

Climate Leviathan

A Political Theory of Our Planetary Future

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Human beings are now carrying out a large scale geophysical experiment of a kind that could not have happened in the past nor be reproduced in the future.

Revelle and Seuss, 1957¹

I

The International Energy Agency opened its 2012 World Energy Outlook with the following warning:

The global energy map is changing, with potentially far-reaching consequences for energy markets and trade. It is being redrawn by the resurgence in oil and gas production in the United States ... By around 2020, the United States is projected to become the largest global oil producer ... The result is a continued fall in US oil imports, to the extent that North America becomes a net oil exporter around 2030 ... [T]he climate goal of limiting warming to 2°C is becoming more difficult ... [A]lmost four-fifths of the CO₂ emissions allowable by 2035 are already locked-in by existing power plants, factories, buildings, etc. If action to reduce CO₂ emissions is not taken before 2017, all the allowable CO₂ emissions would be locked-in by energy infrastructure existing at that time ... No more than one-third of proven reserves of fossil fuels can be consumed prior to 2050 if the world is to achieve the 2°C goal, unless carbon capture and storage (CCS) technology is widely deployed ... Geographically, two-thirds [of proven reserves] are held by North America, the Middle East, China and Russia. These findings underline the importance of CCS as a key option to mitigate CO₂ emissions, but its pace of deployment remains highly uncertain.²

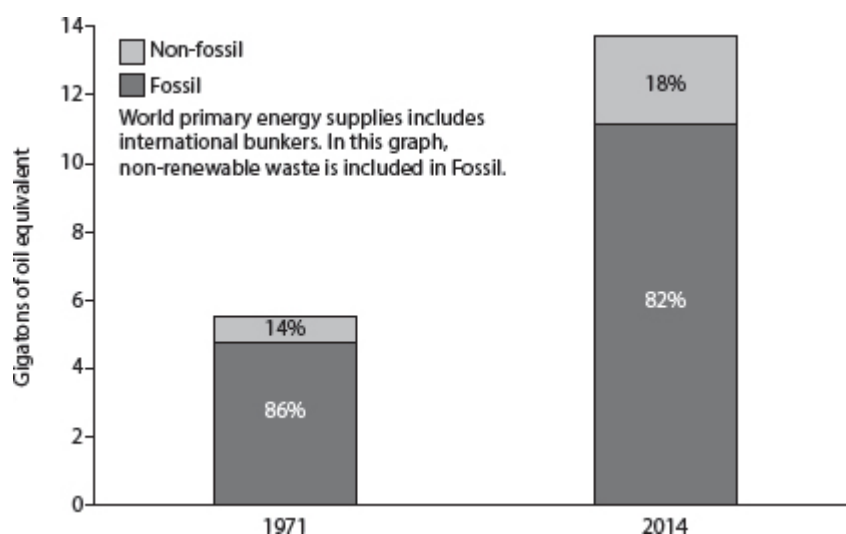
A rapid and massive change in the geographies of energy production and consumption is presently underway. In a bid for energy security and a repatriated stream of profits, some of the world's largest consumers of

energy are turning to “friendlier,” ideally domestic, suppliers. Big oil’s gaze has turned north (to the Arctic), deeper (offshore), and dirtier (tar sands). While the Middle East still holds most of the world’s oil reserves, it accounts for only about a third of current global oil production.³ Meanwhile, hydraulic fracturing (“fracking”) has generated a massive push into “unconventional” hydrocarbon resources. Despite persistent talk of “peak oil,” the world is awash in fossil fuels. For the major energy corporations, demand is a bigger problem than supply.

These centripetal forces are reconfiguring the world’s political geography, and at least two profoundly significant developments can be identified. First, the “winners” of this geopolitical game, already the world’s most powerful states, are likely to become even more dominant through a concentration of political-economic power, military force, and energy resources. The United States and China have developed two of the largest fracking industries, and both have potentially enormous reserves of shale gas. Second, this shift signals the end of any hope for meaningful carbon mitigation. Fracking and related extractive processes are much more carbon-intensive than drilling Saudi oil, and the explosion in unconventional hydrocarbons guarantees increased greenhouse gas emissions.⁴ In addition, the geographic and political-economic distribution of these resources deepens the global division of wealth and power, exacerbating geopolitical inequalities and further destabilizing what little ground international negotiations have cleared for cooperation on climate-related concerns.

The International Energy Agency does not say mitigation is no longer possible, and, to be sure, some sectors, firms, and localities have reduced emissions. “Green energy” has expanded in many places—there are new solar panels in China and Europe, more dams on tropical rivers, and so on. Putting aside the environmental costs of these forms of energy, global demand for electricity has soared (and shows little sign of slowing). There is as yet no green energy boom (see [Figure 2.1](#)).⁵ Yet carbon emissions continue to accelerate.⁶ The International Energy Agency explains:

Figure 2.1. Global energy consumption, fossil and non-fossil fuels, 1971 and 2014



Source: International Energy Agency, “CO₂ Emissions from Fuel Combustion,” 2016, 10.

Despite the growth of non-fossil energy (such as nuclear, hydropower and other renewable sources ... the share of fossil fuels within the world energy supply is relatively unchanged over the past four decades. In 2014, fossil sources accounted for 82% of the global [energy supply].⁷

As we detail below, there has been little substantive progress in international carbon *mitigation*. Without radical change, the world’s atmosphere will not fall below 400 parts per million CO₂ until after the Anthropocene. The International Energy Agency’s emphasis on the desperate need for carbon capture and storage surely means that it recognizes the insurmountable obstacles to CO₂-emissions reductions on the necessary timelines (that is, “before 2017”).⁸

The possibility of rapid, global carbon mitigation as a climate change abatement strategy has passed. The world’s elites, at least, appear to have abandoned it—if they ever took it seriously. In 2010, Mike Davis imagined a “not improbable scenario” in which mitigation “would be tacitly abandoned ... in favour of accelerated investment in selective adaptation for Earth’s first-class passengers.” His prediction may prove prescient.

The goal would be the creation of green and gated oases of permanent affluence on an otherwise stricken planet. Of course, there would still be treaties, carbon credits, famine relief, humanitarian acrobatics, and perhaps the full-scale conversion of some European cities and small countries to

alternative energy. But worldwide adaptation to climate change, which presupposes trillions of dollars of investment in the urban and rural infrastructures of poor and medium income countries, as well as the assisted migration of tens of millions of people from Africa and Asia, would necessarily command a revolution of almost mythic magnitude in the redistribution of income and power.⁹

What does the plausibility of such a terrible future scenario mean for politics today? This question is the focus of what follows. The momentous socio-ecological transformations to which Davis refers—and against which a global climate justice movement might enact a “revolution of almost mythic magnitude”—is best grasped as a dangerous, conjunctural moment of transition in the planet’s natural history. This is in no way to suggest it is beyond politics. On the contrary, in the midst of these changes the urgent questions concern not merely a transformation *in* politics—more representative proceduralism, for example, or more precautionary environmental policy-making—but a transformation *of* the political. To ask by what paths we might undertake political transformations required for something like a just and livable planet is necessarily to ask not only what political tools, strategies, and tactics might achieve a revolution of “mythic magnitude,” but also what conception of the realm of the political might render such tools, strategies, and tactics imaginable. What conceptions of the political legitimate the warming norm, and what alternatives can provide grounds for genuine alternatives?

II

We posit that two conditions will fundamentally shape the coming political-economic order. **The first is whether the prevailing economic formation will continue to be capitalist or not.** While a great deal of diversity can be found within and between capitalist societies, they all are shaped by what Marx called the general formula of capital: M-C-M'.¹⁰ Whether this circuit of capital continues to expand—that is, whether the value-form will continue to shape social life—is a fundamental determinant of the emerging order. The second condition is whether a coherent planetary sovereign will emerge, that is, whether sovereignty will be reconstituted for the purposes of planetary management. What we call Climate Leviathan exists to the extent that some sovereign exists who can invoke the exception, declare an emergency, and decide who may emit carbon and who cannot. This sovereign must be planetary in a

dual sense: capable of acting both at the planetary scale (since climate change is understood as a massive collective action problem) and in the name of planetary management—for the sake of life on Earth. A task of biblical proportions, amounting to an impossible global accounting of everything, like determining “a weight for the wind and apportion[ing] the waters by measure.”¹¹

This pair of dichotomies produces four potential global political responses to climate change, each of which is distinguished by the hegemony of a particular bloc, a mode of appropriation and distribution through which that hegemony is exercised: a capitalist Climate Leviathan; an anticapitalist, state-centered Climate Mao; a reactionary capitalist Behemoth; and an anticapitalist, anti-sovereign Climate X (see [Figure 2.2](#)). The top half of the box reflects capitalist futures. The left column represents scenarios where planetary sovereignty is affirmed and constructed.

Figure 2.2. Four potential social formations

	Planetary sovereignty	Anti-planetary sovereignty
Capitalist	Climate Leviathan	Climate Behemoth
Non-capitalist	Climate Mao	Climate X

Our thesis is that the future of the world will be defined by **Leviathan, Behemoth, Mao, and X** and the conflicts between them. This is not to say that all future politics will be determined by climate alone, but rather that the challenge of climate change is so fundamental to the global order that the complex and manifold reactions to climate change will restructure the world along one of these four paths. To say the least, the continuing hegemony of existing capitalist liberal democracy cannot be safely assumed.

To reiterate, our aim is not to develop a taxonomy of the world's futures, whence to decide where to place our bets. Rather it is to capture the significance of these crucial dimensions of the future in these broad trajectories, in an effort to grasp how the world is moving in the face of a necessary conjuncture which is nothing but a product of contingency (since the course of history is not predetermined). These political futures are “ideal types” in the Weberian sense: not “ideal” in the “best possible” sense, but roughly sketched yet identifiable types produced by the interplay of historical and political economic forces. Our accounts of each potential path for climate politics are not detailed forecasts of the empirical form they might take in any particular geography, but descriptions of the principal features we argue are likely to determine their general dynamics, and the political implications of those dynamics for attempts to construct a world of climate justice.

Among the possible paths we can imagine, Climate Leviathan is presently leading but is neither consolidated nor certain to succeed. Because of its likely dominance in the near term, the possible futures that exist outside Climate Leviathan may largely be seen as responses to it. Behemoth is Leviathan's greatest immediate threat, and, while unlikely to become hegemonic, may well remain disruptive enough to prevent Leviathan from achieving a new hegemonic order. If Leviathan essentially reflects the dream of a sustainable capitalist status quo and Behemoth a conservative reaction to it, Mao and X are competing revolutionary figures in the worldly drama. X is in our view ethically and politically superior, but Mao is more likely to enter the scene from stage left. In the rest of this chapter, we consider each in turn.

III

Climate Leviathan is defined by the dream of a planetary sovereign. It is a regulatory authority armed with democratic legitimacy, binding technical authority on scientific issues, and a panopticon-like capacity to monitor the vital granular elements of our emerging world: fresh water, carbon emissions, climate refugees, and so on. Notwithstanding their failure to reduce global carbon emissions, the annual meetings of the United Nations Conference of the Parties (COP) to advance the United Nations Framework Convention on Climate Change (UNFCCC) represent the first institutional manifestation of this dream of planetary regulation, a process that the dominant capitalist nation-states will consolidate as climate-induced disruptions of accumulation and political

that party to the agreement. Rather it is the result of the fundamentally contradictory character of political-economic responses to climate change in liberal, capitalist societies, which produces an inadequacy the agreement (amazingly) acknowledges:

[The Conference of the Parties] notes with concern that the estimated aggregate greenhouse gas emission levels in 2025 and 2030 resulting from the intended nationally determined contributions do not fall within least-cost 2°C scenarios but rather lead to a projected level of 55 gigatonnes in 2030, and also notes that much greater emission reduction efforts will be required than those associated with the intended nationally determined contributions in order to hold the increase in the global average temperature to below 2°C above pre-industrial levels ...³⁴

The Paris Agreement admits its own failures.

So, it would be more accurate to say (as Hegel might have) that the Paris Agreement is an entirely “rational” manifestation of the world’s reason—a world and reason wrought by deep contradictions. The world’s elites recognize these contradictions and—although they are by no means agreed on what to do—are trying to address them within limiting conditions, conditions that cause them to “fail.” The principle failure is that the Paris Agreement does not keep fossil fuels in the ground, but this does not mean it will not set the foundation for adaptation on a burning planet. On the contrary, the so-called “failures” of Paris are enabling, and part of, a crucial adaptation, the adaptation of the political. Notwithstanding inadequacies on the carbon question, the Paris Agreement constitutes an important step toward the emergence of planetary sovereignty—the left half of [Figure 2.2](#). This sovereignty, as we said, could take two distinct forms, depending on whether the emerging sovereign acts to defend or overthrow capitalism. Let us consider the latter.

IV

Of the two incarnations of Climate Leviathan, one lies at the end of the red thread running from Robespierre to Lenin to Mao. Climate Mao is marked by the emergence of a noncapitalist authority along Maoist lines. If capitalist Climate Leviathan stands ready to embrace carbon governance in an evolving Euro-American liberal hegemony, Climate Mao expresses the necessity of a just terror in the interests of the future of the collective, which is to say that it represents the necessity of a

planetary sovereign but wields this power *against* capital. The state of exception determines who may and may not emit carbon—at the expense of unjust wastefulness, unnecessary emissions, and conspicuous consumption.

Relative to the institutional means currently available to capitalist liberal democracy and its sorry attempts at “consensus,” this trajectory has some distinct advantages with respect to atmospheric carbon concentration, notably in terms of the capacity to coordinate massive political-economic reconfiguration quickly and comprehensively. In light of our earlier question—how can we possibly realize the necessary emissions reductions?—it is this feature of Climate Mao that most recommends it. As the climate justice movement struggles to be heard, most campaigns in the global North are premised on an unspoken faith in a lop-sided, elite-biased, liberal proceduralism doomed to failure given the scale and scope of the changes required. If climate science is even half-right in its forecasts, the liberal model of democracy is at best too slow, at worst a devastating distraction. Climate Mao reflects the demand for rapid, revolutionary, state-led transformation today.

Indeed, calls for variations on just such a regime abound on the Left. Mike Davis and Giovanni Arrighi have more or less sided with Climate Mao, sketching it as an alternative to capitalist Climate Leviathan.³⁵ We might even interpret the renewal of enthusiasm for Maoist theory (including Alain Badiou’s version) as part of the prevailing crisis of ecological-political imagination.³⁶ Minqi Li’s is arguably the best developed of this line of thought, and like Arrighi he locates the fulcrum of global climate history in China, arguing that Climate Mao offers the only way forward:

[U]nless China takes serious and meaningful actions to fulfill its obligation of emissions reduction, there is little hope that global climate stabilization can be achieved. However, it is very unlikely that the [present] Chinese government will voluntarily take the necessary actions to reduce emissions. The sharp fall of economic growth that would be required is something that the Chinese government will not accept and cannot afford politically. Does this mean that humanity is doomed? That depends on the political struggle within China and in the world as a whole.³⁷

Taking inspiration from Mao, Li says a new revolution in the Chinese revolution—a re-energization of the Maoist political tradition—could transform China and save humanity from doom. He does not claim this is

likely; one need only consider China's massive highway expansions, accelerated automobile consumption, and subsidized urban sprawl.³⁸ But he is right that if an anticapitalist, planetary sovereign is to emerge that could change the world's climate trajectory, it is most likely to emerge in China.

Even today, when an increasingly non-Maoist Chinese state invokes its full regulatory authority, it can achieve political feats unimaginable in liberal democracy. Perhaps the most notable instance of state-coordinated climate authority is the manner in which Beijing's air quality was re-engineered during the 2008 Olympics—flowers potted all over the city, traffic barred, trees planted in the desert, and factories and power plants closed—all to successfully blue the skies for the Games.³⁹ Another effect of this power is the way in which the Chinese state effectively killed General Motors's gas-guzzling Hummer in early 2010, when it blocked the division's sale to Sichuan Tenzhong Heavy Industrial Machinery due to the vehicle's emissions levels.⁴⁰ One might also point to the "Great Green Wall" against desertification, which, if successfully completed, will cross 4,480 kilometers of northern China, and various tree-planting programs that will purportedly give the country 42 percent forest cover by 2050.⁴¹ And since vowing in the summer of 2010 to apply an "iron hand" to the task of reducing emissions, the Communist Party closed more than 2,000 steel mills and other carbon-emitting factories by March 2011.⁴² In mid-2016, the government announced new dietary guidelines, encouraging people to consume no more than 75 grams of meat per day.⁴³ Reducing meat consumption was justified on health and environmental grounds and hailed by climate activists. Such policies foretell the possibility of a Climate Mao, were **China to become a global hegemon** and also change under revolutionary pressures. To be clear, that is a very big "if." Though Chairman Mao's face looms over Tiananmen Square and decorates every *yuan* note, China is emphatically not on the path toward Climate Mao. The Communist Party of China appears committed, at least today, to building a capitalist Climate Leviathan.⁴⁴ The centrality of China to the Paris Agreement only proves the point.

Still, we must speak of Climate Mao, not Climate Robespierre or Lenin, for both theoretical and geographical reasons. Mao was a Leninist who insisted on combining a faith in the masses with a vanguard party. Yet his great theoretical contributions to the Marxist tradition were to analyze the distinct class fractions within the Chinese peasantries and to

argue for recentring revolutionary practice around the poor and (some of the) middle peasants, together with the urban proletariat (a relatively marginal class in 1930s China). Mao emphatically denied that only a fully proletarianized class could serve as the basis of a revolution, and argued that even “poor peasants” and the “semi-proletariat” could achieve revolutionary class consciousness in Marx’s sense.⁴⁵ In an era with large and growing social groups that, to put it mildly, do not fit neatly into the bourgeois-proletariat distinction, Mao’s general insight is crucial to reconsider.

