first time through the gate' technologies.
- Disproportionate burden for review left to local communities and poorly funded NGO's on a case by case basis.
- Calls by coastal states for a coherent national and regional approach to evaluate need, technology and siting is producing new legislative initiatives.
- Just released GAO Report, "Public Safety Consequences of a Terrorist Attack on a Tanker Carrying Liquefied Natural Gas Need Clarification" confirms that the public safety impacts of LNG tankers have not been adequately assessed prior to the approval of numerous LNG terminals throughout the US.

2. Conflicting information about extent to which CA needs LNG:

- 'Doomsday' natural gas shortage scenarios promoted by LNG industry, including SEMPRA, et.al. SEMPRA has been subject to several lawsuits contending that it manipulated electricity and gas supplies to drive up prices and profits during CA's electricity 'crisis.'
- Experts on both sides disagree on the level of need for LNG if greater emphasis placed on aggressive conservation and a strong renewables program; concern that over-dependence on LNG could undermine incentives for conservation and renewable programs over the long term.
- The California Energy Commission has **not** done a specific LNG Needs Assessment. Calls by federal and state legislators and environmental organizations for CPUC evidentiary hearings on need for LNG also rejected.
- Though no LNG Needs Assessment has ever been completed, former Schwarzenegger Energy Advisor and CEC Chair Joe Desmond was publicly quoted as saying that CA 'probably' only needs one or two terminals.
- In testimony before the Senate Utilities, Commerce and Communications Committee on 10/27/05, Desmond said that the number of LNG terminals CA needs will be determined by the LNG industry and that the CEC would not assess the number of terminals needed to meet CA's natural gas needs. Desmond left the Administration in November, 2006 to work for NorthernStar, a company trying to build an offshore LNG terminal in CA.

3. Aggressive and well-funded lobbying effort to 'sell' LNG to CA as a 'clean' and 'stable' supply of 'cheap' natural gas:

- LNG is the oil companies next 'product'. Industry touts natural gas as a 'cleaner' alternative, but it is still an *imported fossil fuel* that is susceptible to supply disruption and price hikes.
- Well-funded industry lobbying effort to sell 'LNG' to CA includes:
 - \$1 million contract in 2004 by CalCase to Navigators/Mike Murphy for pro-LNG "ground and air war."
 - BHP Billiton, alone, spent \$2.8.million in the 24 months preceding December 2006 to lobby at the state level on behalf of Cabrillo Port and was the 7th largest spender in the State in 2005. Of that \$2.8 million, \$2.17 was paid to Manatt.. Dollars spent lobbying at the federal level cannot be tracked; Senator Barbara Boxer has introduced legislation to require reporting of LNG lobbying expenditures at the federal level.
 - Despite promises that LNG will be a source of CHEAP natural gas, there are no guarantees on pricing; signals from industry experts that prices could remain high despite imports of LNG (see below).

4. Economic consequences of LNG imports are highly variable; no 'guarantee' that LNG will be affordable, lower existing high gas prices or that LNG imports will remain in CA.

- Costs of extraction, liquefaction, regassification, transportation and infrastructure including terminal and ship construction ensure that cost of LNG will remain expensive in order for companies to make a profit.
- Issues of 'access' (closed vs. open.vs managed) to LNG terminals remain unresolved. Private (and possible foreign) ownership with 'closed access' allows greater possibility for market manipulation leading to price spikes and supply disruption.
- Recent new reports confirm that oil-like 'cartels' are already being formed to control the price and supply of LNG exports; 60% of the foreign NG reserves are inRussia, Iran and Qatar.
- No guarantee that LNG that unloads in CA will stay in CA; CA will have to compete with everyone else when bidding on contracts for LNG imports.
- Liability issues under Deepwater Port Act and NAFTA in case of accident(s) poorly understood.
- Poorly sited facilities could impact ongoing naval and marine operations off the CA coast; the military contributes over \$43 billion to the CA economy annually.
- Potential for costly damage to existing US and CA domestic infrastructure; Maryland blames composition of new LNG imports for more that \$144 million dollars in damages to pipelines and fittings resulting in " thousands of natural gas leaks over the last two winters."

5. Proposed LNG terminal proposals in CA differ significantly in terms of their technological design and location. New technologies recently proposed for CA should be considered in any LNG permitting decisions.

- Well established, routine permitting procedures used to evaluate 'cookie cutter' power plant proposals are insufficient to address the complexities and distinct variances between the different LNG terminal proposals:
- A Floating Terminal: BHP Billiton has proposed *Cabrillo Port*, a vast floating terminal, three football fields long and 14 stories high, to be moored offshore Oxnard and Malibu for a minimum of forty years; no other similar facility

- currently exists in the world today. The project was denied in May, 2007.
- An Onshore Terminal in the Port of Long Beach: Sound Energy Solutions has proposed an onshore facility to be located in the busy Port of Long Beach (approx. \$200 billion in annual trade volume) proximate to densely populated neighborhoods. The local jurisdiction has halted further consideration and the company is suing to force completion of the EIR.
- **An Oil Platform Conversion:** Crystal Energy, now NorthernStar, has proposed an offshore facility which seeks to convert an aging oil platform into an LNG berthing and regassification facility.
- A Gravity Based Concrete 'Island': Chevron's plan to build a 'gravity based system' off San Onofre Nuclear Power Plant and Camp Pendleton were withdrawn. This type of system is embedded in the ocean floor in relatively shallow water and resembles an artificial island. Chevron is reportedly looking for another location.
- On Board Regassification without Terminal: In 2006, Woodside announced a different approach that does not require the construction of an LNG terminal. Using a 'closed loop' system, Woodside's proposal regassifies the LNG on board the LNG tanker and delivers it via a buoy system 22 miles offshore directly into an offshore pipeline distribution system.
- Offshore LNG Docking Tranfer System -In 2006, Esperanza Energy announced plans for a Deepwater Port using TORP technology. This option utilizes a L-shaped docking system that regassifies and transfers the LNG directly into the pipeline distribution system; there is no large marine structure to store and regassify the LNG.
- 6. Lack of coherent regulatory mechanism to ensure CA gets the best available technology, maximum public safety, minimum environmental footprint/impact, optimum location, etc.
 - Regulatory vacuum in wake of 1987 repeal of 1977 LNG Terminal Act; repeal based on failure of predicted natural gas 'crisis' to materialize.
 - The repealed 1977 LNG Terminal Act set standards for siting (population density and remote siting), required a study on need and alternatives prior to permitting of an LNG terminal, and imposed industry fees to cover costs of agency work.
 - Current 'Free Market' approach to siting of LNG terminals does not allow for true competition between proposals; first come, first serve approval with NO provision for evaluation based on relative merits, safety or impacts.
 - Ongoing uncertainty over public safety and environmental impacts of untested technologies and project designs, e.g. BHP Billiton 'floating terminal' is 'first of its kind.'
 - Lack of funding and adequate staffing to enable affected state agencies (SLC, CCC, etc.) to conduct appropriate regulatory review.
- 7. SB 412 (Simitian), "The LNG Market Assessment Act" which would require the CEC to prepare a LNG Market Assessment Report as part of the biennial Integrated Energy Policy Report (IEPR), is currently being considered for approval by the CA State Legislature.