How Long Can Neoliberalism Withstand Climate Crisis?

by Julius Alexander McGee and Patrick Trent Greiner

The climate crisis is proving to be antithetical to the neoliberal machines that define current forms of social organization. On the one hand, reducing fossil fuel consumption, the largest contributor to climate change, requires collaborative efforts. These efforts must take into consideration the foundational role of fossil fuels in modern economies. We must acknowledge, for instance, that most peoples’ livelihoods are tethered to fossil fuels, which recent studies have demonstrated is not the result of random historical development but deliberate policy. Fossil fuels continue to be used as a form of social domination—a means to expropriate productive and reproductive labor. In the meantime, renewable sources of energy have become a favored climate-conscious alternative to fossil fuels. Yet, renewables lack many of the characteristics that have made fossil fuels so desirable in production processes, limiting their ability to expropriate human labor. Renewables do not lend themselves to centrally located reserves or the formalized distribution patterns that allow firms to profit from the extraction, production, and consumption of energy, as fossil fuels do. At the same time, climate catastrophes, such as wildfires and hurricanes, disrupt the infrastructural momentum of fossil fuel economies, destabilizing the mechanisms of capital accumulation that derive from the production and consumption of these fuels. We see both of these problems coming to a head in the recent crises unfolding in Chile and California.

In the context of the recent Chilean protests and electricity blackouts across the state of California, it is worth reflecting on the ever-growing and increasingly apparent connections between neoliberalism and climate crisis. The people in Chile protested the widespread inequality that neoliberal climate mitigation policies threaten to exacerbate. Specifically, the recent move by the Chilean government to increase electricity rates by 9.2 percent for over seven million households and raise fares for public transit by 3.75 percent, due to expanded renewable energy consumption, was largely responsible for the protests. Meanwhile, in California, residents braced themselves for yet another round of planned blackouts implemented by private utility companies—intended to prevent future fires. These blackouts affected around three million people over the last few months of 2019 and led Californians to call for the deprivatization of utilities in the state.

These crises have long and complex histories rooted in Chile’s U.S.-backed coup d’état in 1973, which established a junta and ou democratically elected socialist leader Salvador Allende. The coup opened the door for a neoliberal experiment on electricity markets results of which have taken hold in Chile, California, and around the world, and are largely responsible for current electrical power crises. It is precisely neoliberalism’s legacy that resulted in the propagation of the wholesale energy market systems wreaking havoc in California and Chile. What is more, the social disruption borne from the institution of these complex market structures has been more acute due to corporate and political reliance on similar approaches to managing the fallout of climate change.

Wholesale energy trading began as an experiment in Chile during the 1980s. Prior to the coup, the Allende-led administration nationalized its copper industry and utilities as part of an organized effort to transition peacefully to socialism. Following the coup, military dictatorship headed by Augusto Pinochet began to reprivatize the recently nationalized markets, an effort that included ExxonMobil to buy copper mines from the government. As is true for many of Chile’s social and economic policy strategies during this period, the reprivatization of the energy sector was designed to allow capital to reassert itself over the effective management of energy resources and the social well-being of the people. Since the return to democracy in 2000, Chile has continued to push the boundaries of neoliberal energy policy, often with disastrous results for the country’s climate goals.
Pinochet's seventeen years of brutal dictatorship, the junta relied on the guidance of Chicago School economists when it came to rep vestigating energy. This meeting of the minds ultimately led Chile to design a system of energy trading that allowed electricity to speculate on future electricity demand and, thereby, to profit from changes in electricity prices. The newly established economy, an institution commonly referred to as a wholesale energy trading market, was intended as a way to profit from electricity distribution without increasing the retail price paid by consumers and at first appeared to do so. After the introduction of whole in Chile, the model quickly spread across the world.

According to its proponents, the wholesale energy market in Chile had the benefit of separating the business of energy producti the business of distributing energy to the public. It was believed that this separation would benefit end users and improve the e energy systems by inducing competition between firms. Despite this tagline, the faults in Chile's wholesale energy market are no all. One of the most glaring fissures is manifesting itself in the ongoing struggle to introduce renewable sources of energy with increasing the cost of electricity to households. Ironically, it was claimed that wholesale energy markets were created to prevent situation from arising. The people in Chile protested in response to this tension, as costs of public transit and electricity, which h widened the already high levels of inequality, were in the works.