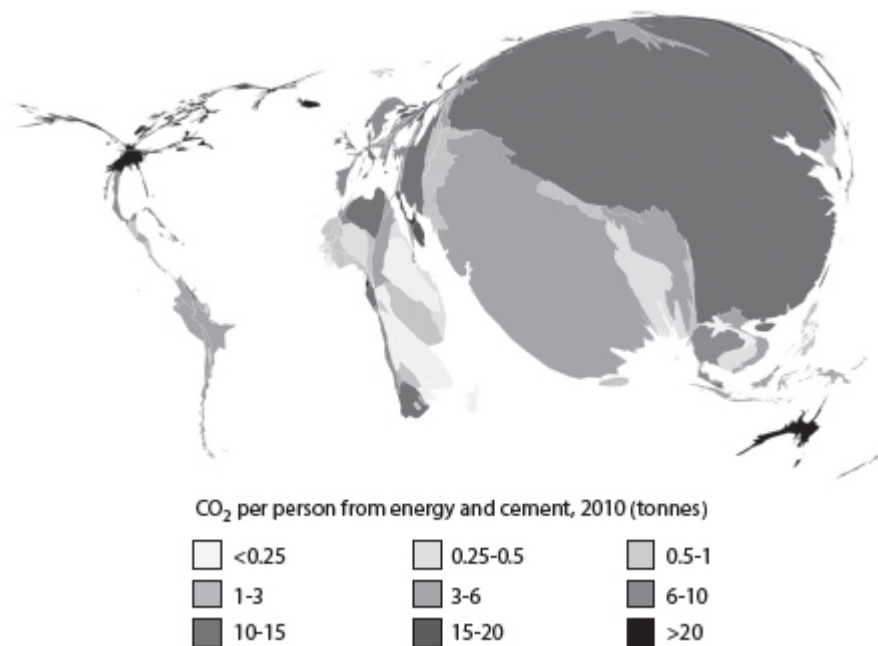
Climate Mao is, in the near future, a specifically Asian path, a global path which can only be cut from Asia. In contrast to sub-Saharan Africa or Latin America, only in Asia—and only with some revolutionary leadership from China—do we find the combination of factors that make Climate Mao realizable: massive and marginalized peasantries and proletariats, historical experience and revolutionary ideology, and powerful states governing large economies. The key comparison here is with Evo Morales of Bolivia, once the most powerful voice on the Left in the UNFCCC/COP, who facilitated the Cochabamba accord (initially written in counterpoint to the Copenhagen framework). While the view from Cochabamba is definitely and admirably radical—it calls for a 50 percent reduction in greenhouse gas emissions by 2017 while rejecting carbon credits and “the consumption patterns of developed countries”—it is difficult to see how it could translate into global transformation.⁴⁶ By contrast, Climate Mao is not impossible in Asia because of the confrontation between millions of increasingly climate-stressed poor people and the political structures that abet those very stresses, not to mention the living legacies of Maoism. In the imminent confrontation of Asia’s historical-geographical conditions with catastrophic climate change, too many people have too much to lose, too quickly—a formula for revolution. Mao writes: “Qualitatively different contradictions can only be resolved by qualitatively different methods ... [T]he contradiction between society and nature is resolved by the method of developing the productive forces.”⁴⁷ The logic of Climate Mao is that only revolutionary state power rooted in militant, popular mobilization would be sufficient to transform the world’s productive forces and thus resolve our planetary “contradiction between society and nature.”

We are not suggesting that Climate Mao will emerge through an ecological awakening on the part of Indian or Chinese peasants. Asian peasants (and recently urbanized former peasants) will respond not to carbon emissions *per se* but to state failures to act in response to material

crises (shortages of water, food, shelter, and so on) and elite expropriations certain to come in the face of climate-induced instabilities. However, presently China's state is building the path toward Climate Leviathan. **How we get from here to Climate Mao would depend principally on the Chinese proletariat and peasantry.** As is commonly noted, China's emissions are growing daily, and the economic growth with which those emissions are associated is the basis of much of the legitimacy enjoyed by the Chinese state and ruling elites.⁴⁸ If the Chinese working class responds to massive climate-change-induced disruptions in growth, the possibilities for an energetic Climate Mao are substantial. Moreover, the preconditions for the rise of Climate Mao are extant and in some cases thriving: outside the Maoist tradition in China itself, the Maoist Naxalites of India's "red corridor" are actively engaged in armed conflict with India's coal mafia; Maoists effectively now hold power in Nepal; and North Korea, although not exactly Maoist, is not going away.⁴⁹ Certainly the collective embrace of the West's vision of capitalist Leviathan on the part of Asia's peasant and proletariat classes seems unlikely.⁵⁰ Rather, the opposite is more plausible: the rapid rise of more authoritarian state socialisms, regimes that use their power to decisively reduce global carbon emissions and maintain control during climate-induced "emergencies."

What, if anything, makes Climate Mao a plausible basis for global transformation? [Figure 2.3](#) makes two points uncomfortably clear. First, most rich countries (the United States, Canada, Western Europe and some oil-producing states) are home to very few people who are directly at risk of the negative effects of climate change. Second, there is an extraordinary geographical unevenness to the world's at-risk population. They live mainly in South and East Asia, between Pakistan and North Korea, a belt of potentially revolutionary change. Asia is not only home to the majority of humanity, but also the center of capital's economic geography: the world's hub of commodity production and consumption (and carbon emissions). We might expect, therefore, climate-induced social turbulence to combine in a region with an enormous, growing capacity to reshape the consumption and distribution of all the world's resources. Consequently, it is a more interesting thought experiment to ask how radical social movements in Asia could challenge Leviathan than to imagine a would-be Climate Mao emerging in, say, Lagos or La Paz.

Figure 2.3. CO₂ emissions per capita, 2010, projected on a cartogram distorted to show the number of people exposed to droughts, floods and extreme temperatures, 2000 – 2009 (using 2010 population data)



Sources: Map by Kiln, see: carbonmap.org. Data source for CO₂ emissions: G. Peters, G. Marland, C. Le Quéré, T. Boden, J. Canadell, and M/Raupach, “Rapid growth in CO₂ emissions after the 2008-2009 global financial crisis”, *Nature Climate Change* 2, 2012, 2-4. Data for people at risk: the OFDA/CRED International Disaster Database, a project of the Université Catholique de Louvain and the World Bank, available at EMDAT.be.

V

While Climate Mao looms over Asia, the specter haunting the world’s core capitalist states today is that of reactionary conservatism. That reaction takes one of its most important forms as a mode of Climate Behemoth, represented by the upper right of [Figure 2.1](#). Behemoth opposes Leviathan’s drive for planetary sovereignty, which is itself not a bad thing in our view. When Schmitt remarked that “state and revolution, leviathan and behemoth” are always potentially present, he cast Behemoth in the revolutionary role. So he should, given its function as the figure of the masses in Hobbes’s work (behemoth is the plural of the Aramaic *behema*, ordinary cattle or beast).⁵¹ But while it symbolizes the masses which might stand against Leviathan, revolution is no straightforward historical mechanism. Napoleon is as much a product of the French Revolution as the *sans-culottes*.

Behemoth provides at least two possible, mass-based responses to Leviathan: reactionary populism and revolutionary anti-state democracy.

In its reactionary form—where populism rallies to capital (as represented by the upper-right corner)—Climate Behemoth stands in its most stark Schmittian opposition to Climate Leviathan’s planetary sovereignty. It is not hard to find evidence of this reactionary tendency today, epitomized in the continued influence of climate change denial in mainstream political discourse, especially in the United States. The millenarian variety of this formation embraces an ideological structure that renders it impervious to reason. Indeed, that is the point. The disproportionate influence of this proudly unreasonable minority, agitated by the ill-gotten riches of a handful, will persist, at least for a while.

What is the class basis for climate Behemoth? Certainly, its leadership (and funding) come from the fraction of the capitalist class with ties to fossil fuels. This fraction plays an outsized role in shaping ideology, but it is far too small, numerically speaking, to consistently win elections in formally democratic societies. The elite backers of climate denialism need allies among subaltern social groups. In the capitalist core—particularly where the fossil energy sector is large (the United States, Canada, Australia)—they have found their most willing allies among those segments of the proletariat that perceive climate change not only as a threat to their jobs and cheap energy, but also as a sophisticated means to empower elite experts and hinder the exercise of national(ist) sovereignty. Nevertheless, the variation in class composition within capitalist societies makes generalizations across nation-states challenging, to say nothing of the global scale. Trump voters in Ohio or Michigan, for example, are a mixed lot and differ in important respects from their counterparts in Texas; similar variation exists among supporters of Prime Minister Narendra Modi of India, or Brexit proponents, and so on.

Some broad trends are identifiable, however. Right-wing movements have grown steadily since the 2000s, mobilized around ethno-religious-nationalist (and often hyper-masculinist) ideologies, leading to momentous political victories for authoritarian, neoliberal leadership. From India to Brazil, Turkey to Egypt, Russia to England and the United States, the successful transmission of “populist” energies has pulled capitalist states to the right. While the signature issue for many of these movements is immigration and “security” for privileged racial and/or religious groups, in most cases the political shift has been accompanied (as in post-Brexit England) or enabled (in the United States under Trump) by a rejection of international collaboration to address climate change. There may be no social basis for a transnational alliance among

these political forces for Climate Behemoth, but simply by virtue of their support for distinct brands of authoritarian, nationalist, right-wing populism, they contribute in parallel to a global political movement that obstructs the realization of Climate Leviathan. In this sense, the variegation of social classes supporting Behemoth is one of its strengths. The Trump and the Modi voter may come from different social groups and classes, and they may be mobilized around particular forms of racial, national and gendered prejudice. But what they oppose almost unanimously is the legitimacy of a distinctly international political sphere, especially if it has the capacity to discipline (national) capital.

Ultimately, though, Behemoth's constant failure to offer a coherent alternative to liberal capitalism's crises—witness the political calamities under Donald Trump and British prime minister Theresa May—will limit the medium and long-term political force of Climate Behemoth, as it has hobbled all Behemoths throughout history. Today's Behemoth substitutes free-market, nationalist, and evangelical rhetoric for explanation. It is truly reactionary. Even in its milder manifestation, where the fact of climate change is acknowledged but posited as beyond our control because of human or nonhuman nature, reaction dominates the chorus of ridicule aimed at “alarmists” calling for political-economic reorganization to address environmental change. These “rational” Behemoths, though less self-obsessed and misanthropic than their millenarian associates who affirm that if the world is coming to an end it must be God's will, condemn the regulatory hubris of climate science no less vigorously. To put it in our terms, Behemoth hates Mao for its faith in secular revolution, Leviathan for its liberal pretension to rational world government, and both for their willingness to sacrifice “liberty” for lower carbon emissions.

Yet there is a key division within the fear behind this hatred. On one side we find many on the right raging against Leviathan's anticipated assault on the nation-state. For them, it is nationalism, misogyny and racism that lead them to reject any idea of a legitimate transnational (let alone planetary) order. Even though nationalist climate denialism like that of the Republican Party is often couched in the terms of so-called free markets and the use of the climate change “hoax” as a cover for illegitimate state “meddling,” the logic of the position is in no way founded in classical liberal arguments regarding efficient resource allocation in *laissez-faire* conditions. Instead, the concept “free market” is code in libertarian grandstanding for individual freedom. But many other powerful actors who oppose Leviathan—including massive

segments of the natural resource sector—would welcome transnational cooperation in other spheres, like defense. They dismiss the threat of climate change and international regulation in the name of an unfettered capitalist market.⁵² This means Climate Behemoth is founded on two not necessarily commensurable principles. In the United States, the signature affiliations of the reactionary right—market fetishism, cheap energy, white nationalism, firearms, evangelical faith—buttress reactionary Behemoth. The result is an opportunistic, but contradictor and unstable, blend of fundamentalisms: the security of the homeland, the freedom of the market, and the justice of God.

How long that combination will hold sway over the administrative power of the state in the United States remains to be seen. Certainly the climate crisis is one among many reasons for the turmoil in the Republican Party exposed by Trump's election. To the extent that US hegemony will continue to require affordable fossil fuels, the emergence of Leviathan poses threat enough to energize Behemoth and thus to check Leviathan's planetary potential—for now. But barring an act of coordinated political imagination of which it seems incapable, this situation is unlikely to last. Indeed, notwithstanding the Trump presidency, the United States could yet become the heart of Leviathan.

VI

Part of what Hobbes and Schmitt feared was that “the quintessential nature of the state of nature, or the behemoth, is none other than civil war, which can only be prevented by the overarching might of the state, or leviathan.”⁵³ Yet this is not what we face today in the formations we are calling Climate Behemoth. Instead, we confront something closer to a revolutionary people that, *in extremis*, can realize itself one of two ways. The first is the nightmare outcome of reactionary Behemoth like that described above, the terrifying potential realized in the Nazi state described by Franz Neumann as early as 1942 in his *Behemoth: The Structure and Function of National Socialism*.⁵⁴ The second Behemoth is also prefigured by Hobbes, somewhat disdainfully, in the “democratical gentlemen” of Parliament with “horrible designs” of “changing the government from monarchical to popular, which they called liberty”—and, says Hobbes, “no tyrant was ever so cruel as a popular assembly.”⁵⁵ Hobbes's cynicism regarding these “gentlemen” might well have been justified, as is our own, confronted with their current avatars in the Euro-

weapons capable of rendering the planet uninhabitable created a situation in which humanity faced a clear binary choice: to either overcome the interstate system's anarchic tendency toward conflict (thus realizing Kant's dream of a peaceful republic), or to destroy itself.³¹ Renewing Kant's proposal in the context of looming catastrophe, Einstein argued:

A world government must be created which is able to solve conflicts between nations by juridical decision. This government must be based on a clear-cut constitution which is approved by the governments and nations and which gives it the sole disposition of offensive weapons.³²

Days after the United States bombed Hiroshima in August 1945, Bertrand Russell wrote:

It is impossible to imagine a more dramatic and horrifying combination of scientific triumph with political and moral failure than has been shown to the world in the destruction of Hiroshima ... The prospect for the human race is sombre beyond all precedent. Mankind are faced with a clear-cut alternative: either we shall all perish, or we shall have to acquire some slight degree of common sense ... Either war or civilization must end, and if it is to be war that ends, there must be an international authority with the sole power to make the new bombs. All supplies of uranium must be placed under the control of the international authority, which shall have the right to safeguard the ore by armed forces. As soon as such an authority has been created, all existing atomic bombs, and all plants for their manufacture, must be handed over. And of course the international authority must have sufficient armed forces to protect whatever has been handed over to it. If this system were once established, the international authority would be irresistible, and wars would cease.³³

This "nuclear one-worldism," was attractive to many on the Left after World War II.³⁴ Whatever its philosophical merits, it was defeated by history—another victim of the Cold War. To his credit, Russell predicted this in 1945. "But I fear all this is Utopian. The United States will not consent to any pooling of armaments, and no more will Soviet Russia. Each will insist on retaining the means of exterminating the other."³⁵

Most political philosophers did not follow the Einstein-Russell line of thought. In the shadow of the world-historical division between the United States and the Soviet Union, for many, the unity between sovereigns seemed not only impossible but terrifying. As Hannah Arendt put it, the purpose of the "World Government" that so many dreamed

would save the planet from nuclear annihilation “is to overcome and eliminate authentic politics, that is, different peoples getting along with each other in the full force of their power.”³⁶ Throughout her life, Arendt associated the aspiration to a world state with totalitarianism, for which all opposition, anywhere, is treason.³⁷ This connection could not even be severed by a well-intended “supernational authority,” which would “either be ineffective or be monopolized by the nation that happens to be the strongest, and so would lead to world government, which could easily become the most frightful tyranny conceivable.”³⁸

It might seem from this assessment of our political prospects that Arendt is reprising the “realist” critique of Kant. Unlike individuals who have their own dignity and yet may unite through a collective will, multiple states never form a general will. With respect to one another, they always remain in a state of nature. Their fundamental bond is effectively negative—as she said, “a guaranteed peace on earth is as utopian as the squaring of the circle.” However—and this is a crucial “however”—this is only true “so long as national independence, namely freedom from foreign rule, and the sovereignty of the state, namely, the claim to unchecked and unlimited power in foreign affairs, are identified.”³⁹

Arendt’s argument is by no means a firm endorsement of Kant’s perpetual peace, but neither is it a resigned realism. The existential crisis of “mutually assured destruction” shaped her thinking no less than Russell’s, but the conclusion she drew was more “conceptual” (if in the most “applied” manner possible). In a world in which war “among the great powers has become impossible owing to the monstrous development of the means of violence,” we have outgrown “the state concept and its sovereignty,” which together ensure “between sovereign states there can be no last resort except war.”⁴⁰ Like Kant, she sees “federation” as the only institutional solution, but an explicitly “*international* authority.”⁴¹ That authority would be interstate, but founded on a “new state concept”—in other words, an adaptation of the political—in which “the federated units mutually check and control their powers.”⁴²

Is it possible to imagine transcending this proposal—toward a nontotalitarian world state of collective recognition? After many years on the sometimes cranky margins of political debate, the debate on world government is back on the agenda—partly because of the end of the Cold War, and partly because of a growing recognition of global ecological

crisis. Alex Wendt has been central to this revival, and his “Why a World State is Inevitable” proposes a teleological argument that world government is not only coming, but is inevitable.

His claim is based in the logic of weapons development. States naturally compete with one another because they must defend themselves (their citizens). This leads them to seek “defense,” that is, weaponry sufficient to compel other states to recognize them. Since the development of weapons technology is temporally and spatially uneven, different states will have different capacities for “defense,” which generates a persistent anxiety regarding one’s capacity to ensure recognition. For international relations realists, this leads to a cul-de-sac in world affairs, where the omega point of interstate relations is a perpetual anarchy of mutual suspicion, competitive preparations for “defense” (war) and, at best, stability through hegemony. But, in a manner that recalls earlier contributions to the debate, Wendt argues that the development of ever-more-dreadful weaponry fatally undermines this argument. Interstate defensive competition has led to a situation in which the destruction of states (perhaps all of them) is likely. There are just too many weapons of mass destruction. The end-state or *telos* to which the world state system tends must shift, “the struggle for recognition between states” leads to a new phase: “collective identity formation and eventually a [world] state.”⁴³

Wendt’s theory builds explicitly on Kant’s and Hegel’s thoughts on the political order that emerged out of the French Revolution. He accepts both Kant’s pessimistic assessment of humans’ “unsocial sociability” and Hegel’s diagnosis of the dynamic and ongoing struggle for recognition. For Wendt, “the struggle of individuals and groups for recognition of their subjectivity ... is channeled toward a world state by the logic of anarchy, which generates a tendency for military technology and war to become increasingly destructive.”⁴⁴ The difficult question—which many might legitimately believe unanswerable—is toward which ends is the interstate system driven by these dynamics?

