

CLIMATE VISION MEMORANDUM OF UNDERSTANDING BETWEEN THE UNITED STATES ELECTRIC POWER SECTOR AND THE DEPARTMENT OF ENERGY

I. Overview

This Memorandum of Understanding (MOU) establishes a voluntary umbrella framework for reducing the greenhouse gas (GHG) emission intensity of the power sector. This framework shall be part of the President's Climate VISION ("Voluntary Innovative Sector Initiatives: Opportunities Now") program, which was established on February 12, 2003, as a public-private partnership to address the long-term challenge of global climate change and to make a meaningful contribution to the President's goal of reducing the GHG intensity of the United States' economy by 18 percent by 2012.

This MOU is entered into by and between each of the six electric power sector trade associations of the United States (as named below), the Tennessee Valley Authority (TVA), and the United States Department of Energy (DOE), hereinafter collectively referred to as the "Parties." The six trade associations that are Parties to the MOU are: American Public Power Association, Edison Electric Institute, Electric Power Supply Association, Large Public Power Council, National Rural Electric Cooperative Association and Nuclear Energy Institute. TVA and the six trade associations, acting through their member companies, are hereinafter collectively referred to as the "Power PartnersSM."

II. Goals

The overall goal of this MOU is to support the President in his efforts to reduce the GHG emissions intensity of the U.S. economy by 18 percent by the end of 2012. To this end, the Power PartnersSM and DOE agree to work collectively to establish an effective and robust partnership between the electric power sector and DOE that is:

- Part of a larger economy-wide effort under the Climate VISION program and other voluntary programs to reduce the GHG emission intensity of the U.S. economy;
- Intended to make a meaningful contribution by the power sector to ensure the achievement of the President's GHG emission intensity goal¹ by 2012; and
- Intended to facilitate actions by the Power PartnersSM and their member companies to reduce collectively the power sector's GHG emission intensity² by an equivalent of 3 to 5 percent below 2000-2002 baseline levels, as measured over the 2010-2012 period.

The Power PartnersSM emissions intensity reduction³ goal is based on anticipated future trends and conditions within the power sector and other major sectors of the U.S. economy.⁴ In

¹ President Bush's intensity goal is defined in terms of the ratio of national GHG emissions to gross domestic product (GDP).

² The power sector's collective intensity goal is defined in terms of the ratio of carbon equivalent emissions to generation (MWH). However, the Power PartnersSM member companies that choose to set company-specific intensity goals may express their goals in other ways, such as by using other intensity metrics.

addition, the goal applies to the entire electric power sector and does not apply individually to the Power PartnersSM or their member companies.

As a secondary goal of this MOU, the Power PartnersSM and DOE agree to work collectively to spur GHG emission intensity reductions across all sectors of the economy through collaborations with electricity end-users/customers in the industrial, commercial, residential and transportation sectors.

III. Principles

By entering into this MOU, the Parties agree to undertake a robust public-private partnership for the purpose of advancing the “new approach to the challenge of global climate change” that the President announced on February 14, 2002. This new approach is designed to harness the power of the markets and technological innovation to reduce GHG emissions intensity.

The Parties recognize that climate change is a global, complex, long-term challenge that will require a sustained effort over many generations. One essential element of an effective U.S. response entails promoting the research, development and commercial use of innovative, economic, zero- or low-emissions technologies for the electric power and other sectors, including technologies for carbon capture and sequestration.

Activities undertaken as part of the Climate VISION program will be voluntary and flexible and may cover any GHG, while also promoting the energy and environmental enhancement objectives of that program. Participation by the Power PartnersSM does not constitute endorsement of any particular scientific theory on global climate change.

The Parties recognize that the primary responsibility of the Power PartnersSM is to facilitate actions by their member companies, in accordance with the framework established in the MOU, for the purpose of achieving the goals and objectives set forth in the MOU. However, the Parties recognize that the Power PartnersSM trade association member companies and TVA have specific, but varying circumstances (*i.e.*, diverse growth requirements, power supply demands, fuel mix, geographical constraints, and financial and other resource limitations) that will influence and affect their operations and the actions they take.

IV. Parties’ Joint Actions

As part of the Climate VISION program, the Parties seek to achieve the goals and purposes of this MOU in a transparent manner. Such efforts will include consistent and periodic evaluations of progress by the Parties and encouragement of the submission of reports by the Power PartnersSM trade association member companies and TVA under section 1605(b) of the Energy Policy Act of 1992 (hereinafter referred to as “1605(b) program”).

Under this MOU, the Parties will work together to:

³ References to “reductions” in this MOU include avoidances and sequestrations.

⁴ Emissions in the carbon intensity metric will be adjusted, as appropriate, in accordance with the Work Plan developed under this MOU.

