

# **HIGHLIGHTS OF ENERGY POLICY ACT OF 2004**

*More than three years and hundreds of hours of hard work and debate have produced a bipartisan, comprehensive national energy policy that will promote conservation, reduce our growing dependence on unstable Middle Eastern oil, improve our economy and create new jobs. Following are the highlights of the **Energy Policy Act of 2004**:*

## **Energy Efficiency**

- Requires a 20 percent reduction in federal building energy use by 2013, provides funding for energy efficiency programs for public buildings, including schools and hospitals, and increases fuel efficiency requirements for federal vehicles.
- Authorizes \$3.4 billion for each fiscal year 2004 through 2006 for the Low Income Housing Assistance Program (LIHEAP). Increases funding for low-income weatherization programs, and state energy programs to improve energy efficiency.
- Expands the Energy Star program, a government industry partnership for promoting energy efficient products.
- Establish new energy efficiency standards for many new commercial and consumer products that use large amounts of energy - providing significant savings on monthly energy costs.
- According to the American Council for an Energy Efficient Economy, the energy efficiency and conservation provisions will “eliminate the need for at least 130 new power plants (300 MW each) by 2020.”

## **Renewable Energy**

- Reauthorizes the Renewable Energy Production Incentive program to provide renewable energy production incentives for solar, wind, geothermal, biomass and other renewables.
- Authorizes \$300 million for solar programs, starting with a goal of installing 20,000 solar roof-top systems in federal buildings by 2010, as well as a separate \$210 million program for concentrating solar power for hydrogen production.
- Authorizes \$550 million in grants for biomass programs.
- Authorizes \$100 million for increased hydropower production through increased efficiency at existing dams and modernizes the nation’s hydropower laws to allow increased production, without compromising existing environmental protections. Hydroelectric power is our nation's single largest renewable energy source and accounts for roughly 10 percent of our electricity supply. According to the Energy Information Administration (EIA), of the approximately 75,000 dams in the United States, only about 2,400 or 3 percent are used to produce electricity.
- Directs the federal government to use more renewable energy, with a goal of using 7.5 percent or more by 2011.
- Provides for royalty relief for geothermal uses, including on-site electricity generation.
- Provides substantial tax credits for a variety of renewables.
- Reauthorizes the Renewable Energy Production Incentive program, and expands it to include landfill gas. Provides for comprehensive assessment of renewable energy resources.
- Contains a renewable fuels requirement to add five billion gallons per year of ethanol and other renewable-based fuel to the nation's gasoline.

### **Clean Coal Technologies**

- Provides authorizations for an average of about \$600 million per year for the Department of Energy's fossil program for existing and new coal-based research and development. It requires the establishment of a national center or consortium for clean power and energy research as well as coal mining research efforts to minimize contaminants in mined coal. Research is focused on innovations at existing plants, new advanced gasification and combined cycle plants, advanced combustion systems and turbines as well as fuel-related research.
- Provides a \$1.8 billion authorization for the Secretary of Energy to carry out the Clean Coal Power Initiative, which will provide funding to those projects that can demonstrate advanced coal-based power generating technologies that achieve significant reductions in emissions.
- Mandates that at least 60 percent of the \$1.8 billion will be used for projects on coal-based gasification technology and that these projects meet stringent environmental performance standards and vastly increased efficiency standards.

### **Vehicles and Fuels**

- Requires "dual-fueled" vehicles acquired under the EPAAct programs to be operated on alternative fuels and provides credits for medium and heavy duty vehicles, hybrid vehicles and investment in alternative fuel infrastructure.
- Authorizes \$200 million for an advanced vehicle program. This program, operating under the current Department of Energy "Clean Cities" program, would provide grants to state and local governments to acquire alternative fueled and fuel cell vehicles, hybrids and other vehicles, including ultra low-sulfur diesel vehicles.
- Authorizes two new "Clean School Bus" programs. The first program would provide \$100 million to retrofit existing diesel buses with new pollution control technology. The second program authorizes \$200 million in grants for replacement of older school buses with clean alternative fueled and ultra-low sulfur fueled buses.
- Launches programs for hydrogen fuel-cell transit buses and for hydrogen fuel-cell school buses to demonstrate the use of this technology. Also includes funding for a railroad efficiency center, a provision to review mobile emission reduction trading, a study of aviation fuel conservation, diesel fuel emission technologies, a "conserve by bicycling" program and a program for advanced idle reduction systems.

### **Automobile Efficiency/CAFE**

- Increases funding to \$6 million over four years (2004-2008) for the Department of Transportation to continue its work on improving Corporate Average Fuel Economy (CAFE) standards.
- When setting CAFE standards, requires the National Highway Traffic Safety Administration (NHTSA) to consider the impact on vehicle safety and automobile industry jobs.
- Includes a study, to be done by NHTSA, to look into alternatives to the CAFE program and examine the amount of fuel consumed by automobiles.

### **Hydrogen**

- Launches a state-of-the-art program to get hydrogen-powered automobiles on the road by 2020 along with the necessary infrastructure to provide for the safe delivery of hydrogen fuels. Establishes an interagency task force on hydrogen as well as an outside advisory committee. Authorized at \$2.15 billion over five fiscal years.

## *Hydrogen Continued...*

- Requires the Department of Energy to develop a plan outlining technical milestones as well as technical and non-technical hurdles to hydrogen vehicles and their associated infrastructure. The hydrogen program, to be conducted as a public/private partnership, is to address the production of hydrogen from diverse sources, including fossil fuels, hydrogen-carrier fuels and renewable energy resources including biomass and nuclear energy. The program also addresses pipeline hydrogen transmission, convenient refueling, advanced vehicle technologies, hydrogen storage and the development of necessary codes and standards.