Three end-states suggest themselves—[1] a pacific federation of republican states, [2] a realist world of nation-states in which war remains legitimate, and [3] a world state. The first is associated with Kant and the second with Hegel, both of whom based their projections on explicitly teleological arguments. In rejecting the possibility of a world state, therefore, they agreed that, strictly speaking, anarchy would remain the organizing principle of the system, albeit different kinds of anarchy. As to the mechanism of progress, in

different ways Kant and Hegel also both emphasized the role of conflict—Kant in man’s “unsociable sociability,” and Hegel in the “struggle for recognition” ... While envisioning a tendency for conflict to create republican states, Kant did not expect them to develop a collective identity. His states remain egoists who retain their sovereignty. Hegel provides the basis for a different conclusion, since the effect of the struggle for recognition is precisely to transform egoistic identity into collective identity, and eventually a state. But Hegel expects this outcome only in the struggle between individuals. States too seek recognition, but in his view they remain self-sufficient totalities. Their struggle for recognition does not produce supranational solidarity, leaving us at the “end of history” with a world of multiple states ...⁴⁵

From this combination of Kantian and Hegelian premises (recast along teleological lines), Wendt finds a basis for the emergence of a world state. There are two crucial conditions for this pathway. First, states’ struggles for recognition must lead to a type of collective identity. There must be some emergent principle that unites the most powerful states (the rest will follow), undoing the conditions in which, as Hegel put it, “the relations of states to one another has sovereignty as its principle.”⁴⁶ Second, there must be some means for the world state to be realized, not only in principle but concretely; in other words, the world state would need to meet the criteria of a state. If these two conditions hold, Wendt argues that “the struggle for recognition between states will have the same outcome as that between individuals, collective identity formation and eventually a state.”

One reason for this concerns ... the role of technology. Kant rejected the possibility of a world state in part because the technology of his day precluded it, and in positing an end-state in which war remained legitimate Hegel did not think its costs would become intolerable. Neither anticipated the dramatic technological changes of the past century, which are in part caused by the security dilemma and thus endogenous to anarchy. As Daniel Deudney convincingly argues, these changes have greatly increased the costs of war and also the scale on which it is possible to organize a state.⁴⁷

The basic logic of Wendt’s “inevitable” world state is the same as Russell’s and Einstein’s in the 1940s, although the weapons have become much more powerful, accurate, and mobile (which only makes the Einstein-Russell arguments more sensible).⁴⁸ In effect, the Cold War suspended the world-state debate: its end, while sometimes celebrated as

the “end of history,” has also brought another conclusion: the return of the prospect of world government.

Wendt says the struggle for recognition among states, combined with changes in technology, will drive the system toward a world state. In other words, he shares Arendt’s conclusion that war is no longer a viable “last resort”. Arendt, however, seemed to have little faith in the power of looming obliteration to compel the adaptation of the political that might enable the world to attain peace. Moreover, she associated pretensions to world government with the “most frightful tyranny.” Wendt is much more “optimistic,” both insofar as he expects that reaching the threshold of assured destruction will force the world to adapt, and in his faith that nontotalitarian world government is not an oxymoron.

This “optimistic” analysis raises some difficult questions that Wendt leaves unanswered. First, if technological development drives this change, which technologies and why? Wendt only mentions weapons of mass destruction, but more than sixty years after Hiroshima and Nagasaki, we are not much closer to a world state than we were at the end of World War II.⁴⁹ Second, if the world state will come about through “collective identity formation”, what will provide the ideological basis of the collective? (Clearly, nationalism will not do.) Third, how is the emergence of a world state affected by the specifically capitalist character of most of the world’s actually existing nation-states (and almost all of the most powerful)? Wendt brackets the question of capitalism, except to say that the logic of capital will only further contribute to the emergence of a world state, without explaining how.

Here, we can only attempt to elaborate Wendt’s ideas by tackling the first question. But for the sake of clarity, let us briefly consider the others (which merit much fuller discussion). The ideological basis of collective identity in a (nontotalitarian) world state might seem like a magic elixir. If we knew what that could be, we would be one big step closer to “universal citizenship.” We noted earlier that one possible ideological form through which the struggle for recognition among states could be resolved is as “stewards” of life on Earth. Suppose that elites mainly from two leading capitalist states, the United States and China, are capable of reconfiguring the political so that sovereignty is organized and legitimated on a planetary basis. Those elites may well present their interests as if they were representative of the general interests of the whole planet. Even if, at the level of the state system, this represents a fundamentally elite program, they might be granted substantial legitimacy in a context of perceived planetary emergency.⁵⁰ This very

feature of any likely movement toward a world state also provides some hint at the role of capital—which is almost certain to be fundamental to any elite project. Consequently, as far as the role of capital is concerned, we agree with Wendt that the logic of capital may drive a world state, since maintaining the basis for the circulation and accumulation of capital—not to mention the reproduction of labor power—will require solutions to “collective action problems” that capital can only achieve on a planetary basis (see [Chapter 5](#)). Giovanni Arrighi argues, in fact, that in the history of capitalism the movement of capital’s contradictions has always driven toward larger political and geographical scales of resolution/governance, and arguably, after the United States’ *belle époque*, there is only one greater scale possible: the planetary.⁵¹ Moreover, this is likely to put capital at the heart of any claim to Climate Leviathan’s legitimacy, because barring revolutionary ideological transformations of which Wendt gives no hint, if the elite project to save the planet is to succeed it is going to require a legitimacy that, at least right now, only capitalism can give it. Still, all of this could change quite quickly.

Acknowledging how much more could be said, let us return to the question of technology as it intersects with sovereignty and collective identity formation. Wendt emphasizes the “logic of anarchy” that compels states to continually seek recognition from one another. All states thus contribute to a massive collective action problem, as each refines their military capability to destroy the others, perpetuating the need for ever greater investment in “defense.” Others writing on the same problem affirm both the importance Wendt places on military technology and the “logic” of world government as a response to what Arendt called “the monstrous development of the means of violence.” But “logical” does not mean “inevitable.”⁵² For Wendt’s colleagues Bud Duvall and Jonathan Havercroft, for example, the emergence of world government hinges on details that Wendt overlooks, perhaps because he is so beholden to the long tradition of nuclear one-worldism. What if technology—in this case, military technology, specifically—influences both what sovereignty is understood to involve, and the collective identity in whose name it is exercised?

According to Duvall and Havercroft, one particular field of military technology—space weaponry—is crucial, and likely to have decisive effects. They tell us that “shifts in military technology (along with other processes) generate changes in the forms of political societies” and in “the nature of relationships among them.” Their object of analysis is the

“constitutive effects that emerging space-weapons technologies will likely have on the ontology ... of the political societies that compose the international system, which ... is to say on sovereignty.”⁵³ These claims might seem to validate all those years world-state talk spent on the cranky margins of political theory. What kind of space weapons are we talking about?

On the near horizon lie three potential military uses of orbital space. The first, which has been a US pursuit since at least the 1980s [and which is already available, if imperfect] is intercepting missile attacks—a space-based missile-defense shield. Second, there is serious discussion of developing “space control,” which the US Department of Defense defines as “the exploitation of space and the denial of the use of space to adversaries [particularly China]. A third is force application from space: weapons of varying types ... placed in orbit, with the ability to attack objects either flying in the Earth’s atmosphere or on or near the Earth’s surface.”⁵⁴

Duvall and Havercroft suggest that only the United States is in a position to “develop an effective space weapons project,” but it is not clear why.⁵⁵ Bracketing this claim, however, their analysis is compelling:

Space control represents the extension of US sovereignty into orbital space. Its implementation would ... reinscribe the “hard shell” border of the US, now extended to include the “territory” of orbital space. US sovereignty is projected out of this world and into orbit. Under Article II of the 1967 *Outer Space Treaty*, “Outer Space, including the moon and other celestial bodies, is not subject to national appropriation by claim of sovereignty, by means of use or occupation, or by any other means.” The US project of space control would entail a clear violation of this article. In addition to expanding the scope of US sovereignty.⁵⁶

These processes will entail a very specific kind of development or adaptation in the “forms of political society,” because this violation of international law would

produce a distinctly capitalist sovereignty. In Volume One of *Capital*, Marx chided classical political economists for their inability to explain how workers became separated from the means of production. Whereas political economists such as Adam Smith argued that a previous accumulation of capital was necessary for a division of labour, Marx argued that this doctrine was absurd. Division of labour existed in pre-capitalist societies where workers were not alienated from their labour. Instead, Marx argued that the

actual historical process of primitive accumulation of capital was carried out through colonial relations of appropriation by force. While not a perfect analogy, because of the lack of material labour, the value of which is to be forcibly appropriated in orbital space, space control is like such primitive accumulation in constituting a global capitalist order through the colonisation of space as previously common property [effectively remaking it into a new] form of “real estate.” By controlling access to orbital space the US would be forcibly appropriating the orbits, in effect turning them into primitively accumulated private property. In this way, the US becomes even more than it is now the sovereign state for global capitalism, *the global capitalist state*.⁵⁷

In other words, Duvall and Havercroft anticipate that in the coming decades, the United States is likely to pursue and achieve a global monopoly on space weapons, which will trump Earth-bound military force. This could include a “missile shield” coupled with offensive space-based weapons, nuclear weapons, and air and sea dominance. For the first time, they suggest, one state would meet the Weberian criteria for statehood—“that institution which claims the *monopoly of the legitimate use of force* [Gewalt] within a given territory”—in a situation in which the “given territory” is the entire planet.⁵⁸ A new era of US-centered imperialism will arrive, with the United States at “the centre of a global extensive ... empire, a sovereign of the globe.”⁵⁹

On what grounds could space weaponry contribute to Climate Leviathan? It sounds like conspiracy theory, but the fact is that something very like space weapons will be mobilized to defend life on Earth: atmospheric geoengineering. With the growing awareness that the mitigation window has closed, we hear more of plans to “geoengineer” our way to safety through massive technosocial mitigation-by-atmospheric-manipulation.⁶⁰ Consider, for example, sulfate aerosol injection, sometimes known as solar radiation management (SRM), to artificially increase atmospheric albedo.⁶¹ One recent essay advocating SRM characterizes it as “albedo modification—a kind of geoengineering intended to cool the planet by increasing the reflectivity of the earth’s atmosphere.” The mechanism is straightforward. Injected synthetic aerosols will “reflect sunlight into the stratosphere;” like “wearing a white shirt in the summer.”⁶²

The big difference, of course, is that if you wear a white shirt in the summer, you are the one to decide what to wear. Who decides to inject synthetic aerosols into the stratosphere, and how much?⁶³ Geoengineering projects like SRM are qualitatively different than

projects to create resilient infrastructures or to produce drought-resistant seed stock. Large-scale carbon capture and storage belongs in the same discussion, since depositing gigatons of carbon in the Earth's crust for thousands of years will involve considerable geological engineering. But SRM is arguably the most plausible and significant form of geoengineering on the way, and it has enormous consequences for the adaptation of the political. Any attempt to modify the world's albedo will require decisions over the fate of the Earth's climate and energy, nothing less than life and death; every large-scale geoengineering project will involve a relatively small group of actors experimenting with global systems in the most improbable of missions: to materially reconfigure planet Earth so as to avoid having to rework human political economies. The greatest problem with SRM, so-called "governance," is really the problem of sovereignty, because the fundamental question is not "How shall we design appropriate institutions to govern geoengineering?" but rather "Who can declare the emergency?"⁶⁴

Sulfate aerosol injection ... would involve injecting sulfate aerosols into the stratosphere where they would scatter sunlight back into space. Even if this approach were successful in reducing mean surface temperature, it would likely produce substantial regional variations in temperature, precipitation, and intensity of the hydrological cycle, even perhaps disrupting the Indian monsoon. The 1991 eruption of Mount Pinatubo, which many consider a "natural experiment" in sulfate aerosol engineering, produced a substantial decrease in precipitation over land and brought drought to some parts of the tropics.⁶⁵

These changes would result from shifts in the distribution in the Earth's capacity to absorb solar radiation: relatively less in the tropics (where aerosols would be concentrated) and more at higher latitudes. Thus, SRM means taking responsibility for changing the weather everywhere in a radically uncertain and geographically uneven direction. There is also a temporal dimension to SRM's political implications. "If we were to embark on any SRM program while continuing to increase the atmospheric concentration of carbon dioxide," which is almost certain, "we would risk catastrophic climate change if we were to lose the capacity or will to manage solar radiation anytime during the next millennium or beyond."⁶⁶ That is to say, the state or sovereign that initiates SRM would arrogate to itself its own perpetual necessity. Which raises the crucial political questions:

Many people think that geoengineering technologies should be developed but only deployed (notice the military word) in case of a climate emergency ... How do we know when we are experiencing a climate emergency? Who has the authority to declare such an emergency?⁶⁷

Jamieson poses these questions rhetorically, but they are not rhetorical. They arise from the logic of planetary sovereignty, and we will have to answer them, actively suppress them, or formulate better questions.

To be sure, geoengineering alone will not bring Leviathan into being because Climate Leviathan is emerging at the intersection of several interlocking processes. Still, the recognition that any means of evaluating geoengineering projects will be intensely political explains the logical appeal for a legitimate planetary authority to adjudicate the merits of experimentation. That authority will come cloaked in the white coat of techno-scientific expertise: “Either we are smart enough to craft that feedback mechanism ourselves, or the Earth system will ultimately provide it.”⁶⁸ It is Reason versus the state of nature. Between them stands the planetary sovereign: the one that declares the (experimental) exception in the name of life itself. Planetary sovereignty thus emerges in what might be called *Weltrecht*, the arrogation of the authority and duty to remake the world to save it.

VI

Whenever one discusses technologies that do not yet exist, there is always a threat of lapsing into technological determinism or a teleology of scientific “progress.”⁶⁹ Our point is not that change will be causally driven simply by technology. Every field of science and technology is always already social, and the potential creation of these specific technologies would be an effect of (and contribute to) political change. Their geopolitical dimensions already rend the globe, contributing to deep tensions between the United States and China, for example. We agree with Duvall and Havercroft that these technological changes could bolster US hegemony, but we should not presume that they will do so. The technologies may develop slowly, after some consolidation of global power (in the form of a “G2,” for instance—hegemonic rule by the combined states of China and the United States), or after a war or other event that dramatically weakens US hegemony and/or increases China’s geopolitical power.

Indeed, these uncertain dynamics highlight one of the most worrisome conclusions of our analysis: if the principal change wrought by climate change is the adaptation of the political, the greatest source of uncertainty in its adaptation lies in the complex geopolitical-economic relations between the United States and China. We could see world war between two spheres of influence, leading to a collapse in the world system, or the consolidation of Climate Leviathan through collaboration between the United States and China, or a US-centric Leviathan. There are other prospects, too, of course. Ultimately, in all cases it is impossible to produce a strong predictive model of the climate change-political complex.

To close the chapter, let's take stock of its arguments. Like Wendt, we too anticipate a shift toward a world-scale authority and are persuaded by his argument that the logic of the interstate system points toward its creation. However, he sidesteps the question of capital and its technological dynamism (especially non-military technology), both factors that would seem to make world government not so much "inevitable" as "likely." What seems much more inevitable is the fundamental shift in sovereignty that both Wendt and Duvall and Havercroft try to outline.

We identify three distinct logics that all point toward planetary sovereignty. The first is the logic of weaponry, particularly weapons of mass destruction, elaborated in a tradition that runs from Einstein and Russell to Arendt to Wendt (even if their specific responses to this dynamic differ). The second is the central emphasis of the Marxist tradition: capitalism's tendency toward crisis. Its logic tends toward forms and scales of sovereignty deemed capable of resolving its increasingly global or planetary contradictions (see [Chapter 5](#)). The third, which underlines the essential novelty of the present conjuncture, is the "logic" of ecological catastrophe and the ensuing imperative to save life on Earth through geoengineering, which finds its most advanced expression in SRM. These logics cohere in an emergent Climate Leviathan for which the political is constituted, therefore, in the necessities crisis and catastrophe demand: hegemonic military-political capacity at a scale adequate to "save the planet," the production and protection of geoengineering or related socio-technological mechanisms to realize this goal, and finally, the sovereign power to name the emergency, initiate the institutional and technical responses deemed appropriate, and ensure (as far as possible) their legitimacy.

Though they are already underway and are sure to worsen, accelerated environmental changes like rising sea levels and intensifying droughts will not solicit on their own the coming political transformations climate change will demand. Rather, it is the ensemble of the spectres (and reality) of mass migration and conflict, coupled with the promises of geoengineering that make planetary sovereignty “necessary.” Processes are more likely to drive the creation of Leviathan if [a] they present an existential threat; [b] they are large scale (global); and [c] they pose challenges for the existing political order. In this view, SRM and new planetary governance (particularly if it is introduced along with space-based weaponry), could be the decisive trigger for planetary sovereignty. This could, as we argued earlier, take one of two broad political-economic forms: capitalist or postcapitalist. But to this we can now add that it could emerge through one of two geopolitical paths—producing, in effect, one of two types of empire, geopolitically distinct “Climate Leviathans” (both much more likely to be capitalist than postcapitalist, so both scenarios reflect the upper-left quadrant of [Figure 2.2](#)).

The first is a US-centered Climate Leviathan. In this scenario, the United States maintains its current military dominance, and exploits the “need to save life on Earth” as the ideological basis of a new imperial hegemony. The United States is not only the global leader in the technologies of destruction, but also of geoengineering, particularly SRM. Any such US-led planetary management would unfold on a massively unequal geopolitical terrain, in which planetary sovereignty effectively took the form of imperial rule. A US-centered Climate Leviathan like this could conceivably last a long time, since any attempt to defeat the United States militarily would also seem to unsettle the very management of life of Earth. Attempts to resist US hegemony would be treated as treasonous “terrorism” of an extreme type, confronted with overwhelming military technology.

The second scenario emerges if we begin by recognizing that the United States is not in fact globally hegemonic (for example, if we do not assume that the United States *alone* is likely to achieve rapid advances in military technology like space weaponry). On the contrary, the United States is already competing with several other capitalist nation-states for “great power” status—most notably China, but also Russia, India, and others—and this competition already involves a new cold war of cyber-warfare, diplomatic conflict, and the race to develop sophisticated weaponry (including space weapons).

