

Seize the Future:

Good jobs and infrastructure for a decarbonized world

The energy transition requires empowered workers and robust planning.

Averting climate catastrophe requires comprehensive, all-out action by the United States, the world's top historic emitter and among the highest per capita emitters. However, to date the United States has failed to confront the crisis at scale. In order to stay under 1.5 Degrees Celsius and stave off the worst impacts, the world must cut carbon emissions in half by 2030. The United States is nowhere near on track for that goal. Now is the time for an agenda that rapidly builds the new, green economy.

Addressing this crisis is a historic opportunity to remake America's infrastructure, invest in high road jobs for all, and create a strong public sector that works for the people, not profit.

Overhauls of US infrastructure—from schools to transit to transmission—won't come from tweaks to the private sector, deregulation, or financial incentives alone. In fact, heavily relying on financial sweeteners makes urgent investment and job security vulnerable to the whims of financial markets and private sector priorities. It also increases the risk for patterns of investment to entrench historic injustices and deepen the chasm between the working class and the wealthy— particularly for BIPOC and rural communities.

The US has to build faster—but has to build in the right way to achieve positive, popular, and enduring results. That would entail rebuilding a strong public sector leveraging green industrial policy to plan for and accelerate the transition in ways that benefit the working class. Families need to see the benefits of infrastructure investment in their backyards, be it better local jobs or cleaner air or transit system expansions. This applies not only to the end result but also the entirety of green supply chains.

The next President must also be unafraid to take on private interests like the fossil fuel industry and actively manage the transition away from infrastructure and business practices that harm public health and climate commitments.

The Inflation Reduction Act made strides toward infrastructure investments by establishing important tax incentives for clean energy, requiring community benefits plans for infrastructure projects with grants and loans from the Department of Energy, including prevailing wage requirements to increase incentive amounts, and creating financing vehicles like the Greenhouse Gas Reduction Fund to provide public capital targeted at disadvantaged communities. However, it still hands over planning to the private sector and relies on carrots with very few sticks to ensure that the US meets its climate goals. Furthermore, the US is clearly still on an “all of the above” energy trajectory that both incentivizes renewables and fossil fuels in a moment when the world desperately needs to end fossil fuels.

Communities and workers deserve a planned, coordinated, and fast transition that makes their neighborhoods more livable, their jobs safer, and the air and water cleaner.

We see three critical interventions to achieve these goals:

1. Empowering the green working class
2. Constructing supply chains that build worker power and community benefit
3. Coordinating the energy transition

1. Empower the green working class.

Green jobs must be good jobs. Classically-described green jobs are those that build solar panels, retrofit houses to be more energy efficient, and manufacture wind turbines. Since many of these jobs emerged in the context of reduced worker power in the United States, green jobs are too often low-wage, precarious, and degrading. One of the clearest ways to ensure that green jobs are good jobs is to increase the capacity for workers to organize and create strong regulations to limit harm and exploitation. But our vision of “green jobs” goes beyond the typical definition. That’s because the climate crisis affects all types of workers – from nurses overwhelmed after a hurricane to warehouse workers dying from extreme heat on the job. All jobs ultimately need to be green jobs. The IRA made good strides in this direction by integrating labor standards into project and tax incentives for new and emerging green workforces, but the next President can go much further to lift up working class communities by protecting the right to organize, expanding public sector employment opportunities, and ensuring a just transition for workers in polluting industries.

Policy recommendations

Protect and expand workers’ right to organize: Organized labor has made a resurgence in the past four years, inspiring new generations to fight for higher-quality jobs and collective worker power. But decades of corporate and neoliberal state attacks, like outsourcing, gig-ification and right-to-work laws, have reduced the percentage of unionized workers in the US to near historic lows and driven geographic competition based on a race to the bottom that hurts workers. Ensuring that green jobs are good jobs means protecting workers’ rights to freely and fairly form a union and bargain together for changes in the workplace. Protecting and expanding the right to organize with legislation like the PRO Act, implementing strong protections, and providing just working conditions are core to ensuring that workers can stay healthy and thrive in the era of the climate crisis. These protections must be provided to all workers, including domestic workers, farmworkers, undocumented workers, and incarcerated workers.

Raise the standards of working conditions: Extreme weather and higher heat days is making work deadly. Some researchers estimate that the annual number of worker heat-related deaths is in the thousands. Agricultural workers are exposed to new elements, firefighters have to combat wildfires far more often, and nurses are overwhelmed by the number of patients (particularly after extreme weather events). The next President must integrate higher working condition standards into American life to ensure that people are safe and healthy on the job. This means increasing protections for particularly vulnerable worker populations like agricultural workers, and ensuring universal standards that adapt to the changing realities of work in a warming world.

Ensure a just transition for workers in climate impacted industries: Industries will change with the transition— from fossil fuel companies to housing developers— inevitably affecting workers. The next President must pass a robust transition planning and relief framework that provides new forms of non-extractive employment in regions affected by the transition, builds pathways into higher-quality jobs for dislocated workers, and supports those workers displaced in the transition. This means supporting workers and their families with comparable employment and retraining opportunities and providing direct relief or wage replacement to workers and their families.

