



The Kerry-Edwards Plan for Clean Coal

AMERICA'S MOST ABUNDANT, AFFORDABLE FOSSIL FUEL

The Kerry-Edwards energy plan for the 21st century recognizes that coal is vital to our nation's energy and economic security. The Kerry-Edwards plan also recognizes that the environmental issues sometimes thought to be impediments to the expanded use of coal can be solved with new clean coal technologies that can make electricity, liquid fuels, and hydrogen from coal while protecting our air, our water, and our climate. In the Kerry-Edwards plan, these advanced technologies are the key to a coal strategy that will increase American energy independence, protect and expand American jobs in the coal sector, reassert American leadership in advanced energy technologies for the whole world to use, and protect the environment all at the same time.

The Kerry-Edwards Administration will send clear, commonsense regulatory and market signals which can significantly reconcile numerous environmental and climate change concerns, stimulate technology deployment, and set the stage for a renewed era for coal.

Four years ago, George Bush promised West Virginia that he would increase jobs and spend \$2 billion over 10 years on clean coal technologies. But George Bush has simply walked away from that pledge. In the meantime many coal communities have lost jobs. In his proposed budget for next year, George Bush cuts basic coal research by 30%, cuts the funds available for the Clean Coal Power Initiative solicitation by 70%, and pays for his FutureGen initiative with funds raided from these and other Clean Coal programs.

Investing \$10 billion in the development of Clean Coal Technologies

John Kerry and John Edwards recognize that coal is an essential part of a diverse mix of fuel sources. Their administration will invest \$10 billion in programs that will be focused on attaining the objectives of Clean Coal. These investments will move us beyond unproductive debates about coal emissions to a future in which cost-effective, near zero-emission coal technology powers this nation's economy, expands employment opportunities, and increases our domestic energy security. The Kerry-Edwards vision for Clean Coal will ensure an economically robust and environmentally sustainable future for consumers and industries across America -- consumers and industries that require affordable, secure energy to further build the American dream.

➤ **Technology development for near zero-emissions coal plants**

John Kerry and John Edwards will advance incentives to build state-of-the-art, coal-fueled power plants based on technologies like Integrated Gasification Combined Cycle (IGCC), which offer the potential to deliver on the promise of Clean Coal. IGCC plants also can produce hydrogen as well as other useful gases for the chemical industry. Because companies vary in their financial structure, the incentives will be flexible, ranging from tax provisions to loan guarantees. Industry will have the flexibility to draw upon the Kerry-Edwards incentives for constructing state-of-the-art new plants and re-powering the existing fleet of coal and gas plants with ultra-efficient coal-fueled technology.

Today, it takes about eight years to permit and construct a new coal-fueled power plant. The American economy cannot wait that long. To reduce this time, a permitting process will be



proposed that relies on environmentally tough and predetermined standards rather than on endless case-by-case reviews. These provisions will apply only to IGCC or other advanced technologies to encourage their deployment. And, the incentives will encourage the development of a new generation of cleaner power plants. This plan will expedite the permitting and construction of IGCCs whose future operations could be coupled with carbon dioxide capture and sequestration to make Zero-Emission Coal a reality.

➤ **Develop cost-effective technology that protects jobs and the environment**

John Kerry and John Edwards will work in partnership with the coal miners, coal producers, utilities, environmentalists, and consumers to enact meaningful, multi-pollutant, emission-limitation legislation to clean our air, protect our water and climate, and provide regulatory certainty. This will also contribute to the market incentives to encourage the widespread use of innovative new technologies (such as IGCC), as it is primarily utilities – and not only the federal government – who must make Clean Coal a reality.

Clean air benefits every American. John Kerry and John Edwards recognize that the cost of clean air should be fairly distributed across our society since it benefits each of us. As part of this partnership, John Kerry and John Edwards will support mechanisms for utilities to recover the cost of installing meaningful new emissions controls. They will pave the way for America's most abundant energy resource – and will achieve both Clean Coal and Clean Air.

The Kerry-Edwards Administration also will address climate change in a serious, responsible, and balanced way. John Kerry and John Edwards recognize that solving this problem will take decades and require meaningful efforts by all nations, but we must get started now. In sharp contrast to the head-in-the-sand approach of the current administration, John Kerry and John Edwards believe that with technology leadership from U.S. industry and policy leadership from the U.S. government, America can once again guide the world to a more secure future.

This strategy can also prove to be a powerful tool for economic growth here at home. The United States is one of the world's leading developers of clean energy technologies. We ought to take advantage of that fact and export our technologies to the world. By opening and expanding international markets for a wide range of American-made clean energy technologies, we create jobs at home, expand opportunities to more broadly use our natural resources, and improve the environment around the world.

➤ **Using American ingenuity to level the playing field**

John Kerry and John Edwards believe that the Kyoto Protocol is not the answer. The near-term emission reductions it would require of the United States are infeasible, while the long-term obligations imposed on all nations are too little to solve the problem. Unlike the current Administration, John Kerry and John Edwards will offer an alternative to the Kyoto process that leads the world toward a more equitable and effective answer, while preserving coal miners' jobs.