In this scenario, which seems more likely, one or more of these competing powers will continue to compete with the United States. History would seem to suggest this will lead to war, and it may well. But, for our purposes, what is critical is that the United States would fail to establish political, military and technological dominance. The implication is that the management of the planet would unfold in the context of a world system that is neither democratic (since the vast majority of nation-states and peoples would have no real involvement in the important decisions about the Earth's management) nor clearly dominated by one hegemonic power. Planetary governance would unroll on a lumpy, conflictual geopolitical terrain upon which elites continue to seek "adaptations" that meet their needs—political stability, continued accumulation, and so on. For example, it does not seem entirely outrageous to imagine the United States and China (or some other small cohort of globally influential powers) deciding to reorganize the world system in a sort of grand compromise that includes shared planetary management, a "G2" concentration of the existing order bilaterally constituted to save life on Earth.

From the perspective of anyone hoping for something like climate justice, none of these future paths (or variations upon them) are acceptable. Is there any alternative? What would realizing alternatives involve?

8

Climate X

[For] radical natural-historical thought, everything that exists transforms itself into ruins and fragments.

Theodor Adorno

I

One of the most profound paradoxes of climate justice is that our work is oriented toward an open, just future for those to come, particularly the descendants of the world's less powerful, but this future is so undeniably bleak (and the world's present political arrangements so undemocratic) that any informed, rational response is likely to pull us toward Climate Leviathan, because the further consolidation and expansion of extant power structures would seem to be the only structures of scale, scope, and authority even close to adequate to the challenge of climate change. However dark the future may appear, though, our thought should not shy away from the task of sketching the possible alternative trajectories.

If we begin formulaically, we might say that Climate X is a world that has defeated the emergent Climate Leviathan and its compulsion toward planetary sovereignty, while also transcending capitalism. This is obviously a tall order, to put it mildly. But only in a world that is no longer organized by capitalist value, and in which sovereignty has become so deformed that the political can no longer be defined by the nation-state's sovereign exception, is it possible to imagine a just response to climate change. This general schema gives us some broad sense of direction, and a few indicators by which to identify and measure progress. Support for green Keynesianism, REDD+, climate finance, and the elite politics of adaptation can no longer be priorities. They are distractions, dissipaters of energy for change. The priority must be to organize for a rapid reduction of carbon emissions by collective boycott

and strike. Is this utopianism? Possibly, but not necessarily. This is Climate X, and whatever form it takes, it has the extraordinary merit attached to that which is absolutely necessary. We must create something new. More of the same is not an option.

It is tempting to leave Climate X there, if only to acknowledge that we cannot claim to know what form it might take, if any. There is an arrogance to all political prognostication—an arrogance that seems all the worse when history shows so clearly that it is almost always wrong. But there is also duplicity in backing off at precisely the moment when something needs to be said—a duplicity manifesting itself in the desire to avoid saying something refutable and in the hope of appearing wise in retrospect. At times, taking the risk of being very wrong is more productive, and more modest, than maintaining a hesitant silence. We need to work on political visions of a world in which the movement has won—ideas of futures that can guide us in dark times, mobilizations to realize the change—even if those who propose them run the risk of seeming arrogant, of knowing more than can be known.

This challenge or necessity is not new. At the height of the Cold War, when many on the Left had good reason to question the livability of a future dominated by two unacceptable empires with equally apocalyptic destructive capabilities, a similar demand stimulated several attempts to reenergize Marxist political critique. These often took the form of attempts to write a new Manifesto, more adequate to the time. In the weeks after Khrushchev's denunciation of Stalinism in 1956, two of the most prominent Marxist thinkers of the age, Theodor Adorno and Max Horkheimer, made plans to write a new *Communist Manifesto*. They never followed through, but their discussion (which was recorded) of what that document would look like, and what work it might do, is worth thinking about.

Horkheimer: We cannot leave open the question of what we believe in. The section on work should contain an excursus on the Utopians ...

Adorno: The utopians were actually not very utopian at all. But we must not provide a picture of a positive utopia.

Horkheimer: Especially when one is so close to despair.

Adorno: I wouldn't say that. I believe that because everything is so obvious a new political authority will emerge ... The belief that it will come is perhaps a shade too mechanistic. It *can* come; whether it will come or whether it will go to the dogs is terribly hard to predict ... We have to add

that **we believe that things can come right in the end** ... How would it be if we were to formulate some guiding political principles today?¹

We cannot know exactly what was said, but the overriding sense their conversations communicate is the difficulty of the task they are considering. We are hardly better prepared. Clearly, a radical alternative like Climate X is *historically* open to the future in the sense that any form it ultimately takes has no responsibility to fulfill expectations with which we burden it today. But it nonetheless seems irresponsible not to heed our own call for ideas of futures that can guide us in dark times, of mobilizations to realize the change, because we are certain these are necessary.

In other words, as Horkheimer says, we cannot leave open the question of what we believe in with the mute hope that it will get worked out as the movement progresses. Neither, as Adorno cautions, can we paint a picture of a positive utopia, the unworldliness of which is no more helpful than when Marx and Engels admonished against it in the original manifesto more than a century and a half ago. Adorno suggests that what is required is not an account of a perfect world we can hold in our minds like a dream that can be realized merely because we can dream it, but instead an account of the possible (futures we can come to identify as potential outcomes of our present) in which things *can* (not *will*) “come right in the end.” Adorno seems to think this will entail the emergence of a radically new form of political authority, for which we might attempt to “formulate some guiding political principles.”

We propose at least three such principles as fundamental to any presently emergent or future Climate X. The first is equality. Sometime in the twentieth century the fundamental claim to the equality of *all* humans (not just members of the white, male, Euro-American “community of the free”), an old proposition on the Left, was hijacked by liberalism; the ransom note says we can have it back, but only if we drop our opposition to capitalism.² This we cannot do. Capitalism is a social formation founded on the essential inequality that defines the capital-labor relation, and constantly produces social inequality and the unfreedom of poverty. But this is not the only reason the claim to human equality is necessarily a critique of capital. The planetary ecological crisis illuminates another: if we truly are equal, then we share the Earth. No one can own it. Marx said a long time ago, and it is still true, that “an entire society, a nation, or all co-existing societies taken together, are not owners of the Earth. They are merely its possessors, its usufructuaries,

and, as *boni patres familias*, are to bequeath it, improved, to succeeding generations.”³ This wisdom is of course much older than Marx, and can be found in diverse teachings on the appropriate relationship between humanity and our common home.⁴

This goes part of the way toward explaining why, as we argued earlier, a critique of capitalism is necessary to an effective climate politics, but not enough on its own.⁵ Many peculiar qualities of climate change as an environmental problem—the importance of climate science for diagnosing the problem; the geographical unevenness and variation in its effects; the apparent urgency of coordinated response; the atmosphere’s common pool character; and so on—can neither be explained nor overcome with an analysis limited to the dynamics of capital. Only a radical critique of capitalism *and* sovereignty can orient us today. For many who demand a rapid global response to climate change, the goal is implicitly a planetary form of sovereignty. But that will not be a just world.

This leads to the second guiding political principle: the inclusion and dignity of all. This is a critique of capitalist sovereignty and the thin form of democracy upon which it has come to rely. Democracy is not majority rule and has little to do with the vote. Rather, democracy exists in a society to the extent that anyone and everyone could rule, could shape collective answers to collective questions. No nation-state today meets this criterion. This demands a struggle for inclusion and dignity that can enhance our capacity to transform the politics of rule, a great collective attempt to create conditions for the realization of our self-determination. As Adorno put it, the “single genuine power standing against the principle of Auschwitz is autonomy, if I might use the Kantian expression: the power of reflection, of self-determination, of not cooperating.”⁶ This dignity is expressed by those climate protesters in Paris who refused “this shadow of the future,” who would not “bend to the politics of fear that stifle liberties in the name of security,” who identified the greatest threat to security and life in “the system that drives the climate disaster.”

The third principle is solidarity in composing a world of many worlds.⁷ Against planetary sovereignty, we need a planetary vision without sovereignty, an affirmation of both our common cause and our multiplicity. We could perhaps find some hope for this in the fact that, when Schmitt declared the necessity of the sovereign exception, he explicitly denied the possibility of global sovereignty. But,

unsurprisingly, for him it was impossible not because potential planetary solidarity would erode the grounds of sovereignty as the defining form of the political. On the contrary, he said, global sovereignty is impossible, because universal solidarity is an oxymoron. Any properly political entity, including a state, is irreducibly constituted in enmity; for Schmitt, there is no “us” without a “them.”⁸

Given the context in which he wrote (and the terrible alliances he made), it is easy to isolate Schmitt’s thought in the particular nationalist, raced, and gendered world he wrote it for and to focus on the human “other” that haunts his understanding of politics. But the “realist” emphasis on exclusion and exception as the basis for political life does not begin with “us” and “them”, friend and enemy. Schmitt’s division is only possible on a foundation of more fundamental, prior distinctions: between humans and nature (the nonhuman spaces in which territoriality is asserted), between lives and life, humans and humanity, multiplicity and identity—between our collective and individual autonomy, the “single genuine power” Adorno celebrated, and the bounded “universal” abstractions to which Hobbes and Schmitt declare it must sacrificed (“the nation,” “the people,” “the race,” and so on). Paradoxically, perhaps, these distinctions are even more fundamental to the conception of collective planetarity that gives *Climate Leviathan* much of its “progressive” appeal. Leviathan knows that many ways of life and communities will be lost in the effort to save life on Earth; that is the sacrifice “we” must make. Climate X must reject both the assertion that “planetary” concerns must dominate those of the many communities and peoples who inhabit the planet and the global sovereign that presumes the right to determine those concerns. But does that mean it must oppose all who arrogate to themselves the power to speak on planetary matters? What, if any, form of political life is amenable to a planetarity that does not seem inherently to entail sovereign rule?

Neither these principles (equality, dignity, solidarity) nor these questions descend from an ivory tower. They are, rather, drawn directly from struggles for climate justice coalescing all over the world, and especially among some of the world’s most marginal social groups—many of whom, unsurprisingly, are Indigenous communities for whom these principles do not require the radical political renovation they do for much of the settler-colonial and colonizing world. These groups have led the vociferous opposition to the UNFCCC conception of climate politics because they see it as capitalist imperialism’s talent show, and, with respect to its capacity to mitigate the impacts of catastrophic climate

change, a meaningless liberal piety. These courageous movements—some seemingly little more than quixotic—are the seeds of a Climate X, proof that it is germinating.⁹

The conditions for building this movement reside in the possibilities of the full range of radical developments before us. Some of these take a more or less “orthodox” Left form, like economist Minqi Li’s anticipated ecological resurgence through communist revolution:

Hopefully, people throughout the world will engage in a transparent, rational and democratic debate which is open not only to economic and political leaders and expert intellectuals, but also to the broad masses of workers and peasants. Through such a global collective debate, a democratic consensus could emerge that would decide on a path of global social transformation that would in turn lead to climate stabilization ... This may sound too idealistic. But can we really count on the world’s existing elites to accomplish climate stabilization while meeting the world population’s basic needs? Ultimately, climate stabilization can only be achieved if the great majority of the world’s population (not just the elites and the ecologically conscious middle class individuals) understand the implications, relate these implications to their own lives, and actively ... participate in the global effort of stabilization.¹⁰

The hopeful logic of Li’s analysis reflects one attempt to bridge the gap between a “positive utopia” and a vision of a world in which “things *can* come right in the end.” But it remains (to quote Adorno) a “shade too mechanistic” (as Li would surely concede). The essential question is how could we create conditions in which these dynamics actually operate? Although time is clearly short, the immediate challenge is one of cultivation, of working the material and ideological ground in which these movements can bloom as rapidly as possible and in their full multiplicity. Cultivation like that requires the kind of radical struggle that proves history wrong. A world revolution for climate justice has no clear historical precedent, which is to say that if Li is right that “climate stabilization can only be achieved if the great majority of the world’s population understand the implications, relate these implications to their own lives, and actively and consciously participate in the global effort of stabilization,” we have no previous model to go by. We must build the means to render global participation possible while the entire globe is changing, warming, and (potentially) warring. And all this has to happen in a world that is moving fast in the wrong direction.

We noted that challenges to Leviathan in Asia will arise from the numerous social groups at risk from climate change and other political-

economic forces. We should expect that those who will suffer the greatest consequences—like the urban poor in Calcutta or Jakarta, or peasant farmers across central Mexico and the Sahel—will find ideological resources where they can, perhaps principally through religion. Any attempt to anticipate the forms these challenges will take must recognize that the prevailing frame of opposition to Western liberalism across much of contemporary Asia is political Islam in various forms.

Islamist movements could coincide with any of the four squares in our diagram (Figure 2.2) but tend toward what we have called Behemoth, the right half of the four-square, either reaction (upper right) or revolution (bottom right). Where Leviathan calls for planetary management, what we might call “climate al Qaeda” represents an attack on the hubris of liberal aspirations to planetary sovereignty or, more positively, a defense of God’s Creation. Take, for example, Osama bin Laden’s communiqué of February 10, 2010, on “the way to save the Earth.” His memo eviscerates common proposals to address climate change, noting that the “world has been kidnapped” by wealthy people and corporations “who are steering it towards the abyss.” He argues that the industrialized countries, especially the United States, are responsible for the climate crisis. Bin Laden is surely correct; and the tactics he suggests—boycotting oil companies and the US dollar—are far from naive.¹¹ His critique of the West’s hypocritical attempt to assume responsibility for managing Creation by expanding its destructive dominance offers a powerful illustration of Behemoth attacking Leviathan.

Although it is not clear to what degree Bin Laden’s proposals oppose the hegemony of capital, one might take them—in combination with the militant variety of Islamism to which he subscribed—as one potential version of X. This is certainly not the Climate X we hope to see, but it does raise the question of how this vision might be distinguished from something to which the Left can commit. From our perspective, the principal and decisive difference is that while Bin Laden’s vision might perhaps suggest the destruction of earthly sovereignty in some of its more pernicious forms, it is unwaveringly theocratic, and consequently as irremediably bound to a friend-enemy conception of the political as Schmitt’s. Bin Laden calls the faithful to the redemption of our “corrupted” world as a means to “save Creation.” This is a theological conception of climate “justice” based on the exclusion and domination, perhaps even the erasure, of billions of nonbelievers. Its realization

would require the full force of the terror—arguably this kind of virtue’s inescapable evil twin—with which Bin Laden is often associated.

This is the likely outcome of all attempts to counter Climate Leviathan in the name of religion, from Hindu fundamentalism to reactionary Christian conservatism. The latter has, for the most part, either adopted the denialism of the US Republican Party or embraced the apocalyptic aspects of the crisis as God’s judgment on a sinful world. Pope Francis has taken a different position, but it is precisely his rejection of fundamentalism, and his (cautious) embrace of a universal solidarity, that has simultaneously improved his standing with liberal elites and troubled his status in orthodox (which is to say exclusive) religious communities, including among Roman Catholics. The problem is that even Francis’s universalism is ultimately beholden to a Church in which all are supposedly welcome, but to which we are all already supposed subject, whether we understand it or not. It is a house of universality in which all are resident, even the unbelievers, but only by the sovereign grace of God.

The contrast with religion provides an important way to conceptualize the challenge presented by Climate Leviathan, since, for so many, religion is the crucial resource for adapting to a hot and unstable world. X could therefore be seen as an irreligious movement in place of a religious structure. Climate X is worldly and open, and affirms the autonomous dignity of all. It must be a movement of the community of all—including the excluded—that affirms climate justice and popular freedoms against capital and planetary sovereignty. But is that world even imaginable, let alone realizable?

II

One measure of the robustness of a political theory is its acknowledgment of, interest in, and ability to account for its own contradictions. On these grounds, we should be the first to try to identify the limitations of Climate X. Three concerns seem particularly grave, each of which reflects X’s relation to one of the other three paths. We must look critically at X from the vantage of each of the other possibilities, or paths, beginning with the hegemonic position of Climate Leviathan.

First, from the vantage of Climate Leviathan, X is impossible by definition. It must be—and indeed at an ideological level, already is—rejected in every way: as illegitimate, impractical, dangerous, fantastical,

empty. On the terms of the present geopolitical order, Climate X is not just far weaker than Leviathan, it is not even articulable—a joke no one gets. Consider, for instance, the challenges facing a radical movement toward climate justice in the United States and China. These are not only the planet’s two most powerful states and largest emitters. They form a reluctant and unstable “G2,” nuclear powers engaged in significant geopolitical conflict (particularly in the Pacific), and capitalist societies locked together (if unhappily) at the heart of the global economy. To bring about a radical reassembly of their relation, to undo the momentum of Leviathan in these societies while overcoming capitalism, would require not only revolutionary events in both nation-states but also forms of radical transnationalism relaying struggles within and between them. We are a long way from this. At best, we have limited forms of solidarity, expressed sporadically and typically filtered through nationalist lenses.

Zapatismo provides some useful lessons for thinking about this kind of struggle. The Zapatista movement has produced a remarkable theory and practice of place-based revolutionary struggle in Chiapas that operates both within and against the nation-state form. Zapatismo has enacted a territorial strategy, one that affirms at once the indigeneity, Mexican-ness, and planetarity of their struggle. Though undeniably anticapitalist, the movement has eschewed a frontal attack on capital in favor of the patient labor of working their way out of capitalist social relations: “*somos anti-capitalistas modestas*.”¹² Rather than attempt to seize control of or unravel the nation-state, they have worked to subtract their communities from it, while producing a novel form of state rooted in rotating, locally appointed “good government.” While the Zapatistas are by no means opposed to gestures of international solidarity, their primary external work has been through example. They express a novel radicalism that anticipates many of the qualities we might expect from Climate X. Yet the ongoing siege by the US-backed Mexican state/military, the encirclement of Zapatista communities by a phalanx of military and paramilitary bases and agents, and the limited transnational solidarity supporting the Zapatista struggle indicate and reproduce the geopolitical limitations of their efforts, however blameless they are for their inability to fully overcome them. In other words, to say they still have a long way to go is not to criticize the movement, but to admire and learn from it.

The problem with every attempt to realize particular local instances of Climate X is that, upon reaching a minimal level of viability and

visibility, every “X” will be surrounded and attacked by capitalist nation-states and their “privately” organized allies. Unless they are protected by some broader force above or outside (a much-reformed United Nations, for example, working with transnational social movements on the Left), each immanent X will be destroyed or so tightly constrained as to render its full realization virtually impossible. How can we build solidaristic protection “above or beyond” the capitalist state except through some other state-form, ideally a world state? This question could divide the Left—arguably, it already does—and leave many searching for Leviathan, either “progressive” or revolutionary.