Build a diverse, local workforce: The transition will create new economic opportunities with infrastructure buildout, new manufacturing sites, and new technology development. This offers new opportunities for young, BIPOC, and working class people who haven't had access to good jobs for far too long, access to a whole new emerging economy. Implementation of the Bipartisan Infrastructure Law and Inflation Reduction Act have made strides toward ensuring local and domestic investments had positive economic impacts. At the same time, the Supreme Court has gutted affirmative action. To build industrial policy that advances racial and gender inclusion and equity requires the US to go further, requiring local and minority hiring, working directly with organized labor to expand union density, and designing opportunities via apprenticeships and other on-the-job training to diversify access to well-paid green jobs.

Rebuild the Public Sector via Green Public Employment: A well coordinated green transition will take people power, be it reviewing permitting proposals in the Bureau of Land Management or restoring a house after another category 5 hurricane with FEMA. The US needs to scale up a green public jobs program to fill in massive capacity holes designed from decades of disinvestment so that the world can achieve its climate goals, while also creating meaningful employment in the public sector. The American Climate Corps, employing 20,000 people, is a step forward but is far from the scale that the crisis deserves (or what we have proven to achieve in history – the Civilian Conservation Corps of the New Deal employed more than three million people over its nine years). Rather than working through the Americorps model in which the federal government sets a below-minimum wage floor for public sector and non-profit employees, public employment should ensure livable wages and benefits. Public employment also creates opportunities for dislocated energy workers to remain working, especially across the rural US, by facilitating new industries in climate infrastructure.

2. Construct just supply chains that build worker power and community benefit.

Decarbonization offers an exciting opportunity to remake the built environment. The US can leverage the need to eliminate emissions from buildings, manufacturing sites, bridges and trains, and ports to create good jobs and make communities more livable. Decades of neoliberalism and private sector hegemony cut investments in public infrastructure allowing railways and school buildings to go into disrepair, and allowing industries to pollute the air and water. The US must redefine itself as a country that builds high quality green infrastructure, manufactures low-carbon materials, and uplifts workers and communities across the supply chain. The renewed interest in [industrial policy](#) offers new opportunities to kick-start far more comprehensive approaches to infrastructure development and manufacturing capacity – as well as guardrails that improve welfare both for the end user but also those across the supply chain and across borders.

Policy recommendations

Build critical infrastructure for everyday life: For far too long, the US has failed to invest in necessary upkeep for infrastructure, from bridges to buildings. The next President needs to prioritize constructing new high speed rail projects, designing millions of units of green public and social housing, and retrofitting hundreds of thousands of schools. Decarbonizing every facet of US communities also offers a huge opportunity to create more livable communities and put people to work. Forthcoming CCI jobs modeling finds that shifting all of today’s highway construction dollars into road repair and infrastructure for transit would mean a net gain of 233,000 construction jobs while building vibrant local economies and reducing air pollution. Similarly, investments like the [Green New Deal for K-12 Public Schools](#) could create 1.3 million new, good-paying jobs annually, decarbonize a huge number of buildings, and make sure that students are safe during smoke days and heat waves.

High road green manufacturing acceleration: The US will need semiconductors, heat pumps, solar PV, electric vehicles, and so much more to mitigate and adapt to the climate crisis. There is a real opportunity to rebuild manufacturing in the US and build public support and worker buy-in for climate action. Efforts to onshore domestic supply chains that couple environmental and labor standards can add many good, unionized manufacturing jobs—and transition existing pollution-intensive ones—while accelerating a just energy and industrial transformation. The next President should prioritize aligning US green manufacturing planning and deployment with socially useful production and goods. Strategies like CAFE standards for material efficiency, incentives to manufacture important products like low-carbon building materials, and requirements such as [high-roads disassembly and right to repair](#) all can contribute to building useful, high roads manufacturing in the US.

Lower impact of heavy industries: Steel, cement, chemicals and other industries have long relied on fossil-based production methods while creating toxic pollution in surrounding, often BIPOC, communities. The IRA incentives and grants around heavy industries are a significant start. However, these programs do not uniformly lead to weaning off fossil reliance, and in some cases are expanding them (such as the case of blue hydrogen). To move forward, cumulative impact reduction and de-fossilization of these heavy industries must be at the forefront of any further policies, while centering a just transition and remediation for workers and communities in regions moving away from extractive processes. Additionally, industrial decarbonization must be linked with efforts to expand public and social goods infrastructure including green construction materials for social housing and rail, rather than supporting highway expansions or military material manufacturing.

Develop public financing agencies to accelerate projects: For decades, US climate policy has relied on subsidies, tax breaks, and other financial sweeteners to drive the buildout of renewable energy systems and other climate-critical infrastructure. This approach was meant to help make investments in nascent technologies less risky. This approach has failed to achieve the goal of rapid decarbonization. The US financial system, even with copious inducements, has not sufficiently invested in decarbonization, still preferring to invest, for example, in profitable fossil fuel projects instead of lower-return renewables. The US needs to provide far more direct financing through grants, concessionary lending, revolving funds, and direct ownership stakes for important decarbonization projects that lower people's everyday costs, provide critical infrastructure, and quickly decarbonize. The IRA's Greenhouse Gas Reduction Fund is one exciting example of green banking, and could be further codified in a National Investment Authority. Meanwhile, the Federal Reserve and other monetary authorities like the SEC and CFTC should align regulatory approaches that push financiers to make investments in line with climate targets.

