



### **Snapshot of the American Clean Energy & Security Act (H.R. 2454)**

The American Clean Energy and Security Act (ACES) is the most comprehensive clean energy and global warming legislation the United States has ever seen. The passage of this historic bill would represent a key turning point in moving the US toward a clean energy economy. The bill:

- establishes a cap-and-trade system to reduce economy-wide global warming pollution;
- sets a nation-wide renewable electricity standard (a portion of which can be met through efficiency measures);
- provides funding to protect low and moderate income consumers, to develop carbon capture-and-sequestration technology, and to assist industry in transitioning to a low-carbon economy; and
- invests in efforts to stop deforestation, to help communities and natural systems deal with global warming's impacts, and to develop clean energy technologies at home and abroad.

#### **ACES Will Create Clean Energy Jobs**

ACES will put us on a pathway to create millions of new clean energy jobs in industries such as manufacturing and construction. For example, investment in renewable energy and efficiency spurred by ACES will increase demand for American-made steel and the other 8,000 parts needed to manufacture American-built wind turbines.<sup>1</sup> Increasing efficiency will also create weatherization and retrofitting jobs that will employ local workers.

#### **ACES Will Help the U.S. Achieve Energy Independence**

Increasing the use of domestic clean energy sources will help the US reduce its dependence on foreign oil. Investment in low-carbon energy will help the US become a leader in the manufacture and sale of clean energy technologies all over the world.<sup>2</sup>

#### **ACES Will Reduce Global Warming Pollution**

ACES will address the growing threat of global warming by cutting greenhouse gas emissions in the US while increasing the use of renewable energy sources and more energy efficient technologies.

#### **ACES Will Help Revitalize the U.S. Economy**

ACES will lower the cost of transitioning to a clean energy economy, by providing funding for consumer protection, industry transition assistance, and clean technology research and development. Consumers and businesses will save billions of dollars in energy costs through energy efficiency improvements.

#### **Congress Must Act Now**

Global warming is already changing our climate, posing human health, economic and security threats. We now know that these impacts are accruing even faster than scientists predicted just a few years ago. We must act now to avoid further profound changes to the natural systems upon which we all depend.

Key international climate change negotiations will take place in Copenhagen in December. Enacting comprehensive climate legislation this year will enable the US to go into these negotiations with renewed credibility.<sup>3</sup> By demonstrating that we are reducing emissions at home, the US can forcefully negotiate for similar commitments from other countries, particularly China and India, and lead the 21<sup>st</sup> century transition to a clean energy economy.

**It is critically important for Congress to pass and strengthen this historic legislation.**

<sup>1</sup> Environmental Defense Fund, "How Capping Carbon Creates Jobs," 22 May 2009.

<sup>2</sup> Daniel J. Weiss and Daniel Wagener, "10 Reasons to Support the Waxman-Markey Bill," Center for American Progress Action Fund, 18 May 2009.

<sup>3</sup> Mark Clayton, "Sweeping climate-energy bill clears first big hurdle in Congress," *The Christian Science Monitor*, 22 May 2009.



### **What Does ACES Mean for North Carolina?**

North Carolina is already seeing the effects of climate change - annual average temperature has increased over the past 40 years, fall precipitation has increased 30 percent while summer precipitation has decreased, the frequency of heavy downpours and the power of Atlantic hurricanes have both increased.<sup>4</sup> ACES will help North Carolina mitigate and adapt to these changes, while creating jobs, bolstering the state economy, and generating savings for North Carolina families.

#### **What Does ACES Mean for North Carolina Jobs?**

- The Renewable Electricity Standard (RES) established by ACES will spur the creation of more jobs in North Carolina's clean energy economy, which is already large and continuing to grow.
  - From 1998 to 2007, the number of jobs in the clean energy sector in North Carolina increased 15.3%. Overall job numbers in North Carolina during the same period increased 6.4%.<sup>5</sup>
  - In 2007, the number of clean energy economy jobs in North Carolina (16,977) exceeded the national average.<sup>6</sup>
  - Case study: Cree, Inc, based in Durham, NC, is a world leader in energy efficient LED lighting technology. Cree holds patents on a number of innovative LED technology improvements, and has seen the demand for its products increase over the past several years. The company's work force quadrupled from 2002 to 2008, and its revenue doubled from 2003 to 2008.<sup>7</sup> ACES will help sustain and even increase growth at this firm and many others like it.

#### **What Does ACES Mean for North Carolina Consumers?**

- Energy efficiency provisions in ACES could save Americans approximately \$3,900 per household by 2030.<sup>8</sup>
- State programs funded through ACES to promote investments in renewable energy and efficiency will substantially reduce consumer energy bills in North Carolina and across the country.<sup>9</sup>
- Revenue from 15% of the emissions allowances distributed under ACES are devoted to protecting low-income consumers.<sup>10</sup> Low-income families in North Carolina will receive tax credits and energy refunds to offset their energy costs.

#### **What Does ACES Mean for the North Carolina Economy?**

- Venture capital investments in clean technology in the state totaled over \$82 million from 2006 to 2008.<sup>11</sup> An RES would create millions of dollars of additional capital investment in North Carolina.<sup>12</sup>
- Energy efficiency measures in ACES will keep money in local North Carolina communities, creating a multiplier effect that will generate economic activity and create thousands of new jobs.<sup>13</sup>

#### **What Does ACES Mean for North Carolina Agriculture?**

- An RES would increase income to North Carolina farmers and rural landowners who produce biomass energy and/or lease their land to wind developers.<sup>14</sup>

<sup>4</sup> U.S. Global Change Research Program, *Global Climate Change Impacts in the United States*, Cambridge University Press, 2009.

<sup>5</sup> The Pew Charitable Trusts, "The Clean Energy Economy," June 2009.

<sup>6</sup> The Pew Charitable Trusts, "The Clean Energy Economy," June 2009.

<sup>7</sup> Environmental Defense Fund, Less Carbon, More Jobs, "Company Snapshot: Cree, Inc." 23 Feb 2009.

<sup>8</sup> American Council for an Energy-Efficient Economy, "HR 2454 Addresses Climate Change Through a Wide Variety of Energy Efficiency Measures," June 2009.

<sup>9</sup> Natural Resources Defense Council, "Strengthen and Pass H.R. 2454, the American Clean Energy and Security Act (ACES)," 15 June 2009.

<sup>10</sup> David Doniger, "House to Vote on American Clean Energy and Security Act," National Resource Defense Council blog, 10 June 2009.

<sup>11</sup> Pew, "The Clean Energy Economy," June 2009.

<sup>12</sup> Union of Concerned Scientists, "Cashing in on Clean Energy: A National Renewable Electricity Standard Will Benefit the Economy and the Environment," July 2007.

<sup>13</sup> ACEEE, "HR. 2454 Addresses Climate Change Through a Wide Variety of Energy Efficiency Measures," June 2009.

<sup>14</sup> Union of Concerned Scientists, "Cashing in on Clean Energy: A National Renewable Electricity Standard Will Benefit the Economy and the Environment," July 2007.