## **Oil and Gas**

- Allows for more oil and natural gas exploration and development by providing royalty relief for deep and ultra-deep gas wells in the shallow waters of the Gulf of Mexico. Improves access to North America's abundant natural gas resources.
- Allows for the construction of a natural gas pipeline from the Alaskan North Slope to the lower 48 states. Natural gas is responsible for 20 percent of our nation's energy production and is expected to play an increasingly important role in addressing our nation's future energy needs. The Alaska natural gas pipeline will promote competition in the exploration, development and production of natural gas.
- Authorizes the expansion of the Strategic Petroleum Reserve's (SPR) capacity from 700 million to one billion barrels and filling the SPR to that capacity during periods of stability.

## **Nuclear**

- Renews Price-Anderson nuclear liability protections for 20 years, including provisions to encourage the development of advanced modular reactors. Strengthens security of nuclear facilities, including improved federal oversight of plant security and the expansion of federal statutes for sabotage of nuclear facilities.
- Strengthens operations of the Nuclear Regulatory Commission. Protects decommissioning funds from misuse, improves the ability to attract and retain trained personnel and clarifies license periods for new plants.

## **Electricity**

- Promotes investment in critical electric transmission capacity and efficiency measures by directing the Federal Energy Regulatory Commission (FERC) to do an incentive rate rulemaking and provide for participant funding; provides for expedited siting processes on both federal and private lands; and provides for the use of advanced transmission technologies.
- Improves the operation and reliability of electric transmission networks by providing for open access to transmission lines not previously subject to the same open access requirements; authorizing federal utilities to participate in Regional Transmission Organizations (RTOs), provides for continued reservation of transmission capacity needed to serve "native load" customers; and establishes an electric reliability organization to develop and enforce reliability standards for the bulk transmission system.
- Promotes investment in the electric sector by repealing existing Public Utility Holding Company Act (PUHCA) requirements and replacing it with authority for federal and state regulators to examine relevant books and records. Provides for state consideration of model standards for real-time pricing, time-of-use metering, and smart metering. Provides for State consideration of model standards for net metering.

### *Electricity Continued...*

- Provides for an electronic system to improve transparency of electricity markets. Prohibits filings of false information and round trip or “wash” trading. Dramatically increases criminal and civil penalties limits and expands penalty provisions to cover all violations of the Federal Power Act.
- Moves the refund effective date up to the date of complaint to ensure refunds of unjust and unreasonable amounts. Extends FERC refund authority to cover sales by otherwise nonjurisdictional utilities in certain markets. Promotes market stability by requiring FERC to meet a public interest standard before abrogating contracts. Authorizes the Federal Trade Commission (FTC) to establish rules to protect consumer privacy and prohibit “slamming” and “cramming.”
- Expands FERC's merger authority and requires review of elimination of duplication and onerous conditions imposed under FERC’s merger review authority.

### **Research and Development**

- Provides extensive authorization for the Department of Energy to increase the efficiency of all energy intensive sectors, promotes diversity in energy supply, improves energy security and decreases the environmental impact of energy-related activities.
- Specific authorizations are provided for energy efficiency efforts, a next generation lighting initiative, national building performance initiative, advanced energy technology transfer centers, research and development efforts regarding distributed energy systems and electric energy technologies, renewable energy efforts, bioenergy programs, solar power research and nuclear energy.
- Authorizes oil and gas research programs including ultra-deepwater and unconventional natural gas research and development. Authorizes new scientific endeavors in such areas as catalysis research, nanotechnology and fusion energy.
- Authorizes over \$2.9 billion in funding over the next five years for renewable energy research and development, including \$800 million to develop biopower energy systems, biofuels and bio-based products.
- Establishes a program to develop hydrogen energy from many sources, including renewable energy resources like solar energy.

### **Leaking Underground Storage Tanks**

- Requires at least 80 percent of all dollars appropriated from the Leaking Underground Storage Tank (LUST) Trust Fund to be sent to the States for operating leaking underground tank programs.
- Provides increases in State funding from the LUST Trust Fund for States containing a larger number of tanks or whose leaking tanks present a greater threat to groundwater.
- Requires onsite inspections of underground storage tanks every three (3) years after a brief period for the state to update its backlog.
- Establishes operator-training programs, where they do not already exist. Many releases from underground storage tanks are caused by improper operation of those tanks.
- Institutes a specific new funding category to cleanup tank-related releases of oxygenated fuel additives in gasoline, like MTBE.
- Prohibits federal facilities from exempting themselves from complying with all federal, state, and local underground tank laws.
- Asks States to submit an annual inventory to the U.S. EPA detailing the number of regulated tanks in its state and which of those tanks are leaking.

*Leaking Underground Storage Tanks Continued...*

- Provides States the authority to prohibit deliveries of fuel to non-compliant regulated tanks in order to achieve legal enforcement.
- Authorizes \$380 million per year, through fiscal year 2008, for general administration, operator training and enforcement activities, cleanups of gasoline or chemical contaminated sites, cleanups of ether fuel additives in gasoline, like MTBE, inspection programs and requirements, and for release prevention, compliance, and enforcement activities. The LUST trust fund currently contains a \$2 billion balance.

**Personnel and Training**

- Establishes a National Power Plant Operations Technology Education Center.
- Improves access to energy scientific and technical careers, especially for minorities.
- Instructs the Secretaries of Labor and Energy to develop training guidelines for electric energy industry personnel to support electric system reliability and safety.