3. Coordinate the energy transition.

Decarbonization requires a comprehensive reorganization of a backbone to the US economy: the energy system. The US needs to build a massive amount of clean energy and infrastructure and manage the phaseout of fossil fuels if it is to achieve its current climate targets. However the US has taken an uncoordinated “all of the above” approach to its energy policy, allocating renewable tax incentives with one hand while greenlighting massive fossil fuel projects like Willow on the other. In the IRA, the legislation required the Department of the Interior (DOI) to offer at least 60 million acres of offshore oil and gas leases in the previous year before issuing offshore wind leases. The US won’t achieve its climate goals if it refuses to coordinate the transition, building out clean energy in tandem with transitioning off fossil fuels. The US government has a far stronger role to play in taking on fossil fuels— the core contributor to carbon emissions. As one of the biggest net exporters of fossil fuels in the world, the US has a particular global responsibility to end extraction. Instead of tinkering with broken market systems against the power of the fossil fuel industry, corporate utilities, or financiers, the federal government can intervene to ensure that the transition prioritizes families, workers, and the environment over profits while also moving fast enough to avoid the worst impacts of the climate crisis.

Policy recommendations

Electrify everything and make the grid more resilient: Electrifying everything is critical to slashing emissions. Cars, trucks, factories, homes all need to be added onto the grid to run on clean energy instead of oil or gas. That is a massive project that requires a coordinated infrastructure overhaul— swapping out whole networks of gas pipes and designing comprehensive EV plugin systems. But with ever intensifying climate events, from wildfires to hurricanes, the grid can’t just be electric, it has to be resilient. The US should invest substantial funds in solar plus storage, resilience centers with microgrids, and other grid-related disaster infrastructure, particularly ensuring that federal dollars don’t go to fossil or outdated infrastructure after disaster. A renewed, resilient grid means that families don’t have to use toxic gas stoves to cook, buses can charge up and provide emissions-free transportation, and retrofitted homes and renewables installations can lower family energy bills.

Increase planning capacity and build public renewables: The US needs to get renewable energy online far faster and at scale. Not only can the renewables buildout lower the cost of energy, it can stem the climate crisis, lower pollution, and create new jobs. The US can invest in better energy and land use planning that coordinates the country’s energy future so that we decarbonize quickly, maximize benefits to communities, and safeguard pristine environments. The US should also create a public option for renewable energy development, able to step in where the private sector has failed to build integral projects like transmission lines, offshore wind, and solar farms and create strong public sector jobs.

Eliminate subsidies for fossil fuels: While families across the US struggle to pay rising rent or rebuild their homes after storms, the US government is providing nearly \$15 billion dollars a year in subsidies to fossil fuel companies. This money is a direct handout to the very firms that fuel climate change. Research estimates that ending fossil fuel subsidies would yield sizable declines in extraction. [Repealing existing fossil fuel subsidies](#) is a straightforward measure to rebalance government giving toward working people instead of massive corporations, while also lowering emissions.

Restrict the expansion of fossil fuels and nationalize the industry: Not only does extracting and burning fossil fuels cause the climate crisis, it harms the health of both people and ecosystems. For instance, people in Pennsylvania were left with [polluted water and cancer](#) when fracking came into the state. Stopping the expansion of fossil fuels can ensure that communities can continue to drink clean water and breathe fresh air. The US government can [take important steps to end expansion](#) by ending all new leases on fossil fuels and phasing out existing ones, ending export terminal development, and stop giveaways to the fossil fuel industry in the form of “green investments” (such as blue hydrogen or enhanced oil recovery) that actually harm people. Managing fossil fuel wind-down will also require federal intervention and ownership of the industry. Right now, companies turn to bankruptcy and drop the burden of cleaning up the impact on communities and the environment on the government– the [coal industry’s demise](#) exposes how companies react when revenue is threatened. There is an alternative – put the fossil fuel industry into public ownership so that it can be managed effectively by a [Federal Just Transition Agency](#). This would allow the federal government to put workers, the environment, and communities above profit incentives while smoothing the impact on energy prices for consumers.

Conclusion

Zero-emissions energy, transportation, and buildings are all technically feasible—but these systems are not being built at the speed or scale we need to avert climate chaos or bring about a just, green economy. Privatized asset ownership of critical infrastructure, the financialization of climate action that sends huge volumes of public money to financial intermediaries, and the vacuum of public coordination are hobbling the just transition we need. With strong public institutions we can rapidly and justly scale up green generation, make intentional use of public power and planning, construct globally just supply chains and unionized green jobs, manage the transition away from fossil fuels, and build the infrastructure for a green, inclusive society where everyone benefits from the remaking of our energy systems.