THE PEW CHARITABLE TRUSTS

The Honorable Orrin G. Hatch
Chairman
Committee on Finance
United States Senate
104 Hart Senate Office Building
Washington, D.C. 20510

The Honorable Ron Wyden
Ranking Member
Committee on Finance
United States Senate
221 Dirksen Senate Office Building
Washington, D.C. 20510

The Honorable Dean Heller
Co-Chair, Community Development &
Infrastructure Working Group
United States Senate
324 Hart Senate Office Building
Washington, D.C. 20510

The Honorable Michael Bennet
Co-Chair, Community Development &
Infrastructure Working Group
United States Senate
458 Russell Senate Office Building
Washington, D.C. 20510

April 15, 2015

Dear Chairman Hatch, Ranking Member Wyden, and Senators Heller and Bennet:

Thank you for your leadership in initiating a discussion of the direction and scope of U.S. tax policy. On behalf of the Pew Clean Energy Initiative, I am writing to urge your consideration and adoption of targeted tax incentives that will help strengthen our nation's position in the burgeoning clean energy marketplace and help make America more prosperous, secure and clean.

Historically, tax policy has played a central role in encouraging U.S. energy innovation, production, deployment and trade. Some incentives have been in place for more than a century, encouraging the maturation of various fossil resources – from coal to oil and natural gas. Subsidies also helped spur the development of the nuclear industry in the United States. In recent years, tax incentives have advanced alternative energy sources like solar, wind, geothermal, and biomass. All of these efforts have created a stronger, more diverse energy portfolio for the United States. As a result, the country has a range of power options that make our electricity system more resilient, secure, and affordable.

It is in our national interest to continue developing innovative advanced and efficient technologies as prices decline, deployment grows and world markets expand. In 2014, $310 billion was invested worldwide in clean energy goods and services, growing almost 17 percent from 2013. According to the International Energy Agency, renewable generation will surpass that from natural gas and double that from nuclear power by 2016, becoming the second most important global electricity source. By, 2018, clean energy is estimated to rise to 25% of gross power generation. New research from The Pew Charitable Trusts projects that worldwide electric generating capacity from renewable sources will grow 594 percent by 2030. Companies and countries are turning to these resources because they enhance energy security, protect the environment, and represent a tremendous economic opportunity for the future.

Investments in global power generation will reach $7.7 trillion by 2030 with renewables attracting more than 65 percent of the total. Clean energy represents a significant economic opportunity for U.S.

innovators, entrepreneurs, manufacturers, project developers and investors. Unfortunately, U.S. competitiveness in the sector is as uncertain as our policies.

The Pew Clean Energy Initiative has undertaken research and worked closely with industry to understand the challenges businesses are facing and how these impact U.S. competitiveness in the clean energy marketplace. Time and again, experts have cited policy uncertainty as the overriding impediment to clean energy investment and progress by businesses and investors. The inconsistent nature of U.S. tax incentives makes it challenging for our companies to develop the supply chains and business models they need to succeed and for investors to have the assurance they require to deploy capital. Our annual research tracking clean energy investment and deployment trends clearly demonstrates that policy matters. Those countries with consistent, long-term energy and tax policy are most likely to attract private investment.

Below, please find a summary of several of the key principles and tax initiatives that the Pew Charitable Trusts supports in order to strengthen the United States' ability to capitalize on the emerging domestic and international clean energy markets:

- **Reinforce incentives for private investment.** The Production Tax Credit (PTC) and Investment Tax Credit (ITC) have been cornerstones of U.S. energy policy for much of the past decade. These credits have helped stimulate investment, deployment, and manufacture of renewable and efficient products and processes, thereby driving down technology costs and encouraging deployment. However, unlike the permanent incentives for incumbent resources, the PTC and ITC are clouded by uncertainty, creating a "boom and bust" cycle. The PTC has expired multiple times since its enactment in 1992, each time dampening investor interest in the wind sector. The ITC will expire at the end of 2016. Industry recognizes that these incentives cannot continue indefinitely but a predictable and clearly identified path to phase-outs should be put in place. A gradual phase-out will ensure renewable energy becomes mature and competitive and help our country achieve its goals for an "all of the above" energy posture which promotes security, affordability, and emissions reductions.

- **Reform the ITC to provide parity to efficient industrial energy technologies.** We must harness technologies that encourage power generation efficiency, reduce pollution, enhance productivity, and encourage resilience. The ITC, as currently constructed, offers narrow capacity limits for combined heat and power (CHP) projects, disqualifying many worthy projects. Industry recommendations for the ITC or any comparable credits in the future have included increasing the credit from 10 to 30 percent of the capital costs of a project, increasing the project cap from the first 15 megawatts (MW) of the project to the first 25 MW, and eliminating the 50 MW system-wide cap.

  Waste heat to power installations could monetize 10 GW of clean electricity, heating, and cooling capabilities – yet it is excluded from the current definition of the ITC for CHP projects. Since there is no fuel used in capturing waste heat, this technology should be included in future tax incentives at the same rate as other renewable and efficient competitors.

  While these systems are often termed "industrial energy efficiency" because of their ability to produce electricity at 60-100 percent efficiencies; they are electricity generators. For this reason, we believe that these technologies should be allowed to compete for incentives with other low-carbon generators.

The suite of cogeneration applications mentioned above are highly optimized power producers because they capture the wasted thermal output usually released into the atmosphere and use it to heat nearby buildings and/or to generate additional electricity. These units are usually fueled with natural gas, biomass, waste, wood, and sometimes coal. No matter what basis for qualification is chosen (e.g., cleanliness, efficiency, etc.) it is paramount that base load, efficient, and resilient power generators like CHP be provided the opportunity to compete effectively with other low polluting sources and the best way to ensure this is to account for the thermal output. To implement this suggestion, we advise following the lead of the U.S. Environmental Protection Agency, which included thermal output in their calculations of gross emissions output under their recently released proposed rule for new power plants (Section 111(b)). Following this model will not only ensure that only the cleanest, most efficient CHP systems are incentivized, but also that they are credited to the fullest extent for utilizing an otherwise wasted resource – heat.

- **Level the energy playing field.** A wide variety of economic, regulatory and legal barriers favor incumbent technologies. These barriers threaten the ability of new companies to gain a competitive foothold, diminish consumer choice, limit product offerings, and prevent lower prices. Government tax policy should help break down barriers to competition. For example, Master Limited Partnerships (MLPs) are business structures that allow taxation at the stakeholder instead of corporate level and achieve lower capital costs. They are a proven mechanism for leveraging financing for the traditional power sectors, having attracted more than $400 billion of investment to fossil fuel projects in the U.S. over the last 30 years. However, clean energy systems do not have access to these incentives, placing them at a financial disadvantage. Congress should extend MLPs to these technologies thereby allowing them to access a larger pool of private capital.

While there are many ways to improve the existing tax code to foster innovation, manufacturing, and trade, a simplified code would provide critical policy support and certainty for clean energy technologies. Tying incentive phase outs to deployment or capacity goals rather than arbitrary dates; tiered frameworks based on a product or system's emissions profile; and technology-neutral approaches are examples of principles that could be adopted to strengthen U.S. international competitiveness.

Again, thank you for your leadership. We hope these ideas help give context to your work and demonstrate that the tax initiatives Congress adopts today could shape America's economic, environmental, and energy future for many years and decades to come. We look forward to discussing these ideas as Congress continues to work on these policy issues.

Sincerely,

Phyllis Cuttino
Director, Clean Energy Initiative
The Pew Charitable Trusts