

CLEAN ENERGY TAX CREDITS: A BIPARTISAN OPPORTUNITY FOR THE 119TH CONGRESS



In 2022, Congress passed legislation that included nearly two dozen tax provisions focused on accelerating the transition to a clean economy. These tax credits provide generational economy-wide benefits, which include incentivizing private sector investment, revitalizing U.S. manufacturing, creating good paying jobs, and securing energy independence.

TAX CREDITS

48E ITC and 45Y PTC: Technology-neutral tax credits for clean electricity. Replaces the previous PTC for electricity generated from renewable sources for facilities.

45Z PTC: Replaces the 40B sustainable aviation fuel (SAF) PTC and provides a credit for domestic production of clean transportation fuels, including SAF, beginning in 2025. Fuels must be produced in the United States and meet carbon dioxide requirements to qualify.

45Q: Credit for carbon dioxide sequestration when coupled with permitted end uses. The credit amount is \$12–\$36 per metric ton of carbon dioxide captured and sequestered.

45X PTC: Provides a credit for domestic manufacturing of components for solar and wind energy, inverters, battery components, and critical minerals.

48C: Provides a tax credit for investments in advanced energy projects.

45U PTC: Tax credit for electricity from qualified nuclear power facilities and sold after 2023.

45V: Credit for the production of clean hydrogen at a qualified production facility.

30D: Tax credit for purchasers of clean vehicles of up to \$7500, presuming that domestic content requirements for critical minerals and battery components are met.

30C: Tax credit for alternative fuel vehicle refueling and charging property in low-income and rural areas. Alternative fuels include electricity, ethanol, natural gas, hydrogen, biodiesel, and others.

OTHER KEY CREDIT UPDATES

There are a number of new provisions that significantly expand the accessibility of these credits to a larger pool of investors, increasing the economic, environmental, and energy security benefits of the credits.

Elective pay or direct pay: makes certain clean-energy tax credits effectively refundable. Tax exempt entities can—after notifying the Internal Revenue Service (IRS) of their intent to claim the credit—claim and receive a refund for the full value of the credit irrespective of their tax liability.

- Many public sector entities were previously unable to take advantage of these credits to help finance projects due to their lack of tax liability. Direct pay addresses that problem.

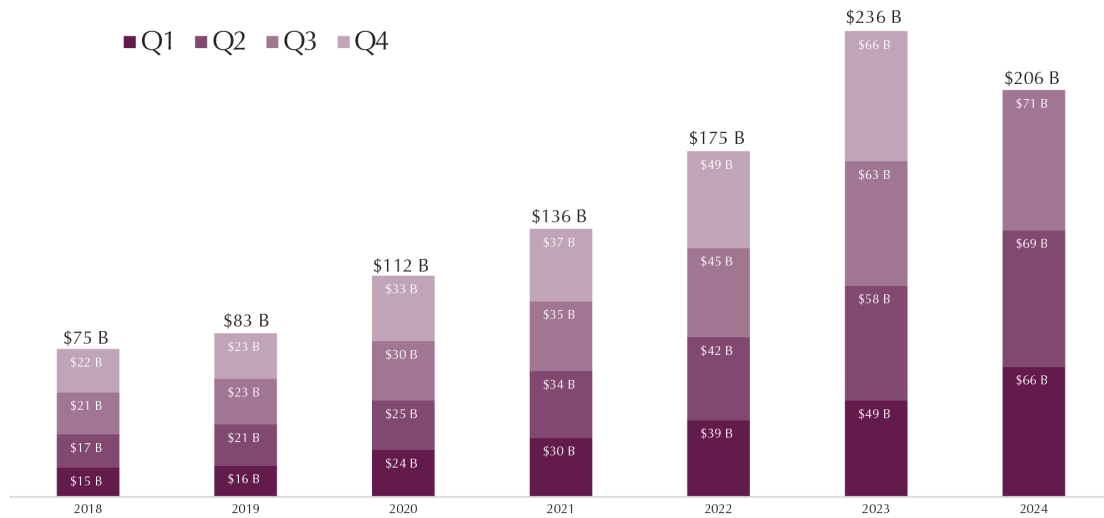
Transferability: allows entities that don't qualify for direct pay, but don't have sufficient tax liability, to claim the full credit, transfer, or sell all or a portion of the credit to a third-party buyer. This provision enables a much larger pool of investors to leverage eligible credits to finance a far greater number of projects.