- Promote economic GHG emission intensity reductions.
- Encourage expanded use of current low-emission or no-emission technologies, such as nuclear; hydroelectric, wind and other renewables; highly efficient natural gas; and clean coal technologies.
- Pursue approaches that will complement and continue to promote the research, development, demonstration and, as soon as practicable, widespread commercial use of economic zero- or low-carbon electric generation technologies and processes (including carbon capture and sequestration) and of advanced, high-efficiency electric generation, transmission, distribution and end-use technologies.
- Develop strategies to assist others in reducing GHG emission intensity, such as Power PartnersSM member companies' electricity end-users/customers in the industrial, commercial, residential and transportation sectors of the U.S. economy.
- Facilitate the development and use of tools for measuring and reporting power sector GHG emissions and emissions reductions.

The Parties agree to work together to develop and encourage policies and practices that will enhance, facilitate and encourage voluntary efforts for GHG emission intensity reductions and that will provide incentives and reduce barriers to such reductions. In particular, it is the aim of the Parties to advance the goals and objectives of this MOU by promoting policies that:

- Provide investment stimulus on an equitable basis to all segments of the power sector in order to accelerate use of existing GHG-reducing technologies, deploy advanced technologies and maintain America's critical energy infrastructure.
- Create and maintain regulatory stability, and minimize regulatory uncertainty and delay.
- Remove unnecessary constraints that may inhibit implementation of voluntary GHG reductions and use of lower-emitting technologies.
- Spur investment in the short term and long term through a balanced and progressive research, development and deployment portfolio.

One such policy of importance to Power PartnersSM and their member companies is the revision of the guidelines for reporting and registering GHG emission intensity reductions under the 1605(b) program.

The Parties will jointly coordinate the development of a "living document" Work Plan that mutually reflects, to the greatest extent possible, the flexible implementation strategies and actions for achieving the goals of this MOU. The Power PartnersSM contribution to such a Work Plan shall be based on the activities and initiatives described in their action plans submitted to the Secretary of Energy in connection with the initiation of the Climate VISION program on February 12, 2003.

The Parties agree to confer, at reasonable intervals, on the progress towards achieving the Power PartnersSM GHG intensity reduction goal and implementing the other provisions established under this MOU. Additional actions or other such changes may be reflected by revising the terms and provisions of this MOU if they are mutually agreed to by the Parties.

The Power PartnersSM and DOE view the development and use of advanced technologies as critical to the achievement of the President's goal to reduce U.S. GHG intensity by 18 percent by 2012. The Parties agree to work collectively to develop a process, subject to the availability of private sector and public sector funds and applicable provisions of law, for (i) identifying high-priority areas for power sector research, development, demonstration and deployment (RDD&D)⁵ associated with technologies that would contribute to the achievement of the President's greenhouse gas intensity reduction goal and would contribute ultimately to surpassing this goal, and (ii) recommending steps to carry out power sector RDD&D in the identified high-priority areas, including, as appropriate, strengthening existing and establishing new public-private partnerships. This process will seek to identify: (i) climate technology needs for the electric power sector; (ii) gaps in current power sector climate technology RDD&D; (iii) priority areas for new or supplemental power sector climate technology RDD&D; and (iv) options for potential funding mechanisms for early commercial use of advanced technologies. This process will be facilitated by the Office of the Under Secretary for Energy, Science and Environment and will include the Office of National Energy Policy and appropriate DOE Program Offices.⁶

V. The Power PartnersSM, Actions

The Power PartnersSM will take actions to encourage and facilitate maximum participation in the Climate VISION program by their trade association member companies and TVA. The important purposes of this effort will be to improve the level and depth of participation, through workshops or other means, and to enhance performance and reporting.

The Power PartnersSM will encourage their trade association member companies to achieve collectively the goals, actions and initiatives described in the associations' Climate VISION action plans, which were transmitted by letter from each of the Power PartnersSM to the Secretary of Energy. Collectively, these action plans serve as the starting point for the establishment of an effective voluntary framework for reducing the GHG emission intensity of the power sector.

The Power PartnersSM will use best efforts to achieve their GHG intensity reduction goal under this MOU by facilitating their memberships' undertaking of activities that contribute to achieving this goal, including those described in the "living document" Work Plan that the Power PartnersSM develop with DOE. Trade associations and TVA individually or Power PartnersSM collectively may develop additional programs, strategies and initiatives for inclusion in the Work Plan. The activities contained in the Work Plan will cover a wide range of actions that may be undertaken over the term of this MOU to achieve GHG emissions intensity reductions.

Trade association member companies and TVA may memorialize their voluntary actions, programs and activities through company-specific plans tailored and detailed in accordance with their circumstances and submitted to the Power PartnersSM and DOE. Member companies and

⁵ This power sector RDD&D can include research, development, demonstration and deployment of advanced zero- or low-carbon emission electric generation technologies (including carbon capture and sequestration) and advanced, high-efficiency electric generation, transmission, distribution and end-use technologies.

⁶ These DOE program offices include the Offices of Fossil Energy; Nuclear Energy; Electric Transmission and Distribution; and Energy Efficiency and Renewable Energy.

TVA are encouraged to use the 1605(b) program for reporting and registering GHG emissions intensity reductions achieved under company-specific plans and this voluntary program.