In the Kerry-Edwards Administration, the U.S. will equitably match the initial efforts of our industrial-country trading partners and competitors. U.S. reductions will be achieved in a reasonable and realistic timeframe. American workers and industries should not be forced to



shoulder the costs of these reductions. The Kerry-Edwards Administration will work to provide support and incentives for U.S. industries and work to ensure that these clean, efficient technologies are deployed in a cost-effective manner. China, India, and the other key developing countries must also join the effort by agreeing to reduce the growth of their greenhouse gas emissions -- a step that can be achieved by the installation of American-made energy technologies.

The growing climate-change problem cannot be solved on the backs of American workers and consumers, but neither can it be solved by pretending too little is known to take meaningful action. We can meet the climate-change challenge in a way that preserves and expands America's coal sector, that keeps clean-energy jobs at home, and that boosts the American economy. The key to doing this is by investing in the clean coal technologies of the future -- technologies that we and the rest of the world can use to fuel our economic growth with abundant coal, while capturing and sequestering safely in the ground the climate-altering carbon dioxide that today's coal-powered facilities emit. And that is what the Kerry-Edwards Administration's coal policy will do.

THE KERRY-EDWARDS PLAN FOR CLEAN COAL \$10 billion over ten years

The Kerry-Edwards three-pronged investment approach includes:

- ***\$4 billion in Basic Research*** to develop bold new concepts for clean coal technology;
- ***\$2 billion in Technology Demonstrations*** to prove the commercial viability of clean coal technology; and
- ***\$4 billion in Deployment Incentives*** that rapidly move clean coal technologies into the marketplace.

These investment funds will be generated partially through a new Energy Security and Conservation Trust Fund. The Trust Fund will be a new addition to traditional Federal financing vehicles, such as tax incentives and appropriations. The trust fund would begin to provide stable and assured long-term funding that is necessary to revolutionize the coal-fueled energy infrastructure of this country. Royalties already generated by mining and oil/gas production on Federal lands would finance the fund. The U.S. Department of Energy (DOE) with Congressional oversight will manage coal-related investments made from the fund.

Double U.S. Investment in Coal Research to \$4 billion and Refocus Existing R&D

John Kerry's investment in basic research will focus on developing bold new concepts for cost-effective, near zero-emission clean coal technology, including developing cost-effective technology to dramatically reduce mercury emissions, reduce CO₂ emissions, and enhance U.S. energy security. John Kerry's agenda will:

- Expand R&D to support Integrated Gasification Combined Cycle Coal-Fueled (IGCC) power plants and other near zero-emissions advanced clean coal systems as the basis for next generation near zero-emission coal-fueled power.

- Develop high efficiency hydrogen turbines and megawatt-scale fuel cells that can be powered by coal and integrated with advanced, high efficiency power plant designs.
- Increase R&D for engineered carbon dioxide capture from conventional and advanced coal combustion power plants, including expanding university-led near zero-emission research centers on geologic sequestration.
- Dramatically improve the effectiveness of DOE's Regional Carbon Partnerships by including more involvement by States, stakeholders, USDA, and EPA.
 - Focus DOE-funded efforts solely on geologic sequestration of carbon captured CO₂
 - Focus terrestrial sequestration within separately funded EPA, Departments of Interior & Agriculture programs — the agencies with the technical expertise
 - Support at least five regional carbon sequestration demonstration projects
- Sustain the premier engineering and scientific capabilities that exist at DOE's distinguished fossil energy research laboratories in Morgantown, West Virginia and Pittsburgh, Pennsylvania.
- Resolve the out-year fossil energy R&D budget shortfall created through budget deferrals that occurred during the current Administration through a one-time \$300 million addition to an annual Appropriation request.
- Integrate programs, with active consultation with industry and academia, into a comprehensive technology development path and judge program success by whether they significantly contribute to advancing the objectives of Clean Coal and ultimately near Zero-Emission Coal rather than as individual programs that are judged by their own separate agendas.

Sixty-six percent increase in Clean Coal Technology Demonstrations to \$2 Billion and Increase the Impact of Existing Programs

- Conduct a large-scale near zero emission power plant research and demonstration project through a cooperative agreement with industry and scientific institutions. The project will involve multiple novel technologies and substantial new research; thereby providing multiple paths to success. The project will be designed to maximize public benefit.
- Participate in at least two major international partnerships to further the development of near zero-emission coal-fueled power generation.
- Focus additional technology demonstrations on component technology related to near zero-emission fossil-fueled power plants, including CO₂ and mercury management.
- Require that a demonstration and/or research project must:
 - Significantly cut emissions as compared with existing technologies;



- Be potentially suitable for widespread deployment and address a significant technological challenge facing industry that will reduce emissions, improve efficiency, or lower costs -- thereby having a real national impact;
- Need at least partial federal support in order to move forward – projects that can be developed with private funds alone should not receive such support;
- At its conclusion be on a clear path to commercial viability, i.e. to be cost-effective and competitive on its own in the open market without federal support;
- Be evaluated periodically during the life of the project to confirm progress in meeting the above standards with the goal of successfully concluding the project at a date certain. Projects that fail such evaluations should not be allowed to continue operating long past their scheduled date for completion or to modify the original project or research objectives in order to justify additional federal support.

Create \$4 Billion in New Deployment Incentives

John Kerry will use market mechanisms to accelerate the deployment of IGCC and other advanced clean coal technologies thereby reducing CO₂ and other emissions, creating jobs, and enhancing U.S. energy security. These will be flexible, ranging from tax provisions to loan guarantees. This also includes the implementation of a Clean Coal Technology Export Initiative managed by DOE's office of Fossil Energy.