In the eyes of energy producers around the world, Chile's Atacama Desert is one of the largest solar energy reserves available to humankind—a value derived from the region's dry climate and extreme insolation. In early 2019, Spain's Solarpack Corp. Tecnol the auction to produce 123 megawatts of solar energy in Chile. The company has already started installing solar panels in the ar now positioned to generate the most cost-efficient electricity in the world. This massive spike in renewable energy production increase the percentage of renewable energy consumed in Chilean households and to make Santiago's subway system one of the world to source most of its power from renewables. To cover the cost of these changes without cutting into profits, the Chilia government intended to increase household electricity prices by 9.2 percent and the cost of Santiago's metro system (already one of the most expensive in Latin America) by 3.75 percent by 2021. These two changes are widely acknowledged as having sparked the protests that resulted in mass protest across the country. The protests were largely successful and in late October the president of Chile, Piñera, signed the Electricity Rates Stabilization Bill to overturn the energy price increases, as well as a bill reversing the metro fare increases, to quell the unrest. The energy price increase was intended to protect the profitability of the wholesale energy marke was subject to price fluctuation after the introduction of newer sources of renewable energy and a stronger peso. That is, in clas neoliberal fashion, the state extracted revenue from the people to help stabilize—even increase—the rate of capital accumulation the transition to renewables.

To its credit, Chile is on a path to have renewables make up 70 percent of its energy by 2050. However, because storage system: renewable energy are still lacking, banks are reluctant to invest. Concerns such as these raise questions for investors about how renewables can compete with fossil fuels on the wholesale stage. Thus, to add more security to wholesale energy trading, Chile increase the cost of consumption. Over the years, the austerity imposed on the subway system in Chile has sparked numerous protests, the government continues to rely on efficiency standards determined by economists while ignoring the needs of the people. The government has continually served middle-class communities in an effort to maintain economic efficiency while forcing lower-income earners to pay private bus systems. Although this has changed somewhat in recent years, as Chile has transitioned to a democracy (in the 1970s, the metro system merged with private buses), the bottom line has continued to emphasize economic efficiency at the expense of the public transit system.

In California, wholesale energy markets came through Assembly Bill 1890 in 1996. Among other things, the bill deregulated energy monopolies across the state to encourage competition, enforced a 10 percent decrease in energy prices, and limited the ability of monopolies to increase rates on customers. Assembly Bill 1890 also required publicly traded utility companies in California, such as Gas and Electric (PG&E), to sell the majority of their generating capacity to independent producers, where it could be traded on the wholesale market.

The problem with deregulated energy markets is that they rely on an assumption of endless cheap energy and historical data or patterns to forecast demand. They are ill-equipped to handle changes in weather patterns produced by climatic shifts.

For decades, California has obtained at least a quarter of its energy from neighboring states despite the assumption of abundant wholesale markets. A significant portion of this imported energy comes from hydroelectric dams in Oregon and Washington. In the Pacific Northwest was hit with a drought that limited the electrical capacity of their hydroelectric dams, which, in addition to the but highly criminal activities of opportunistic companies such as Enron, resulted in PG&E filing for bankruptcy in 2001.

The inability to increase rates on end users coupled with the loss of surplus energy from the Pacific Northwest during a season of energy demand resulted in large revenue losses. To emerge from bankruptcy, PG&E turned to the state, which in turn backtracked previous policies protecting household from the wholesale energy market and forced ratepayers to front the bill. A $2.50 surch
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Energy systems in capitalist markets are predicated on ongoing processes of profit upon expropriation. In general, expropriation forms of social, economic, and political domination unmediated by a wage contract and that function to support the exploitatior To understand this, we can look to how the majority of electricity consumed by individuals, even in wealthy nations, is used to re

originally, fossil fuel-based energy was a form of resource expropriation that supported the exploitation of labor. This form of expropriation expedited the exploitation of workers by increasing the efficiency of both reproductive and productive labor. Elect allowed laborers to produce goods more cheaply and to do it for longer periods of time than could have ever been imagined be fuels were incorporated into the production chain. It also cut down the amount of time needed to perform reproductive labor, r increasing the efficiency of cooking and cleaning. As if that were not enough, electrification provided a new way for energy prod profit from reproductive labor. Namely, the introduction of electricity made reproductive labor more dependent on electronic h appliances. Wholesale energy trading expands on the original model of energy expropriation by turning the individual's basic ne as the demand for energy) into a speculative market.