The Power PartnersSM will develop and promote initiatives that will allow their member companies and TVA to pool their resources and collaborate collectively on joint, industry-wide programs and activities to reduce GHG emissions intensity.

The Power PartnersSM will prepare an annual report on activities and accomplishments under this MOU, beginning two calendar years after this MOU is signed by the Parties. This report shall present the actions taken and results achieved through the Climate VISION program during the preceding year and shall include an analysis that explains how these activities and accomplishments represent a meaningful contribution by the power sector to the President's 18 percent GHG emission intensity reduction goal. In support of this effort, the Power PartnersSM will develop a standardized metric for annual reporting to measure progress in reducing carbon emission intensity for the electric power sector. This report and accompanying analysis will reflect trends and conditions within the power sector and other major sectors of the U.S. economy.

VI. DOE Actions

Because future trends and conditions within the power sector are affected by government policies, DOE will use its best efforts to develop and implement programs, policies, regulations, budgets and legislative proposals in support of the goals and purposes of this MOU.

DOE will use its best efforts to: promote the harmonization of governmental policies and procedures; promote the minimization of regulatory barriers and uncertainties; encourage supportive fiscal and other actions and incentives; and otherwise promote an atmosphere that encourages and supports Power PartnersSM in their efforts to achieve the goals and purposes of this MOU.

DOE, in consultation with other federal agencies, is revising the reporting guidelines for the 1605(b) program. As directed by the President, the revised reporting guidelines are intended in part to provide an effective "tool for companies to publicly record their progress" in reducing GHG emission intensity. The policy material accompanying the President's February 2002 climate change speech stated that this "tool goes hand-in-hand with voluntary business" actions, such as those to be undertaken by the Climate VISION Program generally and this MOU specifically. To this end, DOE will strive to assure that collection and documentation of information through EIA under the 1605(b) program are consistent with, and support the achievement of, the President's overall climate change objectives of February 14, 2002, and the goals and objectives of this MOU.

Through the Climate VISION program, DOE will provide recognition to the Power PartnersSM and their member companies for making substantial contributions to GHG emission intensity reductions through the 1605(b) program and by other means. DOE will also provide recognition to the Power PartnersSM and their member companies that make financial contributions to GHG emissions reduction research, development and commercial use of advanced technologies and

practices that help achieve the 18 percent national emissions intensity reduction goal and look toward future time frames.

DOE shall offer technical assistance to the Power PartnersSM and their member companies and TVA in support of the goals, activities and actions undertaken pursuant to this MOU. This assistance can include DOE support in the development of:

- Voluntary commitments, actions, programs and other such strategies under this MOU for reducing GHG emission intensity;
- Tools for measuring and reporting GHG emissions intensity reductions and for achieving energy savings; and
- Strategies to assist others to reduce the overall GHG emission intensity of the economy, such as by demand-side management, energy efficiency, and utilization of electrotechnology applications by customers and other end-users.

VII. General Provisions

The Parties enter into this MOU under the authority provided to DOE in the Department of Energy Organization Act (Pub. L. No. 95-91), section 203, 42 U.S.C. § 7133, and section 646, 42 U.S.C. § 7256.

The Parties agree to work together to promote public and congressional awareness and confidence in the Climate VISION program and this MOU. The Parties also agree to attempt to resolve in a mutually satisfactory manner issues with respect to proposed amendments, interpretative and other matters that may arise in the implementation of this MOU.

Each Party shall designate a point of contact for the foregoing purposes and otherwise facilitate implementation of this MOU. Any Party shall notify all other Parties of any change in its designated contact person.

Any Party may, after 30 days notice in writing to other Parties, terminate its participation in the agreement without penalty or criticism, and without being subject to any judicial action.


This MOU is not a binding contract but is a memorandum of understanding which states the Parties' basic understandings of the voluntary tasks and methods for performing the tasks stated herein. This MOU is not legally enforceable and shall not be construed to create any legal obligation on the part of any Party or any third party or person.

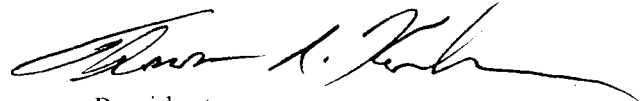
Nothing in this MOU authorizes or is intended to obligate the Parties to expend, obligate, exchange, or reimburse funds, services, or supplies or transfer or receive anything of value or to enter into any contract, agreement, or other financial obligation.


Trade secret and commercial or financial information that is privileged or confidential and that is contained in reports submitted to DOE pursuant to the 1605(b) program and its implementing guidelines shall be protected as provided in section 552(b)(4) of title 5, U.S. Code.

This MOU shall become effective as of the date the last Party duly executes it below:


Date: December 13, 2004


FOR SPENCER
ABRAHAM
Secretary
United States Department of Energy


President
Edison Electric Institute


President and Chief Executive Officer,
American Public Power Association


Chief Executive Officer,
National Rural Electric Cooperative Association


President and Chief Executive Officer,
Nuclear Energy Institute


President,
Electric Power Supply Association


Chairman,
Large Public Power Council


Chairman,
Tennessee Valley Authority