This leads to the second limitation to Climate X, from the position of a would-be Climate Mao. Within any climate justice movement that could possibly be effective or radical, we will encounter a deep desire for a planetary sovereign, one capable of the emergency measures needed to save life on Earth. From this vantage, X is too democratic, too antisovereign. There is much to celebrate in the burgeoning worldwide resistance to fossil fuel corporations and the exciting radical challenges to the neoliberal orthodoxy and political pessimism that dominate the ideological landscape.¹³ But, in the face of rapid climate change, many on the Left have become convinced that something like Climate Leviathan is our only hope. Democracy as we know it (especially its hegemonic liberal variety) seems profoundly inadequate to the problems that lie ahead, and to imagine that democracy in another form is going to fix things takes what many might justifiably see as an increasingly ludicrous leap of faith. Donald Trump is president of the United States; this alone would seem to confirm that there is no reason to believe liberal democracy will help us identify a just and livable way forward simply because it is formally democratic. If, for example, climate policy were placed in the hands of the electorates of the world’s dominant, capitalist, liberal democracies, how much would the status quo change? That the obvious answer to this question is “not that much at all” can point toward two radically different conclusions. On one hand, it seems to confirm the need for Climate Leviathan and its technocratic authoritarianism. On the other hand, however, it points not to the futility of democracy, but to the need for a more radical reorganization of political life than simply bringing “the people” into the climate arena through the ballot box. It is a mistake to equate mass politics with radical politics, just as it is spurious to presume that hegemonic elites’ fear of the masses and democracy (which we usually feel comfortable criticizing) is driven by a fear of radical ideas “coming true” and realizing social justice.¹⁴

Third, from the position of behemoth (and discussed in [chapter 4](#)), modern liberalism’s most powerful internal critique is in fact a liberal effort to ensure that the bourgeoisie do not let self-interest and myopia undermine their privilege and power. Liberals recognize in the multitude only the potential destruction of the social stability they believe keeps chaos at bay. This multitude—the mob, the “rabble”—is a very old specter, and one of its oldest iterations is Behemoth.¹⁵ Fear of its chaos will be one of the main forces that breathes life into Leviathan. For while liberalism has little fear of climate change *per se*, it dreads the mob, the rabble, the climate refugee. These figures threaten to destroy not only the bourgeoisie, but the entire order it understands as “civilization.” Recall the liberal dystopian fantasy of Oreskes and Conway with which we opened [Chapter 6](#): warming shatters West Antarctica, flooding lets loose the masses, refugees spill across the planet, and Western Civilization is destroyed. The stories may be new, but their eschatology is ancient.

Some may find the contradictions of X discussed above to be so fundamental that they constitute a basis for siding with Leviathan or Mao. Yet these contradictions do not prevent us either from conceptualizing X as a left political strategy or from laboring to realize X in revolutionary practice. Still, there remains the theoretical task of illuminating possible paths through apparently impossible problems. Putting aside the false solution of urging others on in the name of a mandatory liberal “optimism,” we see two intertwined but distinct genuine openings for left praxis, each reflecting a distinct tradition of thought.

The first opening might find inspiration in the categorical refusal that underwrites Marx’s critique of sovereignty and of communism. Although he coauthored the manifesto of the Communist Party, which many read as a work of prophecy, Marx wrote almost nothing about the future, and even less about what a future communism will look like. His clearest statement on the matter is a refusal of the possibility that revolutionary thought can “know” in a definitive manner where revolutionary activity is going. Communism, he wrote, is

not a *state of affairs* which is to be established, an *ideal* to which reality [will] have to adjust itself. We call communism the *real* movement which abolishes the present state of things, the conditions of this movement result from the premises now in existence.¹⁶

The second opening might be grounded in Benjamin's call for politically resolute witness to crisis, a stance that finds affirmation in Agamben's appeal to a "coming community" and "destituent" power. We wager we need to say yes and yes, affirming both positions at once. In this view, Climate X is at once a means, a regulative ideal, and, perhaps, a necessary condition for climate justice. This is the logical result of the equal necessity of politicizing the present and incessantly questioning the future: a rejection of utopian blueprints, of nostalgia for a lost past, and of futile mourning over missed opportunities.

What would this look like in action? Much can be learned from grassroots climate justice movements across the planet; so too can wisdom be gained from unlikely sources. After the Paris meetings, ecologist Miguel Altieri circulated a text celebrating "the most important ... message for humanity in 2015: Pope Francis's ecological encyclical *Laudato Si'*."¹⁷ His enthusiasm is understandable. Assailing a "global problem with grave implications," Francis emphasizes the essential political-economic injustice of climate change: the product of the world's richest societies, the poor pay the greatest price. They "have no other financial activities or resources which can enable them to adapt to climate change or to face natural disasters, and their access to social services and protection is very limited." Without these resources, we are already witness to "a tragic rise in the number of migrants seeking to flee from the growing poverty caused by environmental degradation," refugees who "are not recognized by international conventions as refugees; they bear the loss of the lives they have left behind, without enjoying any legal protection whatsoever." Their plight is no fault of their own, and yet

there is widespread indifference to such suffering, which is even now taking place throughout our world. Our lack of response to these tragedies involving our brothers and sisters points to the loss of that sense of responsibility for our fellow men and women upon which all civil society is founded.¹⁸

Francis names the source of this indifference unflinchingly—on the same ethical basis as his recognition that Donald Trump is not a Christian—the privileges of wealth and power. Those "who possess more resources and economic or political power seem mostly to be concerned with masking the problems or concealing their symptoms, simply making efforts to reduce some of the negative impacts of climate change."¹⁹ The duplicity of the powerful is revealed when "this attitude

exists side by side with a ‘green’ rhetoric” that arrogates to the very same elites the power to determine the planet’s future. Against this, “we have to realize that a true ecological approach always becomes a social approach; it must integrate questions of justice in debates on the environment, so as to hear both the cry of the earth and the cry of the poor.”²⁰ The conclusion is radical: the refusal to center our political analysis of climate crisis on the poor and powerless helps explain why the “solutions” proposed are false and why international leadership to reduce carbon emissions has been so pathetic.

We lack leadership capable of striking out on new paths and meeting the needs of the present with concern for all and without prejudice towards coming generations. The establishment of a legal framework which can set clear boundaries and ensure the protection of ecosystems has become indispensable; otherwise, the new power structures based on the techno-economic paradigm may overwhelm not only our politics but also freedom and justice ... It is remarkable how weak international political responses have been. The failure of global summits on the environment make it plain that our politics are subject to technology and finance. There are too many special interests, and economic interests easily end up trumping the common good and manipulating information so that their own plans will not be affected ... The alliance between the economy and technology ends up sidelining anything unrelated to its immediate interests. Consequently the most one can expect is superficial rhetoric, sporadic acts of philanthropy and perfunctory expressions of concern for the environment ...²¹

More forcefully than any other world leader, Francis has called upon political leaders to act, exploiting his position to make gestures of solidarity with climate activists.²² Indeed, an argument could be made that the Pope’s climate politics offers a more precise set of commitments than that of many in the climate justice movement. The most direct, coherent, radical statement of principles to address climate change we read in Paris came from Francis. During COP21 we walked to Sacré-Coeur, a cathedral built by a reactionary Church on the ruins of the Paris Commune of 1871, a church the Left loves to hate.²³ Inside was a display explaining the Pope’s encyclical, emphasizing his call for a new planetary arrangement based on solidarity, dignity, and equality of all. The values of 1871, inscribed inside Sacré-Coeur! It was as though the Commune had broken through the marble floor, its ideas germinating a century and a half later than planned.

But we are not Catholics and have not joined the Church, at least not yet. The problem is not that there is some hidden reactionary message beneath Francis's discourse on climate. The problem with the Franciscan approach lies instead in its theological and institutional commitments, a problem that limits all religious approaches to planetary environmental issues. The clarity of the Pope's encyclical should put the Church on the side of the Indigenous radical critics who attempted to perform their ceremony at its steps. Unfortunately, the boundaries between religions remain intact, as does their unforgiving attachment to those divisions, to who is included and who is excluded from the faithful—symbolized here by the closed doors of Notre Dame and the police defending its plaza. If the unexpected radical words inside Sacré-Coeur give us some hope for the role of religion in the face of the climate crisis, it must be tempered if not extinguished by the inhospitable rejection of the Indigenous leaders outside the gates of Notre Dame.

To some extent, modern religions' institutional rigidities have been finessed by suitably ecumenical "interfaith" movements to enrich and unify religious perspectives on environmental change. But even when these movements transcend the ostensible solidarity of an airport chapel, the theological frame is no less limiting because it is built upon the essential structure and political imaginary of sovereign authority ("theology" is literally the word of God). This is a complex matter to which we cannot do justice here, but on our terms, it concerns the ambiguous relation between X and the capitalist millenarianism of Behemoth, which would appear to be strictly divided by their radically opposed attitudes to capital. Francis's widespread appeal to progressives and the Left undoubtedly reflects a latent potential for X, and his position concerning the climate emergency reflects a critique of capitalism. Parallel illustrations may be found from every religious tradition.

Yet, like all religious calls to transcend the present order, it leaves the question of rule radically open. Our point is not that Francis is surreptitiously laying the groundwork for some sort of "ecological theocracy." Rather, the point is that theocracy is unavoidably a constitutive ideal in a theological worldview. If one accepts the absolute authority of the word of God as Truth and Wisdom, then the rule of God (or His or Her earthly representatives) is a logical and unconditional, if idealized, objective. If God could rule, why would humanity stand in the way? As radically progressive as Francis's position on climate might seem, this proposition is inseparable from it. What is needed instead is

what Benjamin calls the “real state of emergency,” in which sovereign supremacy in its theocratic or secular forms—and hence the links that might appear to tie Behemoth and X together—are broken.²⁴

III

Over the last twenty years, the Italian communist philosopher Antonio Negri has turned often to the biblical figure of Job—the very same figure whose powerlessness God taunted with the Leviathan—as a metaphor for “our” present condition:

[the] reality of our wretchedness is that of Job, the questions and the answers that we pose to the world are the same as Job’s. We express ourselves with the same desperation, uttering the same blasphemous phrases. We have known riches and hope, we have tempted God with reason—we are left with dust and inanity.²⁵

There may indeed be something to this. Those who struggle for climate justice in the age of Trump are like Job. Trump is not God, of course, but taunts the desperate “reason” that underwrites so much of the argument for climate action.

But this is not why this book is structured by figures from the Book of Job (Leviathan and Behemoth). The debate on the politics of climate change turns, like Job’s with God, on sovereignty. Capital is also a fulcrum, but it seems that the Left’s arguments concerning it—that capital’s ceaseless expansionist imperative drives carbon emissions; that the capitalist nation-state constrains effective responses to climate change—are relatively uncontroversial. This says something important about the contemporary climate change discourse. Until recently, only a few radical political ecologists, in various shades of red and green, contended that planetary environmental change was a logical consequence of capitalism. No longer. Today even some of capital’s best-known champions—Paul Krugman, Joseph Stiglitz, Christine Lagarde, and others—have drawn the connection between the relentless logic of accumulation and climate change.²⁶ Theirs is not the liberal common sense shaping state policy, but it is a noteworthy development. If nothing else, it is now possible to openly discuss the failures of capitalism to deal with climate change (if only as “market failure”). By contrast, the engagement with the political, the problems raised by climate change for sovereignty, are only beginning to be grasped, even on the Left.

There are, we might say, two broad but distinct trajectories that might lead to Climate X. The first is a radical analysis and practice based in an open embrace of the tradition of the anticapitalist Left, sprung from Marxist roots. While by no means a panacea for emancipatory political struggle, the diverse and creative ways that Marxian ideas have inspired movements across the planet testifies to their fertility. Even when it has been radically reinvented or taken to task (for example in the community economies work associated with J.K. Gibson-Graham), it nonetheless provides a foundation and counterpoint to efforts to think how things could be otherwise and how to get there.

The second trajectory gets its momentum from very different sources: the knowledge and lifeways of peoples who have long historical experience with ways of being that are not overdetermined by capital and the sovereign state. It is no accident that Indigenous and colonized peoples are at the frontlines in the struggles sowing the seeds of any realizable Climate X. While these groups have, of course, been subject to capital and state power, to generalize, their present strategies do not emphasize forging internationalist solidarity for a revolutionary communist or socialist future. Their point, rather, is to ensure that the full multiplicity of those lifeways has a vital and dignified future—and, in some cases, to communicate to those willing to listen what they might learn from it.

The challenge that defines Climate X is bringing these two trajectories together; not to merge them, or subordinate one to the other, but to find some means by which they support each other, give each other energy and momentum. This is not impossible, although a left turn toward Leviathan or Mao will almost certainly undo the potential for synergy. This is another reason for Climate X—movements for climate justice that reject both capital and sovereign rule—because to fall back on Leviathan or Mao is to reject the first and second principles as well, equality and dignity for all. Both sovereign paths oppose those principles by definition. Adorno said of a potentially radical, new form of authority, “It *could* come.” What would it be? The answer can only be a democracy so radical it is contrary to sovereignty. Indeed, it must be said that real democracy can only be nonsovereign, because there cannot be a principle of rule, or a territorial closure, that is so sacrosanct it cannot be otherwise.

Adorno is no doubt building on the early Marx, but this thinking has more than one source. To understand what he is trying to articulate, and thus what the radical Left trajectory can bring to the struggle, we can

but to go further, challenging the very form and nature of sovereignty.⁴³ In the words of Alfred, “the actual history of our plural existence has been erased by the narrow fictions of a single sovereignty”; “sovereignty” has become a big part of the problem: it has “limited the ways [Indigenous peoples] are able to think, suggesting always a conceptual and definitional problem centered on the accommodation of indigenous peoples within a ‘legitimate’ framework of settler state governance.” His bracing conclusion: “‘sovereignty’ is inappropriate as a political objective for indigenous peoples”.⁴⁴

One of the main obstacles to achieving peaceful coexistence is of course the uncritical acceptance of the classic notion of sovereignty as the framework for discussions of political relations between peoples. The discourse of sovereignty has effectively stilled any potential resolution of the issue that respects Indigenous values and perspectives. Even “traditional” indigenous nationhood is commonly defined relationally, in contrast to the dominant formulation of the state: there is no absolute authority, no coercive enforcement of decisions, no hierarchy, and no separate ruling entity.⁴⁵

But, if anticolonists are not fighting for *sovereignty*, for a better position as “full” participants in the prevailing, nation-state based politics of recognition, then for what do they struggle?

One political strategy that seeks to realize these commitments is to multiply political practices of “disruptive *countersovereignty*,” in Coulthard’s words.⁴⁶ The really difficult question is how countersovereignty could articulate the struggles for what appear standard liberal goods: land, autonomy, and the authority and capacity to found alternative modes of governing.⁴⁷ How can the fight against capitalist imperialism—not to mention the material struggle for *land*—escape the clutches of sovereign governmentality and help move us all toward climate justice? For Coulthard, the answer is straightforward, though not simple, and points us in a direction that much of Climate X—at least in its present, inchoate forms—is moving:

Indigenous struggles against capitalist imperialism are best understood as struggles oriented around the question of *land*—struggles not only *for* land, but also deeply *informed* by what the land as a mode of reciprocal *relationship* (which is itself informed by place-based practices and associated forms of knowledge) ought to teach us about living our lives in relation to one another and our surroundings in a respectful, nondominating and nonexploitative way.⁴⁸

The principle distinction between an orthodox conception of sovereignty and this framework—indeed, the dynamic that gives it a “countering” sense of active refusal or reversal—is the centrality of reciprocity.⁴⁹ Within any given territory, sovereignty is a non-reciprocal relation, by definition. Whether one understands it as constituted in the Schmittian “decider” who arrogates the power of exception, or in the adoption of subjection by the many before the authority of the one, or even in a more collective-democratic mode, sovereignty is, at root, all about rule.

This is a challenge not only to specifically colonial forms of sovereignty, but to any and all forms of sovereignty that can be logically or historically paired with the modifier “colonial”—which is all liberal-capitalist forms.⁵⁰ What is at issue is not captured by the idea of a struggle over sovereignty; rather, the dynamic construction of countersovereignty is best understood as an attempt to claim “the right to be responsible,” individually and collectively: to have power, to have meaning, to understand oneself, one’s communities, and one’s histories as not only inseparable but also ineliminable from reciprocity and the land. This is not land that individuals or states own in the liberal, capitalist sense, as state-space (territory) and property (commodity), but land of which one is a fundamental part.⁵¹ Insofar as Indigenous modes of life are not about “settling” the land—colonizing it, making it property—but rather about the continuity of living together within and upon it, they show the poverty of the liberal concept of sovereignty, which “designates less a content that can be replaced” and more “a process of compulsory relation, one predicated on the supposedly unquestionable fact of national territorial boundaries.”⁵² Hence, as we witness the gathering of Indigenous leaders in opposition to a colonial climate injustice, in Paris or Standing Rock, it is a grave mistake to assume “that what indigenous peoples are seeking in recognition of their nationhood is at its core the same as that which countries like Canada and the United States possess now.”⁵³

Is it really fanciful to anticipate that these two trajectories, movements inspired by either one or some combination of these fundamental traditions of critical thought and practice, might (in Adorno’s words, following the lead of Benjamin) “intersect in the moment of transience,” a transience experienced as both crisis and opportunity?⁵⁴ Benjamin’s model for a political strategy to achieve this transience was the general strike, the collective decision to cease our ceaseless production and consumption and form something different. Even if that moment is an event we can never fully grasp, this possibility

must be cultivated in the openness of Climate X. This is one of the reasons it is Climate X: it must be able to become and include what it needs to be to point us toward (at least the beginnings of) a solution. Bundle together the most radical strategies of the climate justice movement—mass boycott, divestment, strike, blockade, reciprocity—and you will glimpse Benjamin’s vision of another world, where natural history and human history “intersect in the moment of transience.”

This glimpse may seem too imprecise a way to close this account. However, because the account is in fact not closing, but only just opening, we prefer to see it as a politically and analytically responsible gesture in radically uncertain times. The planetary crisis is, among other things, a crisis of the imagination, a crisis of ideology, the result of an inability to conceive any alternative to walls, guns, and finance as tools to address the problems that loom on the horizon. Our task is to see the ruins and fragments of our natural-historical moment for what they truly are; not to draw up blueprints of an emancipated world, but to reject Leviathan, Mao, and Behemoth, while affirming other possibilities. What remains? All we have and all we have ever had: X to solve for, a world to win.

the issues that characterized the seventeenth century. What proves the strength of his thinking is its inherent prognosticative element.”