With all this in mind, it seems pertinent to ask: How long can neoliberalism withstand climate crisis and what are the consequen continually supporting the neoliberal model? Let us start with the latter part of this question by noting three such consequences attempt to combat climate change through the wholesale energy market in Chile threatened to exacerbate preexisting inequalit renewable energy consumption worldwide has fared better at mitigating emissions when it expands inequality. Lastly, it is clea people of Chile have had enough with widening inequality and took to the streets in protest, as have others around the globe, si Yellow Vests in France.

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these energy sources are subject to ecology, not the market. The large fluctuation in energy supply, characteristic of highly inter
sources (for example, renewables), make it difficult to profit from demand. Recall that this was what the wholesale market syste
largely crafted to do. Nevertheless, this is a market problem, not a practical issue. Fossil fuels can easily become a backstop en
for consumption during periods of low renewable supply or moments of peak usage when demand outstrips supply (while this i
some degree now, it still occurs under the wholesale model). However, this would require the transformation of an energy syste
predicated on expropriation into one predicated on appropriation. By appropriation we mean energy production that is free for
alienation embedded in commodities. As a commodity, energy's value derives from unequal exchange, specifically, individuals p
energy than it costs to produce it. This form of unequal exchange is maintained through private ownership of distribution infras
which limits the agency of households by creating an intermediary between the production and appropriation (that is, consump
energy. In this case, the intermediary is the wholesale energy market, which sets prices and determines what type of energy is u
when. To appropriate energy is to use it when it is useful to the individual, unmediated by unequal exchange, embedded in and
ecological cycles and thus free from alienation that derives from market pricing.

If peoples' agency were constrained by ecology and not the market, they could easily choose to perform energy-intensive tasks—
traveling, cooking, cleaning, and charging batteries—during the peak hours of renewable energy supply and reduce their energy
consumption during hours of low renewable supply. Under this model, individuals would respond to changes in weather pattern
reduce their impact on the climate without a market determining costs to generate greater profits.

While giving people the choice to live within the parameters of the earth's ecology seems like a fantasy, this is exactly what PG&E
people to do during fire season in California. The only difference is that PG&E is making this decision for people. And they are do
reduce the likelihood that they will be implicated in and financially responsible for any future fires. Dry weather poses a danger
because it has continually refused to adapt its infrastructure to the changing climate. Even without weather patterns altering du
anthropogenic climate change, dry weather is a possibility—and an inevitability—that should be addressed when building ener
infrastructures. Failing to do so poses a danger to life and the greater social good. In truth, we are rather lucky it has only recen
a problem. Ultimately though, the increasing frequency of dry weather brought about by climate crisis has forced the issue by p
threat to PG&E's profits, and in doing so climate change has brought the financial solvency of the largest private utility firm in th
into question. To protect the future of PG&E, the state of California has created a fund that will insulate the behemoth from the clai
claims of the public. This is the neoliberal model of energy production: externalize costs and internalize surplus. It is a model th
human beings into disposable objects; objects whose energy needs are determined by what is profitable and not what is hospit
ecessary to survival. Subjecting these energy sources to the faulty logic of an expropriative market rather than building system
reflect the ecology is what people protested in Chile and are enduring in California. So, how long can neoliberalism withstand clim
long as we accept ourselves as disposable and firms like PG&E as essential, and not a moment more.

Notes

7. “Chile’s President Inks Bill to Cut Electricity Costs Amid Unrest,” Xinhua, October 26, 2019; Rachelle Krygier, “Chile’s Protesters