Qualifying energy projects that also meet other specific criteria may be eligible for additional tax credit amounts, also referred to as “bonus adders”, including: domestic content, energy communities, low-income communities, and prevailing wage and apprenticeship bonuses.

Rhodium Group found that, between the second half of 2022 and the start of 2024, business and consumer investment in clean energy technologies and infrastructure totaled \$493 billion, a **71 percent** increase over the previous two-year period.¹

¹ Lily Bermel et al, Clean Investment Monitor: Tallying the Two-Year Impact of the Inflation Reduction Act (New York: RHODIUM GROUP | MIT CEEPR, 2024), https://rhg.com/research/clean-investment-monitor-tallying-the-two-year-impact-of-the-inflation-reduction-act/?amp;_r_t_nonce=c323c9b89a.

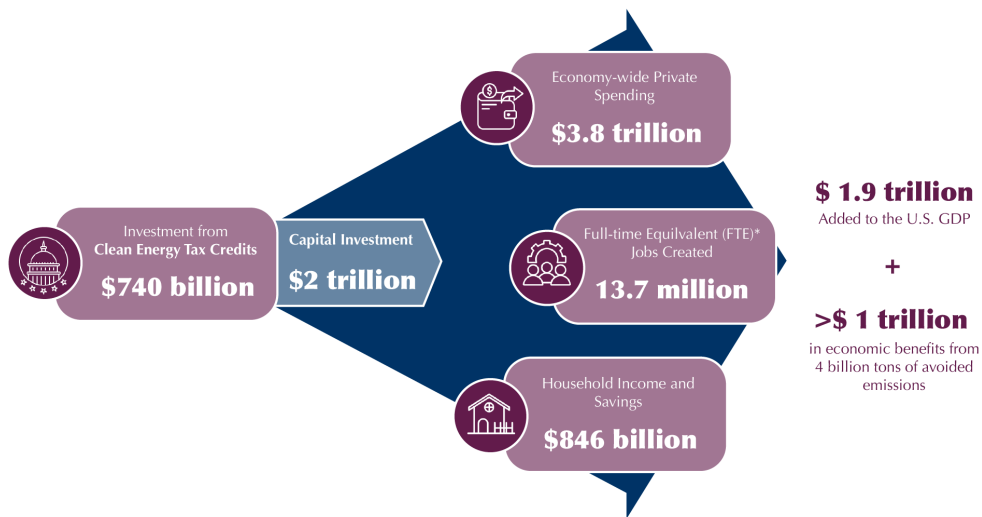
Figure 1: Clean Energy Investments by Quarter



Values are adjusted to 2023 dollars.

Source: Rhodium Group-MIT/CEEP, Clean Investment Monitor 2024 Q3 Update, November 21, 2024, <https://www.cleaninvestmentmonitor.org/reports/clean-investment-monitor-q3-2024-update>.

Figure 2: Clean Energy Tax Credits Deliver 4X Return on Taxpayer Investment



Energy tax credits worth \$740 billion ultimately return over \$3 trillion in national economic and emissions benefits.

Adapted from: ICF, Economy-wide Impacts of the Inflation Reduction Act Energy Provisions (Washington, DC: ICF, 2024), <https://cleanpower.org/resources/economy-wide-benefits-of-energy-tax-credits>.

To learn more about clean energy tax credits, please contact C2ES's Director of Advocacy Rose Luttenberger Caruso at LuttenbergerR@C2ES.org.



The Center for Climate and Energy Solutions (C2ES) is an independent, nonpartisan, nonprofit organization working to secure a safe and stable climate by accelerating the global transition to net-zero greenhouse gas emissions and a thriving, just, and resilient economy.