38 We discuss Kant and Hegel below. Apropos this element of Marx’s thought, it is worth revisiting the important claim from *The German Ideology*:

[S]imple categories [may] represent relations or conditions which may reflect the immature concrete situation without as yet positing the more complex relation or condition which is conceptually expressed in the more concrete category ... Money ... existed in historical time before capital, banks, wage-labour, etc. came into being. In this respect it can be said, therefore, that the simpler category expresses relations predominating in an immature entity or subordinate relations in a more advanced entity; relations which already existed historically before the entity had developed the aspects expressed in a more concrete category. The procedure of abstract reasoning which advances from the simplest to more complex concepts to that extent conforms to actual historical development.

Karl Marx and Friedrich Engels, *The German Ideology*, Amherst, MA: Prometheus Books, 1967 [1846], 142.

39 Lucio Magri, *The Tailor of Ulm*, London: Verso, 2011, 54.

40 Hobbes’s famous depiction of the state of nature has been internalized by some in the modern environmental movement. One of the many recent books published by a left-wing climate activist, J. Brecher’s *Against Doom* (Oakland, CA: PM Press, 2017), concludes by sketching “two scenarios” of possible futures. One is eco-utopian; the other is simply called “Doom” (95–96). In the latter scenario, “Life will be nasty, brutish, and short” (96). Brecher does not cite Hobbes.

41 Marx’s claim about capital creating its own gravediggers comes from Chapter 1 of the *Manifesto of the Communist Party*, written with Engels:

The essential conditions for the existence and for the sway of the bourgeois class is the formation and augmentation of capital; the condition for capital is wage-labour. Wage-labour rests exclusively on competition between the labourers. The advance of industry, whose involuntary promoter is the bourgeoisie, replaces the isolation of the labourers, due to competition, by the revolutionary combination, due to association. The development of Modern Industry, therefore, cuts from under its feet the very foundation on which the bourgeoisie produces and appropriates products. What the bourgeoisie therefore produces, above all, are its own grave-diggers.

Karl Marx and Friedrich Engels, “The Manifesto of the Communist Party” (1848), Chapter 1, accessed at marxists.org.

- 42 A provisional definition. On “the political,” see [Chapter 4](#).
- 43 Immanuel Kant, “The Metaphysics of Morals,” in *Practical Philosophy*, Cambridge: Cambridge University Press, 1996 [1797], 392.
- 44 Carl Schmitt, *Legality and Legitimacy*, Durham, NC: Duke University Press, 2004. The phrase is from the Latin edition of *Leviathan* Hobbes published in 1668, [part II](#), 133.
- 45 Koselleck, *Critique and Crisis*, 15; see also Schmitt, *The Leviathan in the State Theory of Thomas Hobbes*; Jürgen Habermas, *The Structural Transformation of the Public Sphere: An Inquiry into a Category of Bourgeois Society*, Cambridge, MA: MIT Press, 1991, 90–91.
- 46 Koselleck, *Critique and Crisis*, 25.
- 47 Ibid., 182.
- 48 Carl Schmitt, *The Concept of the Political*, Chicago, IL: University of Chicago Press, 2007, 80–96; Carl Schmitt, *Political Theology II: The Myth of the Closure of Any Political Theology*, Cambridge: Polity, 2008, 129–30.
- 49 Carl Schmitt, *Political Theology: Four Chapters on the Concept of Sovereignty*, translated by G. Schwab, Chicago, IL : University of Chicago Press, 2005, 8–9, 53–66.
- 50 Arendt, *Origins of Totalitarianism*, 276–70, emphasis added.
- 51 Ibid.
- 52 Agamben, *State of Exception*.
- 53 Hannah Arendt, *Crises of the Republic*, New York: Harcourt Brace, 1972, 119.
- 54 Arendt, *The Origins of Totalitarianism*, 434.
- 55 Koselleck, *Critique and Crisis*, 23, 34. [Man is wolf to man, man is God to man.]
- 56 Ibid., 33; see also Habermas, *Structural Transformation of the Public Sphere*, 103.
- 57 We restate here a core argument that Gramsci takes from Hegel. See Gramsci, [Q11§12], *Selections from the Prison Notebooks*, 323–43.
- 58 Gramsci, [Q3§34]; *Selections from the Prison Notebooks*, 276.

2. Climate Leviathan

- 1 Roger Revelle and Hans Suess, “Carbon Dioxide Exchange Between Atmosphere and Ocean and the Question of an Increase of Atmospheric CO₂ during the Past Decades,” *Tellus* 9, no. 1, 1957, 19–20.
- 2 International Energy Agency, *World Energy Outlook*, 2012. The Organisation for Economic Co-Operation and Development founded the International Energy Agency in 1974 (at the behest of the United States) to coordinate wealthy countries’ response to dependence on Middle Eastern oil.

3 Gavin Bridge and Philippe Le Billon, *Oil*, London, Polity Press, 2013, 15.

4 Ibid., 9. Hence the new geography of energy demands increasing amounts of energy in the process of extraction relative to the energy of that extracted. During the last century, the global average fell from 1:100 to 1:30, and as low as 1:5 in some unconventional operations. In other words, whereas an average extraction project once produced 100 times the amount of energy invested, it now produces only 30, and often less.

5 In the Organisation for Economic Co-Operation and Development, total renewable electricity production doubled (from ~1200 to ~2400 TWh) between 1988 and 2014: International Energy Agency, “Recent Energy Trends in OECD,” 2015, excerpt from International Energy Agency, *Energy Balances of OECD Countries: 2015 Edition*. As of 2015, roughly half of this renewable production comes from hydropower, which is not without environmental consequences.

6 The best scientific review of evidence on emissions is Intergovernmental Panel on Climate Change, *Working Group II: Impacts, Adaptation, and Vulnerability. Fifth Assessment Report Technical Summary*, March 31, 2014, Yokohama, Japan. Between February 2012 and February 2013, Mauna Loa recorded 3.26 parts per million rise in CO₂, registering 400 parts per million for the first time in May 2013, relative to preindustrial levels of approximately 280 parts per million. John Vidal, “Large Rise in CO₂ Emissions Sounds Climate Change Alarm,” *The Guardian*, March 8, 2013. Kirsten Zickfeld, Michael Eby, H. Damon Matthews, and Andrew J. Weaver, “Setting Cumulative Emissions Targets to Reduce the Risk of Dangerous Climate Change,” *Proceedings of the National Academy of Sciences* 106, 2009, 16129–34.

7 International Energy Agency, “CO₂ Emissions from Fuel Combustion: Highlights,” 2016, 10.

8 In 2011 global CO₂ emissions reached a record high of 31.6 gigatons (Gt), a 1.0 Gt (3.2 percent) increase over 2010 (International Energy Agency, 2012). The world is on track to emit ~58 Gt in 2020, the year the Durban agreement commitments are supposed to begin, ~14 Gt more than can be emitted if we are to limit warming to 2°C: United Nations Environment Programme, *The Emissions Gap Report*, Nairobi, 2012. From 2004 to 2013, atmospheric greenhouse gas concentrations measured at Mauna Loa increased 2.13 percent, the fastest decadal increase yet. Concentrations of CO₂ in the Earth’s atmosphere (parts per million) derived from in situ air measurements at the Mauna Loa observatory in Hawaii are given at www.co2.earth.

9 Mike Davis, “Who Will Build the Ark?” 39.

10 Karl Marx, *Capital*, Vol. I, New York: Penguin Random House, 1992 [1867].

11 Job 28: 25.

12 On the diplomatic failure prior to the Paris meeting in 2015, see, for example, David G. Victor, *The Collapse of the Kyoto Protocol and the Struggle to Slow Global Warming*, Princeton, NJ: Princeton University Press, 2004; Elmar Altvater and Achim Brunnengräber (eds), *After Cancún: Climate Governance or Climate Conflicts*, Berlin, Germany: Verlag für Sozialwissenschaften and Springer, 2011. We discuss Paris more below.

13 Agamben, *State of Exception*, 14.

14 A planetary sovereign is a *non sequitur* for Schmitt, but we are not faithful Schmittians. We also part ways á propos capital, which Schmitt saw as epiphenomenal to sovereignty.

15 We emphasize *most likely*. There are no certainties. We hasten to remind our readers of a point made repeatedly by Nicos Poulantzas, that neither capital as such nor the capitalist state includes an automatic or teleological mechanism for resolving crises: “neither within capital as a whole nor within monopoly capital itself, is there an instance capable of laying down who should make sacrifices so that others may continue to prosper”; *State, Power, Socialism*, London: Verso, 1979, 182–83.

16 The UN Security Council has considered the establishment of an “environmental peacekeeping force,” “green helmets” who will manage the coming climate-induced unrest: “UN Security Council to Consider Climate Change Peacekeeping,” *The Guardian*, July 20, 2011. In the United States, the military arguably marks the cutting edge of climate adaptation. The US Navy has rolled out its “great green fleet,” an environmentally friendly arsenal powered entirely by biofuels. See “US Navy to Launch Great Green Fleet,” *The Guardian*, April 20, 2010; see also National Research Council, “National Security Implications of Climate Change for US Naval Forces,” 2011, available at nap.edu.

17 Formal titles: Teresa and John Heinz Professor of Environmental Policy at Harvard University and Assistant to the President for Science and Technology and Director of the White House Office of Science and Technology Policy.

18 “John Holdren, Obama’s Science Czar, Says: Forced Abortions and Sterilization Needed to Save the Planet”, at zombietime.com/john_holdren.

19 Paul Ehrlich, Anne Ehrlich, and John Holdren, *Ecoscience: Population, Resources, Environment*, San Francisco: W.H. Freeman, 1977, 942–43.

20 Edward B. Barbier, *A Global Green New Deal: Rethinking the Economic Recovery*, Cambridge: Cambridge University Press, 2010; Larry Lohmann, “Regulatory Challenges for Financial and Carbon Markets,” *Carbon and Climate Law Review* 2, 2009, 161–71; Larry Lohmann, “Financialization, Commodification and Carbon: The Contradictions of Neoliberal Climate Policy,” *Socialist Register* 48, 2012, 85–107. Climate finance lies at the center of the debates surrounding the Paris Agreement today. Pablo Solón, former ambassador to the United Nations Conference of the Parties from Bolivia, explains regarding the Paris Agreement: “developed countries in a very clever way replaced the

word ‘provide’ with ‘mobilize’ [in the section on climate finance]. Article 9 of the agreement states that ‘developed country Parties should *continue to take the lead in mobilizing climate finance* from a wide variety of sources, instruments and channels,’ such as public funding, private investment, loans, carbon markets and even developing countries” [emphasis added]. The phrase “continue to take the lead” implies that they are already doing something worthy; “mobilizing” implies that private finance will continue to be about the only sort available. Even when public finance is provided, it could be mediated by, e.g., the World Bank. Imagine a loan granted to Jamaica to build a seawall; it surely will be counted toward the \$100 billion [pledged in Paris], since the North would be “mobilizing climate finance” and the loan must be paid back with interest.

21 On the spatial fix, see David Harvey, *The Limits to Capital*, Chicago IL: University of Chicago Press, 1982; on the socioecological fix, see James McCarthy, “A Socioecological Fix to Capitalist Crisis and Climate Change? The Possibilities and Limits of Renewable Energy,” *Environment and Planning A* 47, no. 12, 2015, 2485–2502.

22 Marx, *Capital*, Vol. 1; Richard Walker and David Large, “The Economics of Energy Extravagance,” *Ecology Law Quarterly* 4, 1975, 963–85; Harvey, *The Limits to Capital*; Neil Smith, *Uneven Development: Nature, Capital and the Production of Space*, London, Oxford: Blackwell, 1984; Leigh Johnson, “Geographies of Securitized Catastrophe Risk and the Implications of Climate Change,” *Economic Geography* 90, 2014, 155–85. John Bellamy Foster, Brett Clark, and Richard York, *The Ecological Rift: Capitalism’s War on the Earth*, New York: Monthly Review Press, 2010; Joel Wainwright, “Climate Change, Capitalism, and the Challenge of Transdisciplinarity,” *Annals of the Association of American Geographers* 100, 2010, 983–91.

23 Le Bourget is the same spot Charles Lindberg landed after his 1927 trans-atlantic flight. We were privileged to engage the Paris meetings from the ramparts.

24 “World Leaders Hail Paris Climate Deal as ‘Major Leap for Mankind,’” *The Guardian*, December 12, 2015.

25 Julie Hirschfeld Davis, “Obama, Once a Guest, Is now a Leader in World Talks,” *New York Times*, December 12, 2015. In fairness, *The Guardian* “balanced” this one-sided front-page story with a photo essay showing different forms of protest in and around Paris/COP21; see Eric Hilaire, “Thousands Defy Paris Protest Ban to Call for Climate Action—in Pictures,” *The Guardian*, December 10, 2015. However, the photo essay lacked any text that would allow the reader to understand the ideological, social, and spatial differences on display in the protests. The representation of the protests therefore flattened and homogenized disparate and divided groups.

26 George Monbiot writing in *The Guardian*, December 12, 2015.

27 United Nations, Conference of the Parties, “Adoption of the Paris Agreement,” Twenty-first Session, 30 November–11 December 2015, Article 4,

para 1, 21, available at unfccc.int.

28 Kyoto Protocol, Article 11, available at unfccc.int.

29 John Foran, “The Paris Agreement: Paper Heroes Widen the Climate Justice Gap,” *System Change Not Climate Change*, December 17, 2015, parisclimatejustice.org.

30 Pablo Solón, “From Paris with Love for Lake Poopó,” *Observatorio Boliviano de Cambio Climático y “Desarrollo,”* December 21, 2015.

31 David Beers, “Naomi Klein, Bill McKibben Knock Paris Climate Deal,” *The Tyee*, December 14, 2015, thetyee.ca. In a subsequent, excellent essay (“Let Them Drown,” *London Review of Books*, June 2, 2016), Klein writes that the Paris target—keeping warming below 2°C—is

beyond reckless. When it was unveiled in Copenhagen in 2009, the African delegates called it “a death sentence” ... At the last minute, a clause was added to the Paris Agreement that says countries will pursue “efforts to limit the temperature increase to 1.5°C.” Not only is this non-binding but it is a lie: we are making no such efforts. The governments that are making this promise are now pushing for more fracking and more tar sands development—which are utterly incompatible with 2°C, let alone 1.5°C.

32 Megan Darby, “COP21: NGOs React to UN Paris Climate Deal,” *Climate Home*, December 12, 2015.

33 Oliver Milman, “James Hansen, Father of Climate Change Awareness, Calls Paris Talks ‘a Fraud,’” *The Guardian*, December 12, 2015.

34 Paris Agreement, p. 3, para 17, available at unfccc.int.

35 Davis, ““Who Will Build the Ark?”; Giovanni Arrighi, *Adam Smith in Beijing: Lineages of the Twenty-first Century*, London: Verso, 2007, part IV; see also Patrick Bigger, “Red Terror on the Atmosphere,” *Antipode*, July 2012, radicalantipode.files.wordpress.com.

36 Alain Badiou, *The Communist Hypothesis*, London: Verso, 2010, 262–79.

37 Minqi Li, “Capitalism, Climate Change, and the Transition to Sustainability: Alternative Scenarios for the US, China and the World,” *Development and Change* 40, 2009, 1055–57.

38 Compare Dale Wen, “Climate Change, Energy, and China,” in Kolya Abramsky (ed.), *Sparkling a Worldwide Energy Revolution*, Baltimore, MD, and Oakland, CA: AK Press, 2010, 130–54.

39 Y. Wang, J. Hao, M. McElroy, J. W. Munger, H. Ma, D. Chen, and C. P. Nielsen, “Ozone Air Quality during the 2008 Beijing Olympics: Effectiveness of Emission Restrictions,” *Atmospheric Chemistry and Physics* 9, 2009, 5237–5.

40 “Hummer: China isn’t Buying it Either” [Editorial], *Los Angeles Times*, February 25, 2010.

⁴¹ “China’s Great Green Wall Grows in Climate Fight,” *The Guardian*, September 23, 2010. “Ordinary citizens have planted some 56 billion trees across China in the last decade, according to government statistics. In 2009 alone, China planted 5.88 million hectares of forest.”

⁴² Andrew Jacobs, “China Issues Warning on Climate and Growth,” *New York Times*, February 28, 2011.

⁴³ Oliver Milman and Stuart Leavenworth, “China’s Plan to Cut Meat Consumption by 50% Cheered by Climate Campaigners,” *The Guardian*, June 20, 2016:

The average Chinese person now eats 63kg of meat a year, with a further 30kg of meat per person expected to be added by 2030 if nothing is done to disrupt this trend. The new guidelines would reduce this to 14kg to 27kg a year.

⁴⁴ Consider China’s recent voluntary “border tax adjustment” program, aimed at reducing exports of energy-intensive products (Wen, “Climate Change, Energy, and China,” 143–46); in contrast, compare Jonathan Watts, “Chinese Villagers Driven Off Land Fear Food May Run Out,” *The Guardian*, May 19, 2011.

⁴⁵ Mao Tse-Tung, “Analysis of Classes in Chinese Society,” in *Selected Works of Mao Tse-Tung*, vol. I, Peking: Foreign Languages Press, 1926. To say the least, the works of Mao (and Maoism more generally) are not mainstream sources in contemporary, Anglophone Marxist scholarship. In a well-known passage from her essay, “Can the Subaltern Speak?” where Gayatri Spivak criticizes Foucault and Deleuze for failing to address their Eurocentric “implication in intellectual and economic history,” she emphasizes, as an illustration, their vague references to “A Maoist” (Spivak, “Can the Subaltern Speak?” in Cary Nelson and Lawrence Grossberg (eds), *Marxism and the Interpretation of Culture*, Urbana: University of Illinois Press, 1988, 272). Spivak claims their “Maoism” “simply creates an aura of narrative specificity,” which would be “a harmless rhetorical banality” except that that it “renders ‘Asia’ transparent.” Anyone working from the Western Marxist tradition who seeks to engage the prospects of change from a (still-vibrant) Maoist tradition will run the risk of such errors. But ignoring Maoism is worse. Notwithstanding their limitations, our references to and discussions of Mao and Maoism are intended as a correction to a Eurocentric tendency to downplay the importance of Maoism for Marxism as a world-historical phenomenon.

