

Key Principles for an Energy Policy that Meets U.S. Environmental and Economic Needs

October 26, 2015

The energy sector in the United States is experiencing a period of dynamic change. Coal-fired power plants are retiring to make way for cleaner-burning and cheaper natural gas plants. Renewable sources of power, including wind and solar, continue to increase their market share as costs fall. American innovation is delivering new technology and opportunities to enhance the nation's security and create jobs while reducing pollution. At the same time, the United States and the global community are making commitments to address one of the most urgent challenges facing the planet: climate change.

The United States must adopt a clean energy policy that responds to today's needs and rises to tomorrow's challenges. The energy decisions policymakers make today will shape our children and grandchildren's economic and environmental future.

In order to meet the environmental and economic needs of the United States, the nation's energy policy should embody the following six key principles:

1. Set the United States on a path to achieve significant carbon pollution reductions by midcentury

The Obama administration has committed to reduce the country's greenhouse gas emissions to 26 percent to 28 percent below 2005 levels by 2025.² But the United States needs to do more to avert the worst impacts of climate change. The world's leading climate scientists say that greenhouse gas emissions from developed nations such as the United States need to decline 80 percent to 95 percent by 2050 compared with 1990 levels.³ In June 2015, the G-7 countries agreed that the world needs to achieve deep cuts in global greenhouse gas emissions with the goal of decarbonizing the global economy over the course of this century.⁴ Meeting that goal in the United States will require the development and implementation of new policies to control emissions of carbon and other greenhouse gases.

The United States simply cannot rely on fossil fuels the way it has in the past. By adopting appropriate policies, the United States could generate one-half of its electricity from zero-carbon emitting sources by 2030. Strong domestic action would facilitate international cooperation and help secure action from other nations.

2. Embrace renewable energy for electricity generation

The U.S. electricity sector is responsible for the largest percentage of the nation's carbon dioxide emissions.⁵ Continued long-term reliance on fossil fuels for the majority of U.S. power generation is incompatible with the aggressive response needed to avert the most serious impacts of climate change. Renewable energy, including wind and solar power, is surging in America, but it still lags behind the traditional fuels that powered the Industrial Revolution. The U.S. Environmental Protection Agency's Clean Power Plan to cut pollution from the nation's power plants will speed the transition to clean, renewable energy sources,⁶ but policymakers need to do more to rapidly decarbonize the power sector and aggressively deploy renewable energy technology.

3. Invest in safe, reliable, resilient energy infrastructure for the future

The energy infrastructure decisions that policymakers make today will last decades. That means they need to invest in infrastructure that makes sense not only today but also for future generations. A modern electricity grid needs to accommodate expanded and dispersed generation from renewable energy sources while providing reliable service to customers. As the climate continues to warm, reliability will go hand in hand with ensuring that American energy infrastructure is resilient to the impacts of climate change, including extreme weather. In addition, all energy infrastructure—from pipelines to railroads to energy production facilities—should adhere to the highest standards of public safety.

4. Reduce the U.S. transportation sector's dependence on oil

In 2013, the transportation sector accounted for 27 percent of the nation's greenhouse gas emissions. In order to meet the nation's pollution reduction goals, the United States needs to continue to make the nation's cars and trucks cleaner and more efficient. Over the longer term, the United States should move away from a transportation system that is almost entirely dependent on oil to one that relies on alternative fuels, including electricity. Automakers have already developed low-emission and zero-emission vehicles, and new technologies are appearing in dealerships every year. Policymakers should provide consumers and state and local governments with incentives to spur this transition to a cleaner, lower-carbon transportation system.

5. Protect and empower energy consumers

Energy policy is about more than supply and demand and buyers and sellers. As technology and innovation bring change to the energy sector, consumers will have new opportunities to benefit from cleaner energy technologies to lower their energy costs. Consumers should be free to make smart energy choices, such as installing solar panels or purchasing an electric car, without paying usurious fees that are designed to hinder innovation and prop up the antiquated approaches of the past. In addition, a clean energy economy should be inclusive. Consumers from all income levels should have the opportunity to reap the benefits of cleaner energy technology.

6. Balance the impacts of energy production with protections for America's public lands and fair returns to taxpayers

Oil and gas drilling, coal mining, and—to a lesser extent—renewable energy production all have environmental costs. Policymakers should seek to minimize these impacts by making wise decisions about which places are appropriate for development and which lands are simply too special to lose. Energy development should also be balanced with new and expanded protections for iconic landscapes; the reinvestment of energy revenues in the conservation of land, water, and wildlife; and the enforcement of clear mitigation and reclamation requirements. Because public lands and waters belong to all Americans, taxpayers should be compensated fairly for the extraction and development of their energy resources.

Endnotes

- 1 Tom Randall, "Fossil Fuels Just Lost the Race Against Renewables," Bloomberg, April 14, 2015, available at http://www.bloomberg.com/news/articles/2015-04-14/fossil-fuels-just-lost-the-race-against-renewables.
- 2 The White House, "Fact Sheet: U.S. Reports its 2025 Emissions Target to the UNFCCC," Press release, March 31, 2015, available at https://www.whitehouse.gov/the-press-office/2015/03/31/fact-sheet-us-reports-its-2025-emissions-target-unfccc.
- 3 Intergovernmental Panel on Climate Change, "Climate Change 2007: Mitigation of Climate Change" (2007), p. 776, available at http://www.ipcc.ch/pdf/assessment-report/ar4/ wg3/ar4-wg3-chapter13.pdf#page=32.
- 4 The White House, "G-7 Leaders' Declaration," Press release, June 8, 2015, available at https://www.whitehouse.gov/the-press-office/2015/06/08/g-7-leaders-declaration.
- 5 U.S. Environmental Protection Agency, "Sources of Green-house Gas Emissions," available at http://www3.epa.gov/climatechange/ghgemissions/sources.html (last accessed October 2015).
- 6 U.S. Environmental Protection Agency, "Fact Sheet: Overview of the Clean Power Plan," available at http://www2.epa.gov/cleanpowerplan/fact-sheet-overview-clean-power-plan (last accessed October 2015).
- 7 U.S. Environmental Protection Agency, "Sources of Greenhouse Gas Emissions."