⁴⁶ “Final Declaration of the World People’s Conference on Climate Change and the Rights of Mother Earth,” Cochabamba, Bolivia, April 26, 2010, available at readingfromtheleft.com.

⁴⁷ Mao, “On Contradiction,” in *Selected Works of Mao Tse-Tung*, Vol. I, 321–32.

48 Minqi Li, *The Rise of China and the Demise of the Capitalist World Economy*, New York: Monthly Review, 2008; Stefan Harper, *The Beijing Consensus: How China's Authoritarian Model Will Dominate the Twenty-First Century*, New York: Basic Books, 2010.

49 We recognize that ours is a too concise summation of quite different Mao-influenced movements. See Achin Vanaik, "The New Himalayan Republic," *New Left Review* II/49, 2008, 47–72; S. Giri, "The Maoist 'Problem' and the Democratic Left in India," *Journal of Contemporary Asia* 39, 2009, 463–74; and Bruce Cumings, "The Last Hermit," *New Left Review* II/6, November–December 2000, 150–54.

50 Li, *The Rise of China and the Demise of the Capitalist World Economy*, 187.

51 Patricia Springborg, "Hobbes and Schmitt on the Name and Nature of Leviathan Revisited," *Critical Review of International Social and Political Philosophy* 13, 2010, 297–315. Hobbes's inspiration for Behemoth is said to be Job 40:15 ("Behold now the Behemoth that I have made with you; he eats grass like cattle"), but it is not entirely clear, since this passage is "one of the most extreme *non sequiturs* in literature"; D. Wolfers, "The Lord's Second Speech in the Book of Job," *Vestum Testamentum* 40, 1990, 474–99. Schmitt, at his least insightful, absolved himself of responsibility for thinking it through in any detail; Tomaz Mastnak, "Schmitt's Behemoth," *Critical Review of International Social and Political Philosophy* 13, 2010, 275–96. In the epic clash of the Leviathan and Behemoth, Schmitt says, "Jewish-cabbalistic interpretations" staged "world history ... as a battle among heathens"; Carl Schmitt, *The Leviathan in the State Theory of Thomas Hobbes: Meaning and Failure of a Political Symbol*, Chicago, IL: University of Chicago Press, 2008 [1938], 8–9.

52 Behemoth's climate denialism can perhaps be functionally attributed to fossil fuel-based economic interests, but that is hardly a convincing explanation for the problem. First, because capital is heterogeneous and most fractions would prefer Leviathan's planetary solution. Second, because class politics never operate independently of social difference, and capital (let alone one sector) is hardly the sole element behind Behemoth. Thus, it would be a grave mistake to expect to defeat Behemoth by proposing a more rational economic policy.

53 Schmitt, *The Leviathan in the State Theory of Thomas Hobbes*, 21; Robert Kraynak, "Hobbes' Behemoth and the Argument for Absolutism," *American Political Science Review* 76, 1982, 837–47.

54 Franz Neumann, *Behemoth: The Structure and Function of National Socialism*, London: V. Gollancz, 1942.

55 Thomas Hobbes, *Behemoth or the Long Parliament*, London: Simpkin, Marshall and Co., 1889 [1681], 26, 23.

56 For an admirably "realist" example, see Christian Parenti, *Tropic of Chaos: Climate Change and the New Geography of Violence*, New York: Nation Books, 2011.

57 Fredric Jameson, “Future City,” *New Left Review* II/21, May–June 2003, 76.

58 Walter Benjamin, *Illuminations*, New York, Schocken Books, 1969, 257.

59 Ibid. Our analysis of X is indebted to Kojin Karatani, *Transcritique: On Kant and Marx*, Cambridge, MA: MIT Press, 2003 283–306, and Kojin Karatani, “Beyond Capital Nation State,” *Rethinking Marxism* 20, 2008, 569–95. On the geographies of X, see Kojin Karatani and Joel Wainwright, “‘Critique Is Impossible without Moves’: An Interview with Kojin Karatani,” *Dialogues in Human Geography* 2, 2012, 30–52.

3. The Politics of Adaptation

1 Albert Einstein, “Foreword,” in Max Jammer, *Concepts of Space: The History of Theories of Space in Physics*, New York: Harper, 1960 [1953], xiii.

2 Stereotypically presented as white men wearing white lab coats.

3 For a concise history of the Intergovernmental Panel on Climate Change, see Jamieson, *Reason in a Dark Time*, 32–33.

4 On the interpretation of claims from climate science, see Candis Callison, *How Climate Change Comes to Matter: The Communal Life of Facts*, Durham, NC: Duke University Press, 2014.

5 Thompson, “Climate Change,” 153.

6 Ibid.

7 This subsection includes revised material from Joel Wainwright, “Climate Change and the Challenge of Transdisciplinarity,” *Annals of the Association of American Geographers* 100, 2010, 983–91.

8 Scholars of the “social sciences” and “humanities” study much the same things, albeit differently, and usually without much collaboration. In Allen Bloom’s words, the fields “represent the two responses to the crisis caused by the definitive ejection of man ... from nature, and hence from the purview of natural science or natural philosophy, toward the end of the eighteenth century” (Allen Bloom, *The Closing of the American Mind*, New York: Touchstone, 1987, 357). For Bloom, the difference between them “comes down to the fact that social science really wants to be predictive, meaning that man [sic] is predictable, while the humanities say that he is not.”

9 Bruno Latour, *Science in Action: How to Follow Scientists and Engineers through Society*, Cambridge, MA: Harvard, 1987, 2.

10 This is emphatically not to deny the necessity of examining scientific practices, or the social quality of knowledge about climate (see Michael Hulme, *Why We Disagree About Climate Change*. Cambridge: Cambridge University, 2009). Rather it is to recognize these substantive (if only relative) differences between the production of knowledge in the sciences and the humanities. Climate science is a complex discipline since its object (climate) is an ensemble

3 Oreskes and Conway, *The Collapse of Western Civilization*, ix.

4 Ibid., 42–52. *The Collapse of Western Civilization* blames neoliberal ideology for “civilizational” collapse, and in that sense shares a problematic quality with Naomi Klein’s *This Changes Everything* (and many other texts circulating in the climate justice movement): it attributes our problems to neoliberalism, which is to say the problem is not capitalism, but the current version of capitalism. We are unconvinced. Capitalism may not be the *only* problem, but it is surely one of the big ones.

5 Ibid.

6 The unwillingness of Oreskes and Conway to give the story’s “Chinese” narrator any subjective qualities, narrative function, or even a name, exacerbates the text’s Orientalism. Their anonymous China is solely a screen foisted by Western writers in front of themselves on which they project their anxieties about “civilization.” This narrative loses all its force without the assumption that China’s return to pre-eminence in the world system is necessarily a negative development. A useful counterpoint is Giovanni Arrighi’s *Adam Smith in Beijing: Lineages of the 21st Century*, New York: Verso, 2007.

7 “The ultimate blow for Western civilization came ... [with] the collapse of the West Antarctica Ice Sheet” (29). It might be a fantasy novel, but this is textbook environmental determinism. The place in the text where a causal hypothesis about the “collapse” belongs is, appropriately enough, marked by a blank (31). The unnamed narrator fills this void with the statement, “There is no need to rehearse the details of the human tragedy that occurred” (31).

8 Oreskes and Conway, *The Collapse of Western Civilization*: Africa’s “starvation” (25), “governments ... overthrown” (25); “wiped out” (33).

9 Ibid., 3–4, emphasis added.

10 As of June 21, 2016, it was the fourth bestseller in climatology and fifth in environmental policy at amazon.com (United States). At its peak, the book was the best seller in both categories.

11 There is at least one large, well-funded group of intellectuals at work on these models, because they are understood to be fundamental to the success of their organization: the US military. The literature on climate and US national security (or in more critical studies, “climate change and securitization”) has grown rapidly over the past decade. A good starting point is a pair of 2007 documents from the US foreign-policy and intelligence communities: Joshua W. Busby, *Climate Change and National Security: An Agenda for Action*, Council on Foreign Relations, CSR No. 32; and Kurt Campbell, Jay Gullledge, J. R. McNeill, John Podesta, et al., *The Age of Consequences: The Foreign Policy and National Security Implications of Global Climate Change*, Washington, DC: Center for a New American Security (available for download online; republished as a book by the Brookings Institution in 2008). See also Daniel Moran (ed.), *Climate Change and National Security: A Country-Level Analysis*, Washington, DC: Georgetown University Press, 2011 (a product of a workshop organized by

the US National Intelligence Council). For more critical perspectives, see Michael Redclift and Marco Grasso (eds), *Handbook on Climate Change and Human Security*, Cheltenham, UK: Edward Elgar, 2013. Very little scholarly work has been published on the US military's programs for predicting future climate change (dis)order.

12 For example, specifying variables. What constitutes meaningful climate change for one place may not be meaningful elsewhere. Moreover, for complex planetary systems, it is impossible to draw boundaries between objects or processes inside and outside the model.

13 Jeremy S. Pal and Elfatih A. Eltahir, "Future Temperature in Southwest Asia Projected to Exceed a Threshold for Human Adaptability," *Nature Climate Change* 6, no. 2, 2016, 197–200.

14 In fairness, these insights can be gleaned from Intergovernmental Panel on Climate Change, Fifth Assessment Report, Working Group II, 2014, www.ipcc-wg2.awi.de. Chapter 12, "Human Security," open to multiple interpretations. For a critical survey of recent literature on the climate–violence nexus, see Eric Bonds, "Upending Climate Violence Research: Fossil Fuel Corporations and the Structural Violence of Climate Change," *Human Ecology Review* 22, no. 2, 2016, 3–23.

15 Hans Reiss, "Preface," in Hans Reiss (ed.), *Kant's Political Writings*, Second Edition, Cambridge: Cambridge University Press, 1991, 10.

16 Kant, "On Perpetual Peace," in *Political Writings*, 107–8, emphasis in original; see also Proverbs 22:8, "He who sows iniquity will reap vanity"; and Job 4:8, "Even as I have seen, they that plow iniquity, and sow wickedness, reap the same."

17 Ibid., 106. For contrary views, compare Chad Kautzer, "Kant, Perpetual Peace, and the Colonial Origins of Modern Subjectivity," *Peace Studies Journal* 6, no. 2, 2013, 58–67; and Inés Valdez, "It's Not About Race: Good Wars, Bad Wars, and the Origins of Kant's Anti-Colonialism," *American Political Science Review* 111, no. 4, 819–34.

18 The UN "is far from the Kantian idea of the federation of nations." Kojin Karatani, "Beyond Capital-Nation-State," *Rethinking Marxism* 20, no. 4, 2008, 592.

19 Ibid., 591–2.

20 Kant, "On Perpetual Peace," 95.

21 Immanuel Kant, *Groundwork of the Metaphysics of Morals*, Second Edition, Cambridge: Cambridge University Press, 2012, 46.

22 Kant, *Political Writings*, 54, emphasis added.

23 Kant, "An Answer to the Question, What is Enlightenment?" in *Political Writings*, 54–60.

24 G. W. F. Hegel, *Philosophy of Right*, Cambridge: Cambridge University Press, 1991, §333, emphasis in original.

25 Ibid., §334, emphasis in original.

26 There is a large literature on Hegel's philosophical criticisms of Kant. For a helpful overview, see John McCumber, *Understanding Hegel's Mature Critique of Kant*, Stanford, CA: Stanford University Press, 2014.

27 Hegel, *Philosophy of Right*, §333.

28 Alexander Wendt, "Why a World State is Inevitable," *European Journal of International Relations* 9, no. 4, 2003, 491–542. Constructivist international relations focuses on the construction of forms of recognition among and between states.

29 Thomas Weiss, "What Happened to the Idea of World Government?" *International Studies Quarterly* 53, 2009, 261. See also Weiss, *Thinking about Global Governance*, New York: Routledge, 2012.

30 Adorno and Horkheimer, *Towards a New Manifesto*, 40.

31 See Catherine Lu, "World Government," in Edward N. Zalta (ed.), *Stanford Encyclopedia of Philosophy* (Winter 2016 Edition), plato.stanford.edu.

32 Albert Einstein, "Towards a World Government," in *Out of My Later Years*, New York: Wings, 1956 [1946], 138, cited in Lu, "World Government."

33 Bertrand Russell, "The Bomb and Civilization," *The Glasgow Forward* 39, no. 33, 18 August 1945, accessible at russell.mcmaster.ca.

34 Daniel Deudney, *Bounding Power: Republican Security Theory from the Polis to the Global Village*, Princeton, NJ: Princeton University Press, 2007.

35 Russell, "The Bomb and Civilization."

36 Arendt, *Origins of Totalitarianism*, 142, n. 38.

37 Ibid., 420.

38 Hannah Arendt, "Thoughts on Politics and Revolution," in *Crises of the Republic*, New York: Harcourt, Brace, 1972, 230.

39 Ibid., 229.

40 Ibid., 229–30.

41 Ibid., 231, emphasis in original.

42 Ibid., 230.

43 Wendt, "Why a World State Is Inevitable," 493.

44 Ibid., 491.

45 Ibid.

46 What other principles these could be with respect to Climate Leviathan is a question to which we will return.

47 Ibid., 493, emphasis added. See Deudney, *Bounding Power*.

48 The logic of nuclear one-worldism has interesting historical intersections with climate politics. The development of the global climate change models at the heart of the IPCC reports emerged out of Cold War-era models of the world used for guiding intercontinental ballistic missiles and predicting the effects of nuclear war ("nuclear winter," for example). There is a growing literature in history and science studies on the climate–nuclear nexus. See, for example, John Cloud, "Crossing the Olentangy River: The Figure of the Earth and the Military-

Industrial-Academic Complex, 1947–1972,” *Studies in the History and Philosophy of Modern Physics* 31, no. 3, 2000, 371–404; R. Doel, “Constituting the Postwar Earth Sciences: The Military’s Influence on the Environmental Sciences in the USA after 1945,” *Social Studies of Science* 33, no. 5, 2003, 635–66; Kristine Harper, “Climate Control: United States Weather Modification in the Cold War and beyond,” *Endeavour* 32, no. 1, 2008, 20–26; Jacob Hamblin, “A Global Contamination Zone: Early Cold War Planning for Environmental Warfare,” in J. R. McNeill and Christine Unger (eds), *Environmental Histories of the Cold War*, New York: Cambridge University Press, 2010, 85–114; P. Edwards, “Entangled Histories: Climate Science and Nuclear Weapons Research,” *Bulletin of the Atomic Scientists*, 68, no. 4, 2012, 28–40. In the introduction to this chapter we criticized the fiction of Oreskes and Conway; but they have also done excellent work on the Cold War origins of climate denialism. Naomi Oreskes and Erik Conway, “Challenging Knowledge: How Climate Science Became a Victim of the Cold War,” in *Agnotology: The Making and Unmaking of Ignorance*, Stanford, CA: Stanford University Press, 2008, 55–89; see also Oreskes and Conway, *Merchants of Doubt*.

49 One key exception, the project of the European Union, is looking very weak at the time of writing.

50 Of course, the elite nature of the project is unlikely to matter at the scale of the state system along. The class, gender and other hierarchies that plague human communities would also mean it would, very likely, also be exercised via white masculine domination. The almost certain centrality of China to any such process of collective identity formation makes the Euro-American character of this process much less sure.

51 See Giovanni Arrighi, *The Long Twentieth Century: Money, Power, and the Origins of Our Times*, New York: Verso, 1994. Though Arrighi’s account explains a great deal, capital’s drive toward larger scales is always cross-cut by the possibility of exploiting spatial difference to sustain specific “smaller capitals.” As Poulantzas reminds us, “within capital as a whole” there is no general principle or “instance capable of laying down who should make sacrifices so that others may continue to prosper”: (*State, Power, Socialism*, 182–83).

52 Raymond Duvall and Jonathan Havercroft, “Taking Sovereignty out of This World: Space Weapons and Empire of the Future,” *Review of International Studies* 34, 2008, 755–75.

53 Ibid., 756.

54 Ibid., 761.

55 Ibid., 756.

56 Ibid., 765.

57 Ibid., 765–66, emphasis in original.

58 Max Weber, “Politics as Vocation,” in Hans Gerth and C. Wright Mills (eds), *From Max Weber: Essays in Sociology*, London: Routledge, 1991, 78,

emphasis in original. *Gewalt* translates as both “force” and “violence.”

59 Duvall and Havercroft, “Taking Sovereignty out of This World,” 768.

60 David Keith, “Geoengineering the Climate: History and Prospect,” *Annual Review of Energy and the Environment* 25, 2000, 245–84; Clive Hamilton, *Earthmasters: Playing God with the Climate*, New South Wales, Australia: Allen & Unwin, 2013; Alan Robock, “Albedo Enhancement by Stratospheric Sulfur Injection: More Research Needed,” *Earth’s Future*, 4, 2016, doi:10.1002/2016EF000407.

61 See Keith, “Geoengineering the Climate”; James Fleming, “The Pathological History of Weather and Climate Modification: Three Cycles of Promise and Hype,” *Historical Studies in the Natural Sciences* 37, no. 1, 2006, 3–25; James Fleming, “The Climate Engineers,” *The Wilson Quarterly* 31 no. 2, 2007, 46–60; Hamilton, *Earthmasters*; Dale Jamieson, *Reason in a Dark Time*, Chapter 7; Mike Hulme, *Can Science Fix Climate Change? A Case Against Climate Engineering*, London: Wiley & Sons, 2014.

62 David Keith and Gernot Wagner, “Toward a More Reflective Planet,” Project Syndicate, June 16, 2016, project-syndicate.org.

63 Other commonly proposed strategies include artificially generating cold-water upwelling to lower surface temperatures or altering ocean chemistry to absorb more carbon. See David Keller, Ellias Feng and Andreas Oschlies, “Potential Climate Engineering Effectiveness and Side Effects During a High Carbon Dioxide-Emission Scenario 2014,” *Nature Communications* 5, article 3304; doi:10.1038/ncomms4304. For a review of approaches to geoengineering, see Zhihua Zhang, John C. Moore, Donald Huisinigh, and Yongxin Zhao, “Review of Geoengineering Approaches to Mitigating Climate Change,” *Journal of Cleaner Production* 103, 2015, 898–907.

64 Daniel Bodansky, “The Who, What, and Wherefore of Geoengineering Governance,” *Climatic Change* 121, no. 3, 2013, 539–51; Martin L. Weitzman, “A Voting Architecture for the Governance of Free-Driver Externalities, with Application to Geoengineering,” *Scandinavian Journal of Economics* 117, no. 4, 2015, 1049–68.

65 Jamieson, *Reason in a Dark Time*, 220.

66 Ibid., 220–21.

67 Ibid., 221.

68 Edward Parson and David Keith, “End the Deadlock on Governance of Geoengineering Research,” *Science* 229, 15 March 2013, 1279.

69 For a technological determinist argument regarding space weapons, see David Baker, *The Shape of Wars to Come*, Cambridge, MA: Patrick Stephens, 1981. For an alternative account of space weapons, see Duvall and Havercroft, “Taking Sovereignty out of This World.”

7. After Paris

Climate Justice Project website maintained by John Foran, climatejusticeproject.com.

22 In Paris a blizzard of signs, posters, pamphlets, essays, and books offered competing interpretations of where we stand and should go. “Climate justice” was the most widely used term to frame the movement.

23 Naomi Klein, *This Changes Everything: Capitalism vs. the Climate*, New York: Simon & Schuster, 2014. See also our discussion in [Chapter 2](#).

24 Jason Box and Naomi Klein, “Why a Climate Deal Is the Best Hope for Peace,” *New Yorker*, November 18, 2015; for Klein’s news reports from Paris, see Radio Nation, thenation.com/article/making-the-paris-climate-talks-count.

25 A phrase used in the book and in the title of her speech at the Paris Climate Action Zone, December 11, 2015.

26 Klein, *This Changes Everything*, 18.

27 Ibid., 18–19.

28 See, for example, Klein’s *The Shock Doctrine: The Rise of Disaster Capitalism*, New York: Picador, 2007, which dates the emergence of neoliberalism to the early 1970s—a much more defensible periodization. In *This Changes Everything*, Klein summarizes the ideological block to capital’s addressing climate in these terms: “[W]hat remained successful were the ideological underpinnings of the entire [neoliberal] project, which was ... always about using these sweeping [trade] deals, as well as a range of other tools [financial liberalization, for example], to lock in a global policy framework that provided maximum freedom to multinational corporations to produce their goods as cheaply as possible and sell them with as few regulations as possible—while paying as little in taxes as possible. Granting this corporate wish list, we were told, would fuel economic growth, which would trickle down to the rest of us, eventually” (19). Broadly speaking, we endorse Klein’s *description* of neoliberalism, but less her *explanation* for it. See Arrighi, *The Long Twentieth Century*; and Harvey, *The Enigma of Capital*.

29 A stronger alternative can be found by contrasting this approach to a critical historicist explanation of capital’s ecological crisis, such as we find in the Marxist ecological literature. See especially Andreas Malm, *Fossil Capital: The Rise of Steam Power and the Roots of Global Warming*, New York: Verso, 2016. In fairness, Malm’s book is intended for a narrow audience, and Klein seems to recognize the strengths of his historical approach. In a blurb on the cover of *Fossil Capital*, Klein calls it the “definitive deep history on how our economic system created the climate crisis.”

8. Climate X

1 Theodor Adorno and Max Horkheimer, 15 March 1956, in *Towards a New Manifesto*, New York; Verso, 2011[1956]), 59–62. The anonymous author of the book’s introduction explains that this “unique document is the record,

taken down by Gretel Adorno, of discussions over three weeks in the spring of 1956, with a view to the production of—as Adorno puts it—a contemporary version of *The Communist Manifesto*. Although they were speaking barely three weeks after Khrushchev’s world-shaking speech, we have no evidence that Adorno and Horkheimer had yet heard about it.”

2 For a thorough critique of liberalism’s “community of the free” (from which we borrow the term), see Domenico Losurdo, *Liberalism: A Counter-History*, New York: Verso, 2011.

3 Karl Marx, *Capital*, Vol. III, New York: Penguin, 1981 [1894], 911.

4 Marxian analyses of “accumulation by dispossession” have been taken to task for their emphasis on the creation of the proletariat and their relative neglect of dispossession. See, for example, Glen Sean Coulthard, *Red Skin, White Masks: Rejecting the Colonial Politics of Recognition*, Minneapolis: University of Minnesota Press, 2014. On Marx’s writings on precapitalist societies, see Kevin Anderson, *Marx at the Margins: On Nationalism, Ethnicity, and Non-Western Societies*, Chicago, IL: University of Chicago Press, 2016.

5 Dipesh Chakrabarty has made a similar argument:

climate change may well end up accentuating all the inequities of the capitalist world order ... Capitalist globalization exists; so should its critiques. But these critiques do not give us an adequate hold on human history once we accept that the crisis of climate change is here with us and may exist as part of this planet for much longer than capitalism or long after capitalism has undergone many more historic mutations ... While there is no denying that climate change has profoundly to do with the history of capital, a critique that is only a critique of capital is not sufficient for addressing questions relating to human history once the crisis of climate change has been acknowledged and the Anthropocene has begun to loom on the horizon of our present.

Dipesh Chakrabarty, “The Climate of History: Four Theses,” *Critical Inquiry* 35, 2009, 212.

6 Theodor Adorno, “Education after Auschwitz”, in Rolf Tiedemann (ed.), *Can One Live After Auschwitz: A Philosophical Reader*, Stanford, CA: Stanford University, 2003 [1967], 23.

7 To borrow a Zapatista slogan.

8 Schmitt, *The Concept of the Political*, 26, 53–54.

9 Patrick Bond, “Climate Capitalism Won at Cancun,” *Links: International Journal of Socialist Renewal*, December 12, 2010.

10 Minqi Li, “Capitalism, Climate Change, and the Transition to Sustainability: Alternative Scenarios for the US, China and the World,” *Development and Change* 40, 2009, 1058.

11 “We should refuse to do business with the dollar and get rid of it as soon as possible. I know that this action has huge consequences and massive repercussions; but it is an important way to liberate humanity from enslavement and servitude to America and its corporations.” Bin Laden adds for an imputed Western audience: “be earnest and take the initiative in boycotting them, in order to save yourselves, your wealth and your children from climate change and in order to live freely and honorably [instead of standing on] the steps of conferences and begging for your lives.” Osama bin Laden, “The Way to Save the Earth,” February 10, 2010, available at archive.org/stream/Ossama_ihtibas_03/sabil-e_djvu.txt.

12 “We are modest anti-capitalists.”

13 This paragraph reproduces arguments from Geoff Mann, “Who’s Afraid of Democracy?” *Capital Nature Socialism* 24, no. 1, 42–48.

14 This is a tendency to which Antonio Negri is sometimes prone. Consider, for example, his brilliant critique of Keynesianism. Negri reads the rise of the “planner state” as unconditional evidence of capital’s “admission of working-class autonomy,” as a recognition that the “problem of repressing the powerful trade union and political movement of the working class” had “extended the revolutionary experience to the whole capitalist world” (Antonio Negri, “Keynes and the Capitalist Theory of the State post-1929,” in *Revolution Retrieved: Writings on Marx, Keynes, Capitalist Crisis and New Social Subjects*, London: Red Notes, 1988 [1967], 12, 15). This line of thinking about the masses and democracy takes on a radically different optic if we shift away from the liberal, core-capitalist democracies to, say, openly undemocratic states, especially in the Global South.

15 Fear of it never seems far from left-liberal opposition to capitalism. Consider the response of radicals like Robin Blackburn and Robert Wade to the global economic crisis in 2008. Rather than welcoming the crisis as Marx did the meltdown of 1857 (as he wrote to Engels: “the stock exchange is the only place where my present dullness turns into elasticity and bouncing”), Blackburn and Wade seem mainly interested in stabilizing the system so that unrest does not destroy the whole kit and caboodle (Marx quotation is from Roman Rosdolsky, *The Making of Marx’s ‘Capital’, Vol. I*, London: Pluto Press, 1977 [1968], 7); Robin Blackburn, “The Subprime Crisis,” *New Left Review* II/50, 2008, 63–105; Robin Blackburn, “Crisis 2.0,” *New Left Review* II/72, 2011, 33–62; Robert Wade, “Financial Regime Change,” *New Left Review* II/53, 2008, 5–21; Robert Wade, “From Global Imbalances to Global Reorganizations,” *Cambridge Journal of Economics* 33, 2009, 539–62.

16 Karl Marx and Friedrich Engels, *The German Ideology*, in *Karl Marx and Friedrich Engels, Collected Works*, Vol. 5, New York: International Publishers, 1976, 49.

17 Pope Francis I, “Encyclical Letter *Laudato Si’* of the Holy Father Francis on Care for Our Common Home,” 2015, w2.vatican.va.

18 Ibid. Francis's "civil society" is not the bourgeois social formation that has obsessed European political theory for centuries. He uses the term to describe a society founded in civility—what once might have been unhesitatingly called "civilization." Avoiding the latter term, the Pope is indicating an awareness of at least some of civilization's troubling legacies.

19 Pope Francis, "Laudato Si'," §26.

20 Ibid., §49.

21 Ibid., §§53–54.

22 In the run-up to the Paris meetings, for instance, the Pope placed his shoes in the Place de la République in solidarity with the banned climate march.

23 See David Harvey, "Monument and Myth," *Annals of the Association of American Geographers* 69 no. 3, 1979, 362–81.

24 Walter Benjamin, "Theses on the Philosophy of History," in *Illuminations*, New York: Schocken Books, 1969, 258.

25 Antonio Negri, *The Labor of Job: The Biblical Text as a Parable of Human Labor*, Durham, NC: Duke University Press, 2009, 15.

26 Christine Lagarde "Ten Myths about Climate Change," n.d., imf.org/external/np/fad/envIRON/pdf/011215.pdf.

27 Elite calls for an omniscient global finance-sovereign—in the form of "radical" reregulation by (among others) the International Monetary Fund, the Bank of International Settlements, and the Basel banking accords—were ubiquitous in the immediate aftermath of the financial meltdown of 2007–2008.

28 Michael Hardt and Antonio Negri, *Empire*, Cambridge, MA: Harvard University Press, 2000, 393.

29 Against the false universalism of the Anthropocene, some alternatives have been proposed: capitalocene, plantationocene, "great derangement;" others will surely follow. See Donna Haraway, "Anthropocene, Capitalocene, Plantationocene, Chthulucene: Making Kin," *Environmental Humanities* 6, 159–65; Jason Moore (ed.), *Anthropocene or Capitalocene? Nature, History, and the Crisis of Capitalism*, Oakland, CA, PM Press, 2016; Amitav Ghosh, *The Great Derangement: Climate Change and the Unthinkable*, Chicago, University of Chicago Press, 2016; Benjamin Kunkel, "The Capitalocene", *London Review of Book*, 39, no. 5, 2017, 22–28.

30 Carl Schmitt, *The Leviathan in the State Theory of Thomas Hobbes: Meaning and Failure of a Political Symbol*, Chicago, IL: University of Chicago Press, 2008 [1938], 85, 100; Carl Schmitt, *Political Theology II: The Myth of the Closure of Any Political Theology*, Chicago, IL: University of Chicago Press, 2008 [1970], 32.

31 Karl Marx, "Contribution to the Critique of Hegel's Philosophy of Law," in *Marx-Engels Collected Works*, Vol. III, New York: International Publishers, 1973 [1843], 6, 23, emphasis in original.

32 Ibid., 24.

33 G. W. F. Hegel, *The Philosophy of Right*, Cambridge: Cambridge University Press, 1991 [1821], §279, emphasis in original.

34 Marx, “Contribution to the Critique of Hegel’s Philosophy of Law,” 26, 28.

35 Stathis Kouvelakis, *Philosophy and Revolution: From Marx to Kant*, London: Verso, 2003, 235.

36 Hegel, *Philosophy of Right*, §§278–79.

37 Schmitt, *The Concept of the Political*, 43–45; Schmitt, *Political Theology II*, 45.

38 See Mick Smith, *Against Ecological Sovereignty*, Minneapolis: University of Minnesota Press, 2011. One of the many provocative theses Smith advances is that sovereignty is essentially “an antiecological ... principle” (xiii), since it emerges from a conception of the world as a space of resources for human use, hence in need of a sovereign to govern. While arguably correct, to claim that ecology is antisovereignty displaces the puzzles we face into a special region of the political (treating environmentalism as more radical because it is about nature). The Marxist tradition offers other (nonecological) ways through by treating a future communist democracy as something essentially different than sovereignty. Smith argues:

What if sovereign powers take it upon themselves to decide that there is, after all, an ecological threat to people and state sufficient to warrant the definition “crisis”? Isn’t there now a real ... possibility that the idea of an ecological crisis ... will find itself recuperated by the very powers implicated in bringing that crisis about, as the latest and most comprehensive justification for a political state of emergency ...? (xvi).

In that case, Smith writes, we would “find that the global war on terror will segue ... into the crisis of global warming” (xvi). What Smith describes here as a “real ... possibility” is Leviathan’s fraught hegemony, and his propositional warning (“isn’t there now ...?”) is not paranoid conspiracy theory. To the extent that Smith can describe this development as “real,” that is, historically discernible, Leviathan is already present.

39 Marx, “Contribution to the Critique of Hegel’s Philosophy of Law,” 86, emphasis in original.

40 This is what Benjamin means by “divine violence”: a form of transformation that, rather than smashing the existing sovereign/law and replacing it with another, disables sovereignty altogether. This is the source of inspiration for Agamben’s destituent power.

41 Karl Marx, *Capital*, Vol. I, New York: Penguin, 1976 [1867], xx, 92.

42 Adorno, *Negative Dialectics*, 1966, 356–57, cited in Deborah Cook, *Adorno on Nature*, Durham, Acumen Press, 2011, 15. Cook’s study of Adorno is a major contribution to the task of reclaiming Adorno’s thought for political-

ecological thinking. See Adorno's essay "The Idea of Natural History," in Robert Hullot-Kentor, *Things Beyond Resemblance: Collected Essays on Theodor W. Adorno*, New York: Columbia University Press, 2006, 252–70, and Fredric Jameson's commentary on Adorno's conception of natural history in *Late Marxism: Adorno, or, The Persistence of the Dialectic*, New York: Verso, 2007, 94–110.

⁴³ See, for example, Patricia Monture-Angus, *Journeying Forward: Dreaming First Nations' Independence*, Halifax, Fernwood Publishing, 1999; Taiaiake Alfred, "Sovereignty," in Joanne Barker (ed.), *Sovereignty Matters: Locations of Contestation and Possibility in Indigenous Struggles for Self-determination*, Lincoln, NE: University of Nebraska Press, 2005; Aileen Moreton-Robinson, *Sovereign Subjects: Indigenous Sovereignty Matters*, Sydney: Allen and Unwin, 2007; Coulthard, *Red Skin, White Masks*; and Audra Simpson, *Mohawk Interruptus: Political Life Across the Borders of Settler States*, Durham, NC: Duke University Press, 2014. It is worth noting that these scholars come from territories now claimed by former British colonies and OECD countries (Canada mainly). There are deep traditions of Indigenous struggle and thought the world over, of course, and often they revolve around precisely these concerns—reciprocity, land, and a way out of the liberal-colonial sovereign mode. Among others, we can turn to the remarkable efforts of the Mapuche in the southern Andes, or to the (Indigenous and non-Indigenous) people of Oaxaca—who have brought together anticapitalist class-based and Indigenous struggles—for courageous and critical examples from which to learn. See John Severino, "The Mapuche's Struggle for the Land," *Counterpunch*, November 2013, available at counterpunch.org; A. S. Dillingham, "Mexico's Classroom Wars: An Interview with René González Pizzaro," *Jacobin*, June 2016, jacobinmag.com; and Amy Goodman's interview with Gustavo Esteva, "Struggling for Our Lives," *Democracy Now*, June 22, 2016, democracynow.org.

⁴⁴ Alfred, "Sovereignty," 34–35, 38.

⁴⁵ *Ibid.*, 41–42.

⁴⁶ Discussing the widespread Indigenous blockading in Canada in the late 1980s, which (in the eyes of many) culminated in the summer of 1990 at Kanehsatà:ke and Kahnewà:ke (the "Oka Crisis," outside of Montréal), Coulthard remarks:

If settler-state stability and authority is required to ensure "certainty" over Indigenous lands and resources to create an investment climate friendly for expanded capital accumulation, then the barrage of Indigenous practices of disruptive *countersovereignty* that emerged with increased frequency in the 1980s was an embarrassing demonstration that Canada no longer had its shit together with respect to managing the so-called "Indian Problem".

Coulthard, *Red Skin, White Masks*, 118, emphasis added.

47 See for example *ibid.*, 122; on standard liberal goods, see also Charles Taylor, *Sources of the Self: The Making of Modern Identity*, Cambridge: Cambridge University Press, 1989.

48 Coulthard, *Red Skin, White Masks*, 60, emphasis in original.

49 These paragraphs draw on Geoff Mann, “From Countersovereignty to Counterpossession?” *Historical Materialism* 24, no. 3, 2016, 45–61.

50 The place of what Audra Simpson (in *Mohawk Interruptus*, 2014) calls “nested sovereignties” remains uncertain in the face of Coulthard’s “countersovereignty.”

51 In the context of British Columbia, sovereignty is taken to be “crystallized” by European settlement. In the landmark 1997 decision in *Delgamuukw v. British Columbia*, the Supreme Court of Canada maintained that “Aboriginal title crystallized at the time sovereignty was asserted,” as if it were a kind of legal antimatter: *Delgamuukw v. British Columbia* [1997] 3 S. C. R. 1010, at 1017. Precolonial Indigenous “occupation” of British Columbia was deemed *eo ipso* “pre-sovereignty”; sovereignty is defined as an event in (past) time: “if, *at the time of sovereignty*, an aboriginal society had laws in relation to land, those laws would be relevant to establishing the occupation of lands which are the subject of a claim for aboriginal title”: *ibid.*, 1101–2.) With the closure of pathways for the articulation of Indigenous demands except for those constructed by the colonial state and its modes of “doing law” (courts, tribunals, contract law, and so on), Indigenous claims to a variation on national sovereignty have emerged as a “default” politics (Coulthard, *Red Skin, White Masks*, 53).

52 Mark Rifkin, “Indigenizing Agamben: Rethinking Sovereignty in Light of the ‘Peculiar’ Status of Native Peoples,” *Cultural Critique* 73, 2009, 105.

53 Alfred, “Sovereignty,” 42.

54 Adorno, 359, in Cook, *Adorno on Nature*, 17.